

ENGI- NEERING LIFE





**Everyday Life
Engineering
Partner of
Global TPE Users**



GLOBAL

Elastron has a global service network that can serve more than 55 countries.



SOLUTION PARTNERSHIP

Elastron has a business-service partnership philosophy beyond product supply.



PROACTIVE

Elastron goes beyond the customer's current needs by combining its worldwide product, service and knowledge with its agile structure.



SUSTAINABILITY

Elastron Develops products containing post-industrial recycled (PIR) and post-consumer recycled (PCR) materials.



ELASTRON USA



ISO 9001:2015

(The Quality Management System)

ELASTRON TURKEY



ATF 16949:2016

(Quality Management Systems for
Automotive Industry)



ISO 9001:2015

(The Quality Management
System)



ISO 14001:2015

(Environmental Management System)



ISO 45001:2018

(Occupational Health and Safety
Management Certificate)





ELASTRON R&D

Elastron R&D develops customer-oriented solutions in addition to its high-quality general product line.



PHYSICAL AND MECHANICAL TESTS

- Hardness: ShoreA or ShoreD
- Density: g/cm³
- Tensile Strength: Mpa
- Elongation: %
- Modulus: Mpa
- Tearing: N/mm
- Compression Set: %
- MFI: g/10min
- Flammability: UL 94 (V₀-V₁-V₂-HB)
- Abrasion: mm³
- Izod Impact test (ASTM): J/m
- Capillary Rheometer: Pa.s
- Mooney Viscometer (For EPDM)
- Viscometer (For SEBS and Oil)

COLOR AND GLOSS MEASUREMENT

- Colorimeter
- Glossmeter

AGING TESTS

- Air Ageing Ovens
- Chemical Test Cabinet
(IRM 903, ASTM 1 Oil, Acid, Base, etc.)
- Weatherometer Cabinet
(For Arizona & Florida accelerated artificial ageing tests) Atlas Ci 4000
- QUV Accelerated Aging

EMISSION TESTS

- Fogging measurements
- Odour Tests

CHEMICAL TESTS

- pH measurement
- Soxhlet Extraction

THERMAL ANALYSIS

- DSC (Differential Scanning Calorimetry)
- TGA (Thermo Gravimetric Analysis)

SPECTROMETRIC TESTS

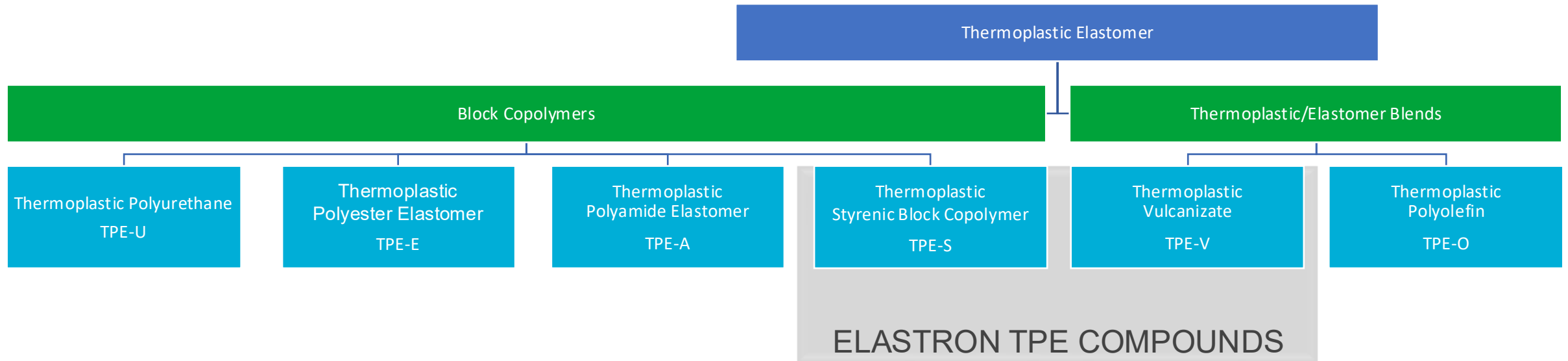
- FT-IR
(Fourier Transform - Infrared Spectrometer)





Thermoplastic Elastomers

Thermoplastic elastomers are a group of rubber-like materials that, unlike vulcanized conventional rubber materials, can be processed and recycled like thermoplastic materials. Thermoplastic Elastomers do not require curing or vulcanization during processing and can be processed by traditional thermoplastic processing equipment.





Easy Coloring



Recyclability



Temperature
Resistance



Weathering
Resistance



Wide Hardness
Range



Flexibility



Elasticity



Recovery

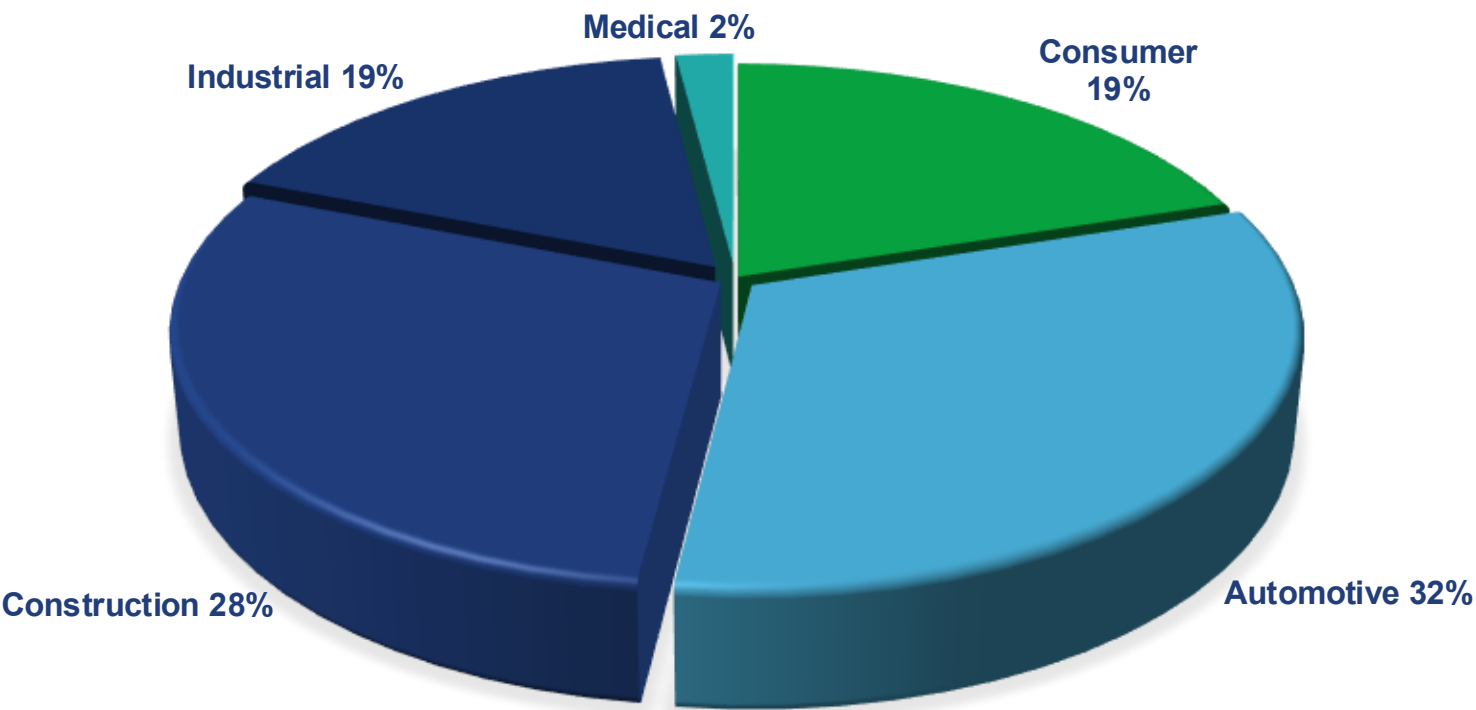
	Elastron G	Elastron V	Elastron D
Structure	SEBS/PP based TPE compounds	Crosslinked TPE compounds	SBS/PP based TPE compounds
Hardness (Shore A/D)	12 A - 65 D	30 A - 65 D	20 A - 65 D
Density (g/cm ³)	Min. 0.88	Min. 0.90	Min. 0.89
Compression Set	Good	Very Good	Medium
Elasticity	High	Very High	Medium
Service Temperature (°C)	-50°C to 120°C	-50°C to 135°C	-50°C to 70°C
UV Resistance	Good	Good	Poor
Organic Solvent Resistance	Variable	Variable	Poor
Acid-Base Resistance	Good	Good	Good
Adhesion (Standard grades)	PP, PE, EVA	PP, PE, EVA	PP, PE, EVA
Adhesion (Bondable grades)	ABS, PC, PC/ABS, PBT, PETG, ASA, SAN, PMMA, PET, PA6/6.6, PS, HIPS, EPDM	EPDM	PS

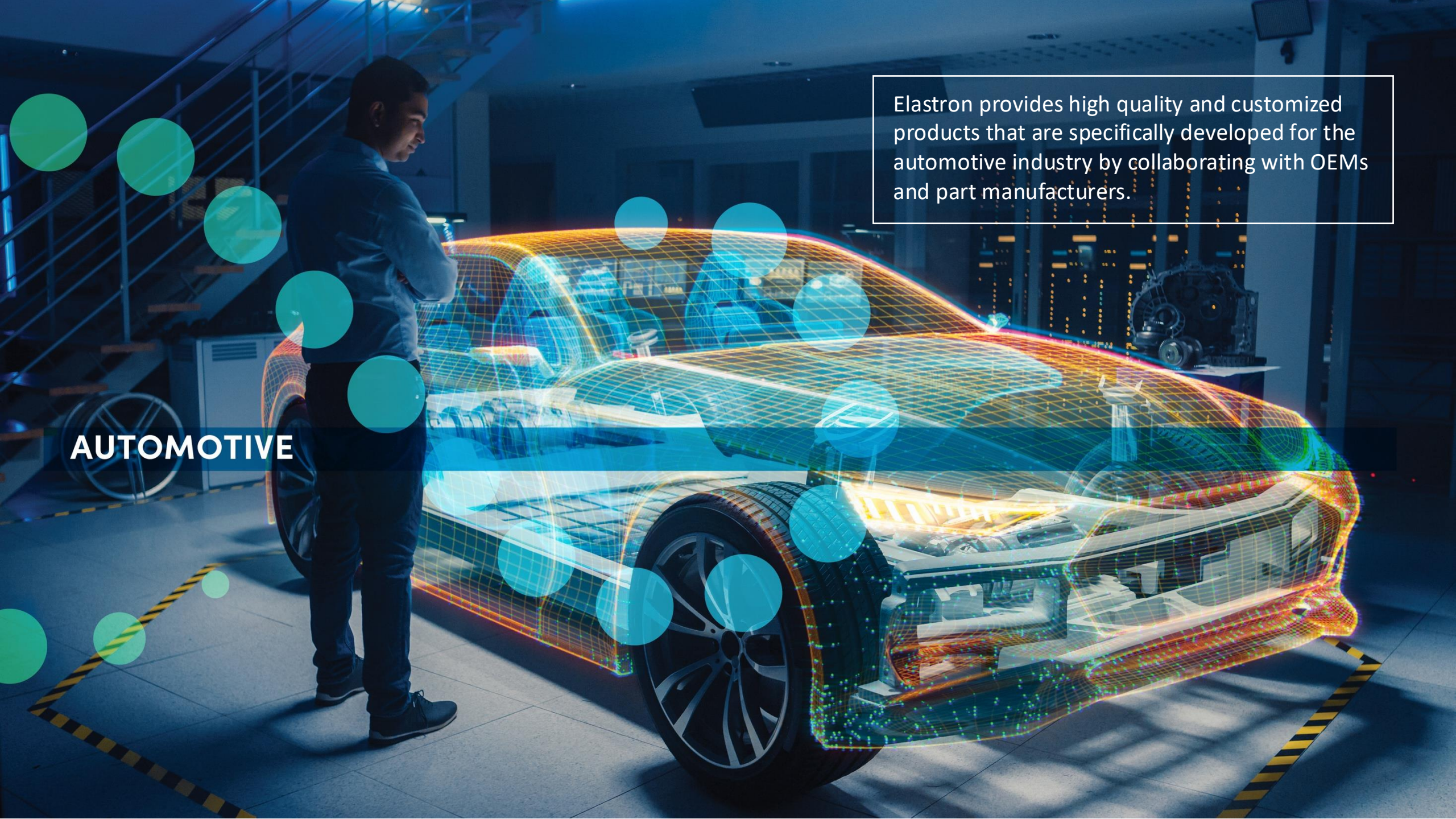


MARKETS



Markets	Percentage Distribution
Automotive	32%
Construction	28%
Consumer	19%
Industrial	19%
Medical	2%





Elastron provides high quality and customized products that are specifically developed for the automotive industry by collaborating with OEMs and part manufacturers.

AUTOMOTIVE



Segments & Important Applications

WEATHERSEALS

- Inner & Outer Belt Line Seals
- Glass Run Channels
- Sunroof Seals
- Glass Encapsulation
- Corner Molding
- Slip Coat
- End Caps

INTERIOR

- Pad Heel
- Pads & Cup Holders
- HVAC Door Seals
- Floor Mats
- Seat Gaskets
- Glovebox Cover & Housings

UNDER THE HOOD & CHASSIS

- Suspension Bellows
- Grommets & Plugs
- Fuel Line Hose
- Radiator Seals
- Steering Bellows & Dust Boots
- Mechanism Cable Covers
- Brake Conduit

EXTERIOR

- Bumper Spoiler
- Wiper Spoiler
- Mud Flaps
- Antenna Bezels
- Wheel Housing Parts
- Fuel Entrance Cover Seal

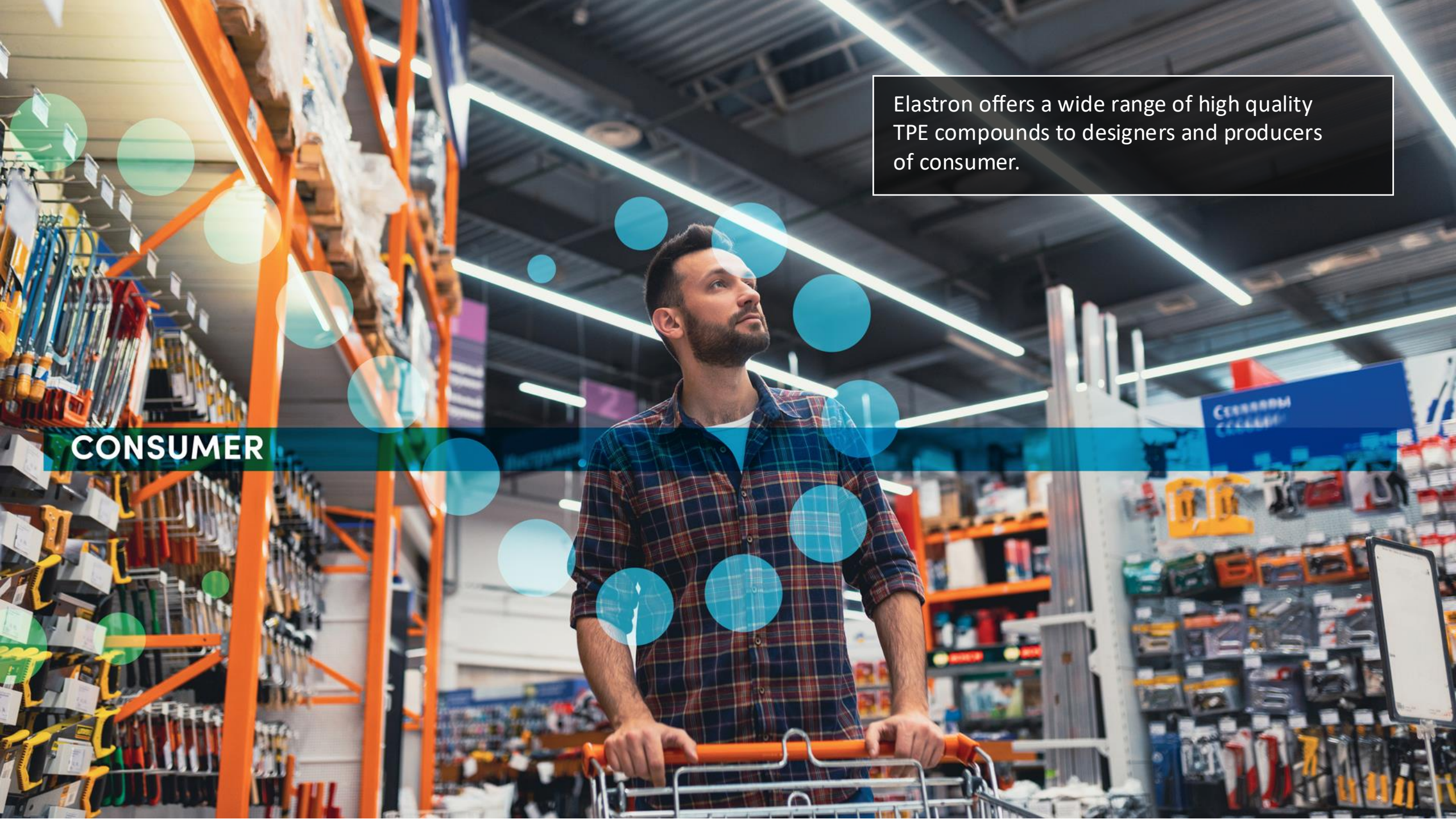




Key Features of Elastron TPE Grades for Automotive Applications

- Excellent weathering and ozone resistance
- Abrasion resistance
- Adhesion to PP, PE, EPDM etc. and engineering plastics (ABS,PC,PA, etc.)
- High temperature resistance
- OEM approved grades
- Excellent compression set
- Low temperature resistance
- Recyclability





Elastron offers a wide range of high quality TPE compounds to designers and producers of consumer.

CONSUMER



Segments & Important Applications

FOOD CONTACT APPLICATIONS

- Food container seals
- Chopping board handles
- Kitchenware grips

DRINKING AND TAP WATER APPLICATIONS

- Shower hose and head
- Water pump seals
- Water dispenser seals

SPORT ITEMS

- Bicycle handlebar grips
- Ski poles holders
- Fitness machine protection covers
- Swimming flippers

FURNITURE

- Bicycle handlebar grips
- Ski poles holders
- Fitness machine protection covers
- Swimming flippers

PERSONAL CARE

- Toothbrush handles
- Razor grips
- Respiratory box for protective masks

WHITE GOODS & ELECTRICAL APPLIANCES

- Washing machine suspensions
- Washing machine shock absorbers
- Combi boiler pipe connectors
- Refrigerator gaskets

HOUSEHOLD GOODS

- Carpet backing
- Houseware grips
- Power and hand tool grips
- Hangers

OFFICE EQUIPMENT

- Pen grips
- Erasers
- Pencil cases

TOYS

- Pet toys
- Model car wheels
- Stamp pads for kids





Key Features of Elastron TPE Grades for Consumer Applications

Elastron TPE grades are recyclable, easy to color with masterbatches and have excellent surface appearance. SEBS based TPE compounds can be offered in transparent form.

GRADES FOR DRINKING WATER

- NSF/ANSI 61 approval
- Hot and cold water contact

GRADES FOR TOYS, PERSONAL CARE AND SPORT ITEMS

- EN 71-3 compliance
- Skin friendly
- Free of latex, PVC and phthalates
- No use of heavy metals

FOOD CONTACT GRADES

- Excellent organoleptic results
- Monomers and additives used as raw materials are
 - in compliance with Regulation (EU) No.10/2011
 - in compliance with FDA 21 CFR

GRADES FOR WHITE GOODS & ELECTRICAL APPLIANCES

- Vibration absorber
- High heat and mechanical resistance
- Resistant to detergents, acids and bases





Elastron medical TPE compounds meet special needs of various medical device applications.

MEDICAL



Segments & Important Applications

DISPOSABLE MEDICAL GOODS

- Brush of throat swabs

MEDICAL TIPS & GASKETS

- Infusion bottle caps
- Syringe gaskets
- Medicine bottle caps

MEDICAL FOOTWEAR

- Antibacterial shoes
- Antistatic hospital clogs
- Hospital clogs

MEDICAL EQUIPMENT & DEVICES

- Dental guard for bruxism disease
- Medical tubes
- Urine catheter grips





Key Features of Elastron TPE Grades for Medical Applications

- Permanent antistatic grades available up to 10^8 ohm/square
- Selected compounds comply with recognized medical standards
- Availability of translucent compounds
- Free of latex, PVC, phthalates, and heavy metals
- Sterilizable by using common methods
- Good re-sealing properties



A photograph of two men in construction attire (hard hats and safety vests) looking at a large set of blueprints. They are standing on a construction site with cranes and scaffolding in the background. The image is overlaid with a blue horizontal bar and a semi-transparent dark blue box containing text. There are also several semi-transparent colored circles (green, blue, orange) scattered across the image.

CONSTRUCTION

Elastron TPE grades designed for construction industry are based on TPV and SEBS based TPE compounds.



Segments & Important Applications

WINDOW PROFILE & DOOR SEALS

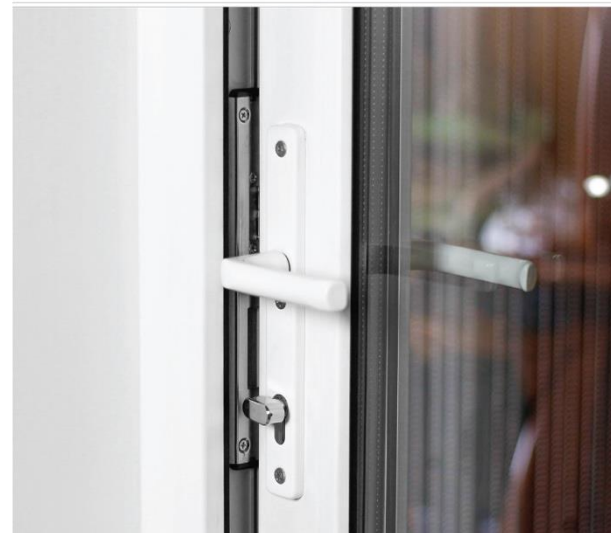
- Window profile seals (PVC, wooden, aluminum)
- Door seals
- Window profile joint gaskets

INSULATION APPLICATIONS

- Expansion joint/dilatation gaskets
- Roof drainage seals
- Sealing strips

WATER INSTALLATIONS & PLUMBING APPLICATIONS

- Waste water pipe seals
- Gaskets for toilets
- Pipe joint gaskets





Key Features of Elastron TPE Grades for Construction Applications

WINDOW PROFILE SEAL GRADES

- RAL GZ 716/1 approved
- CSTB QB 36 approved
- Grades capable of foaming are available to reduce the density

WASTE WATER PIPE SEAL AND PLUMBING GRADES

- EN 681/2 approval
- NSF 14 approval
- ASTM F477 pipe specification compliance
- Consistent dimensional stability



A low-angle, upward-looking photograph of a complex industrial facility. A large, vertical, segmented metal pipe dominates the left side of the frame. To its right, a dense network of horizontal and vertical pipes, some insulated with silver thermal wrap, crisscrosses the scene. The pipes are supported by a complex steel framework. The sky is a clear, bright blue with a few wispy clouds. The overall lighting is bright, suggesting a sunny day. Several semi-transparent teal and light blue circles are overlaid on the image, adding a modern, graphic touch.

INDUSTRIAL

Elastron provides TPE solutions for different segments which have different technical requirements.



Segments & Important Applications

ANTI-SLIP MATS & STRIPS

- Anti-slip mats
- Anti-slip ladder feet
- Building entrance floor mats

IMPACT MODIFICATION

- For ABS, PA, PC, PE, PP, PS

CABLES

- Cable insulation
- Cable jacketing

INDUSTRIAL CASTOR WHEEL

- Hospital trolley wheels
- Industrial castor wheels
- Wheels for supermarket trolley

ELECTRICAL EQUIPMENT

- Cable connectors
- Multigate for cables
- Plug gaskets
- Grommets for electrical applications

INDUSTRIAL GASKETS & EQUIPMENT

- RV Gaskets
- Marble polishing gaskets
- Seals for irrigation system
- Clamp gaskets
- Gaskets for HVAC systems





Key Features of Elastron TPE Grades for Industrial Applications

CABLE AND ELECTRICAL EQUIPMENT

- Halogen free flame retardant (HFFR) grades
- UL 94 HB / V₀ / V₁ / V₂ listed products
- Low dielectric constant and high oxygen index
- High dielectric strength, surface and volume resistivity
- Low smoke density
- RoHS, ELV and WEEE compliance

INDUSTRIAL GASKETS & EQUIPMENT

- Non-toxic
- Resistant to chemicals, acids & bases
- Easy to color with masterbatches
- UV and ozone resistance







Find out more about your
TPE solutions partner now.

elastron.com
elastron@elastron.com