



**'TORAY'**  
Innovation by Chemistry

CARBON FIBER & ADVANCED COMPOSITES

**'TORAY'**  
Innovation by Chemistry



# AT A GLANCE

Head Office

Tokyo, Japan

Established



1926

Paid-in Capital



147,873 million yen



Subsidiaries / Affiliates



306 (OVERSEAS: 194, JAPAN: 112)

Employees



48,140

Consolidated Net Sales



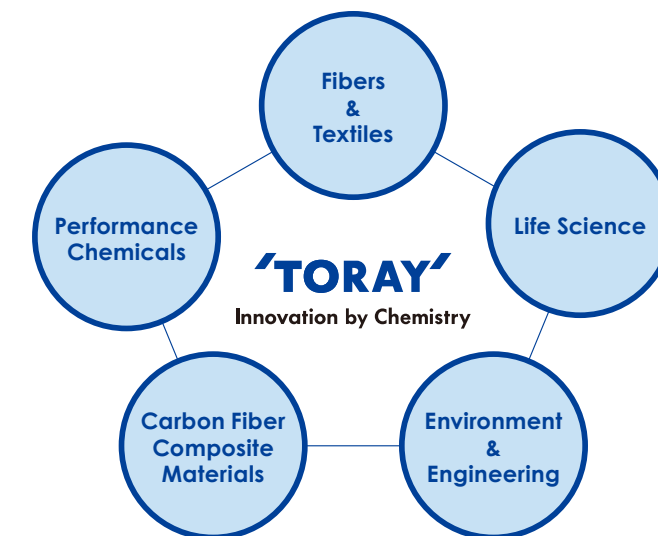
2,464.6 billion yen  
As of March 31, 2024

# ABOUT TORAY

Toray Group strongly believes in making a meaningful contribution to society. In accordance with this, we offer innovative technologies and advanced materials to our partners around the world so that together we can provide optimal market solutions.

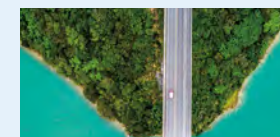
Corporate Philosophy

Contributing to society through the creation of new value with innovative ideas, technologies and products



## SUSTAINABILITY VISION

### Goals : A Better World in 2050



A net zero emissions world, where greenhouse gas emissions are completely offset by absorption



A world where resources are sustainably managed



A world with a restored natural environment, with clean water and air for everyone



A world where everyone enjoys good health and hygiene

### Taking Action : Today's Challenges



Accelerating measures to counter climate change



Realizing sustainable, recycling-based use of resources and production



Providing clean water and air

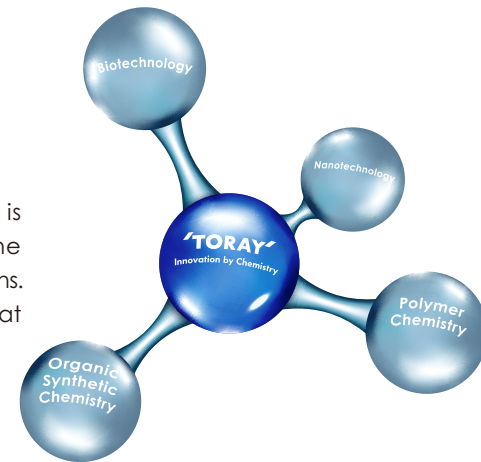


Contributing to better medical care and hygiene for people worldwide



# TORAY'S R&D

"The Deeper, the Newer." This key phrase has been passed down at Toray and is part of the DNA of our researchers and engineers. The concept underlying the phrase is that by digging deep into something, we reach new discoveries and inventions. With this in mind, we continuously challenge ourselves to create innovations that offer both social and economic value.



## Commitment to Basic Research



We prioritize basic research that is based on a grand vision for society and recognizes the value of materials, while remaining uninfluenced by short-term trends. This provides a fertile foundation for the continued creation of innovative and advanced materials like our carbon fibers and reverse osmosis membranes.

## Long-term and Ongoing Efforts in Pursuing the Ultimate Limits

Our commitment to the steadfast pursuit of R&D is expressed in our persistent and long-term efforts to unlock the ultimate potential of technology and advanced materials. We believe this "super-continuity" approach spurs innovation.



## Undivided R&D Organization

Toray has centralized all of its R&D functions into a single organization called the Technology Center. Bringing together specialists from many fields, this unified R&D organization encourages new innovation by integrating technologies. At the same time, it enables Toray to exhibit its combined strength by actively exploiting techniques and knowledge from many fields to solve problems in a single business area.



# TORAY'S TECHNICAL FIELDS

Toray's core technologies are "organic synthetic chemistry," "polymer chemistry," "biotechnology" and "nanotechnology." Based on these, we are creating advanced materials and developing businesses in the fields of electronics & information materials, carbon fiber composite materials, pharmaceuticals, medical devices, and water treatment.



### TORAY's Core Technologies

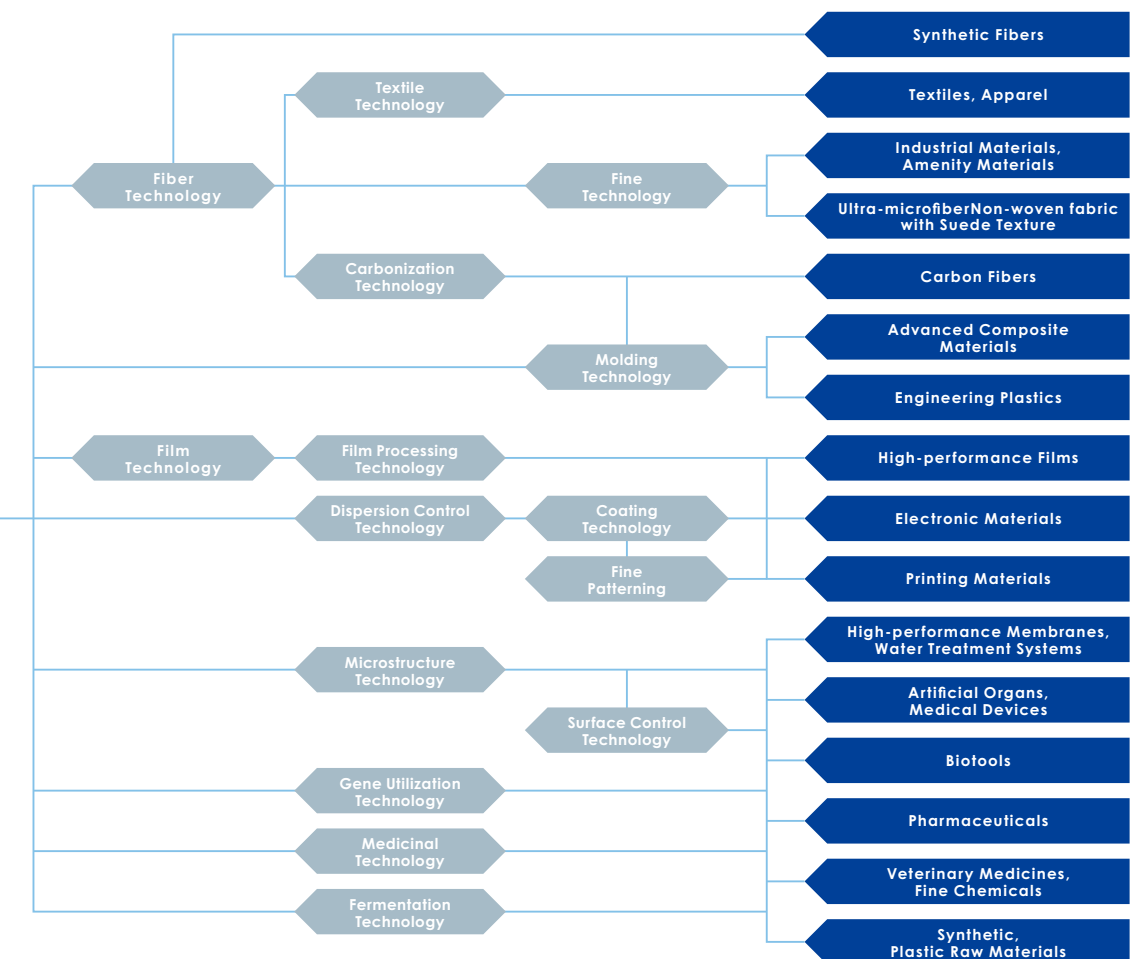
Polymer Chemistry

Organic Synthetic Chemistry

Biotechnology

Nanotechnology

Material Design



## World-Leading Carbon Fiber

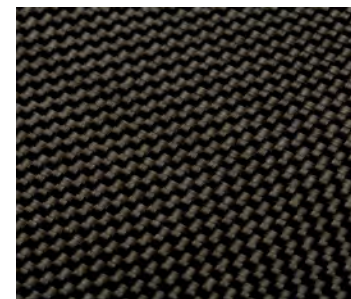
Toray began production of TORAYCA® PAN-based carbon fiber in 1971, and has since become recognized as the de facto standard for technical excellence and quality for carbon fiber across aerospace, sporting goods, motorsport and industrial applications.

TORAYCA® carbon fiber exhibits exceptional mechanical properties, excellent processability and is available from a secure and stable supply chain, globally.



## A Comprehensive Range of Products and Vertical Integration

Toray supplies the most comprehensive range of carbon fiber materials in the market, covering high-performance premium fiber for aircraft applications, to the cost-competitive large tow, large volume fiber produced by our subsidiary Zoltek. Our capabilities also include fabric, prepreg, and intermediary materials thanks to strategic investments in technology and processing capabilities. Toray's prepreg technology spans both thermoset and thermoplastic chemistries, strengthened by our acquisition of TenCate Advanced Composites in 2018 (which has since changed its name to Toray Advanced Composites in 2019). Additionally, Toray brings customized and tailored material solutions by working in partnership with our customers, to ensure the right solution for the job and to support the advancement of composite materials in the market.



## Global Operations / Local Support

Toray manufactures TORAYCA® carbon fiber globally in Japan, Korea, France and the USA, ensuring a stable supply and responsive deliveries based on local operations. Intermediate material production sites have also been established across Asia, Europe, and America, ensuring full, vertically-integrated supply chains on a local level.



## Contributing to the Creation of New Value and a Sustainable Future Through Technology and Collaboration

Harnessing technical knowledge and expertise gained through over 40 years in the composites industry, Toray continues to support and invest in the progression of composite material technology together with its customers, industry partners and tech-

nology institutes. Our in-house technical expertise across the composite value chain, and our extensive technology portfolio across thermoplastic and thermoset technologies foster workable innovations across the composite material supply chain.

## Toray's Value in Major Applications

### Mobility (Aerospace)

- ▶ Toray materials are available in many product formats (CF, Fabric, Thermoset/Thermoplastic Prepreg, UD Tape, Laminate, etc.) and are compatible with various processing technologies, including AFP/ATL, RTM, Autoclave, OoA/VBO, and Press Molding.
- ▶ Our extensive material databases have been trusted by customers for over 30 years and help shorten development cycle times.
- ▶ Toray is working to solve urban traffic issues with its UAM development.

### Mobility (Automotive)

- ▶ Toray materials are available in many product formats (TORAYCA® Regular Tow/Z600/Large Tow CF, Fabric, Thermoset/Thermoplastic Prepreg, ET40 Prepreg, Chopped Fiber, CF-SMC, etc.) and are compatible with various processing technologies, including High Cycle RTM, Autoclave, OoA, Press Molding, and Injection Molding.
- ▶ Toray proposes cost-competitive solutions for mass-market cars, while achieving weight reduction by supporting designs for CFRP and multi-material compositions with metal.
- ▶ Toray improves the reliability of composite material performance by providing simulation technology for structures and processes, such as the draping of dry textiles and flow of CF-SMC.

### Energy

- ▶ Toray contributes to creating a sustainable world by supplying ZOLTEK's large tow carbon fiber, PX35, for wind turbine blade applications and TORAYCA® carbon fiber for CNG tank applications as de facto standard materials.
- ▶ Toray will focus more on supplying materials for CHG tank applications, both for carbon fiber used in cylinder reinforcement and electrode base materials for fuel cell systems.

### Quality of Life

- ▶ Over the years, Toray has contributed to improving quality of life in the fields of sports, marine products, civil engineering, consumer electronics, and more.
- ▶ Toray will focus more on creating new innovations for applications used in medicine, nursing, and space & communication with its composite solutions.

### Recycling

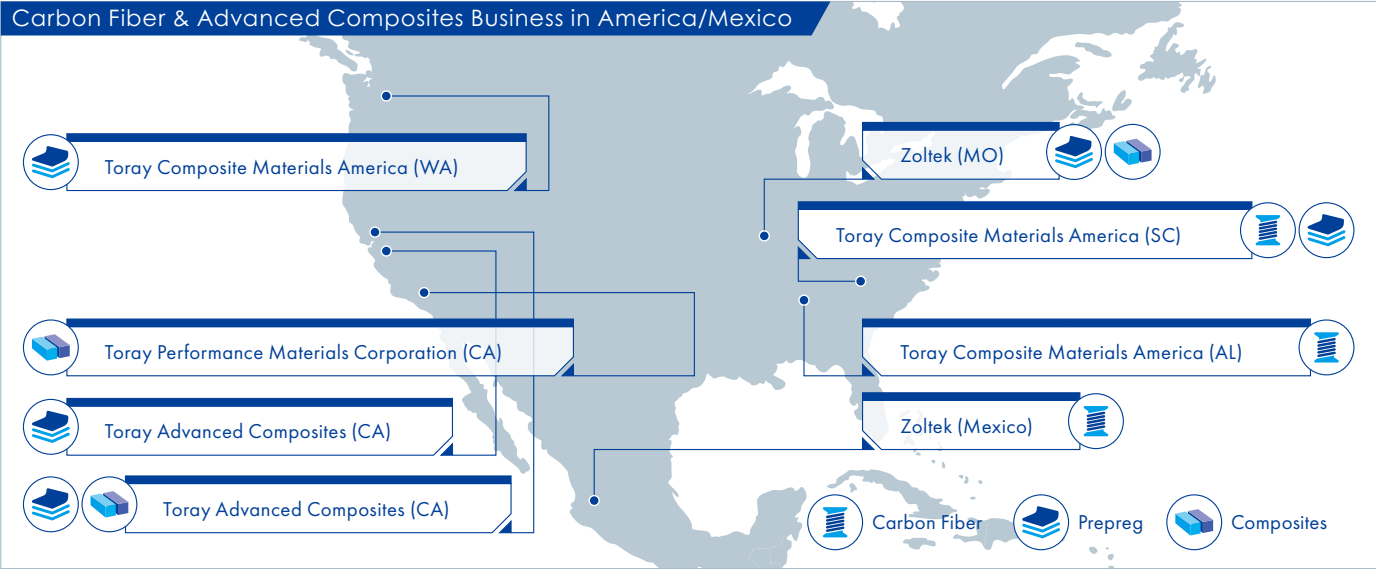
- ▶ Toray contributes to creating a sustainable world through recycling technology used in both its thermoset and thermoplastic composite products.

# VERTICAL INTEGRATION AND GLOBAL OPERATIONS

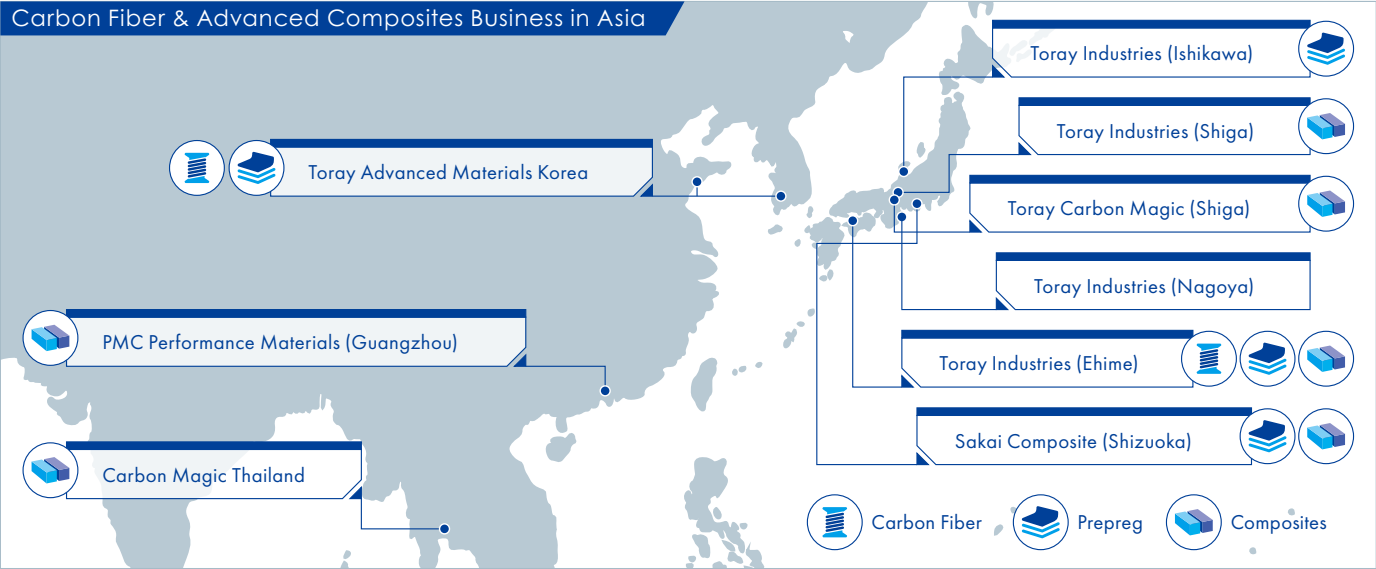
As a world leader in carbon fiber and advanced composites, Toray has established a vertical integrated supply chain and is fully committed to supporting our customers by providing reliable performance, a stable supply and responsive deliveries of products.

Base	Carbon Fiber	Intermediate Material / Prepreg, Fabric, etc.	Composite / Molded Products
Japan Asia	Toray Industries (Ehime Plant)		
		Toray Industries (Ishikawa Plant)	Toray Industries (Shiga Plant)
		Sakai Composite	
	Toray Advanced Materials Korea (TAK)		Toray Carbon Magic (Japan & Thailand) PMC Performance Materials (Guangzhou)
USA Mexico Hungary	Toray Composite Materials America (CMA)		
	Zoltek de Mexico	Zoltek Corporation	
		Toray Advanced Composites	
			Toray Performance Materials Corporation
France Italy Germany Netherlands	Toray Carbon Fibers Europe (CFE)		
		Composite Materials (Italy)	euro advanced carbon fiber composites (eacc)
		Delta Preg	
		Toray Advanced Composites	
	Zoltek (Hungary)	Zoltek (Hungary)	
			ACE Advanced Composite Engineering

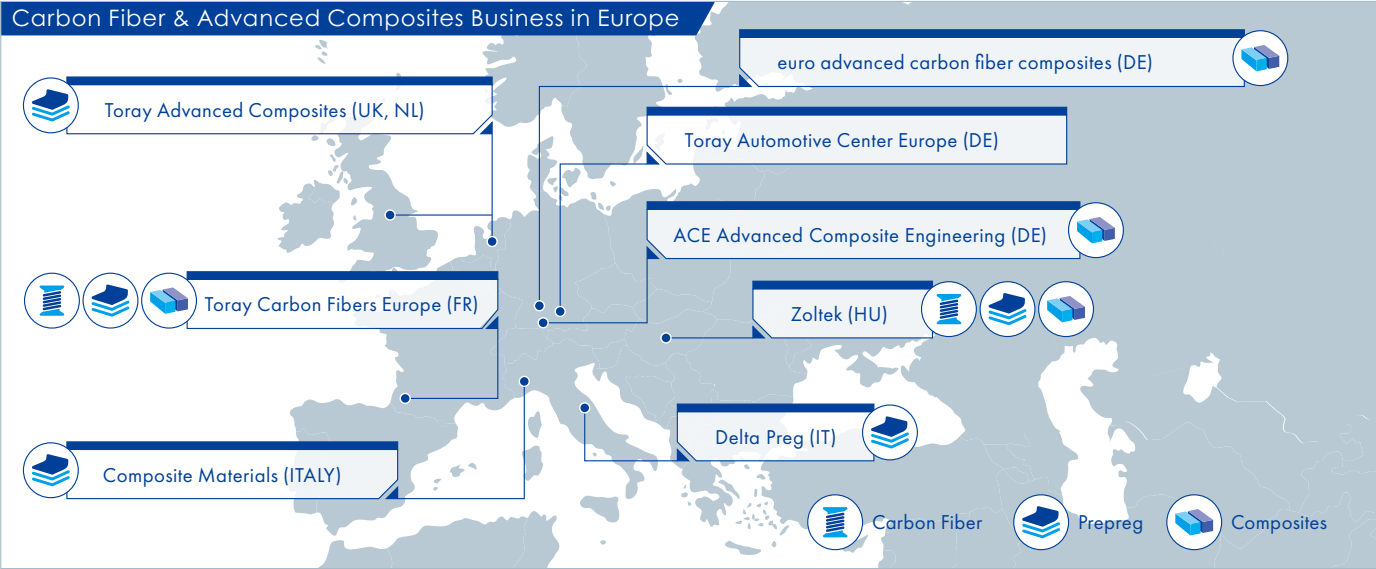
Carbon Fiber & Advanced Composites Business in America/Mexico



Carbon Fiber & Advanced Composites Business in Asia



Carbon Fiber & Advanced Composites Business in Europe



# GROUP COMPANY BUSINESSES



## TORAY COMPOSITE MATERIALS AMERICA (CMA)

CMA has the largest carbon fiber and prepreg capacity in North America, with a diverse customer base in the aerospace, defense, industrial, and automotive industries. CMA's Tacoma plant began producing carbon fiber prepreg in 1992. It is adjacent to Boeing's Composite Manufacturing Center to enable an efficient supply stream of Toray's carbon fiber composite materials for Boeing and other customers in the US. First used on the Boeing 777, its prepreg is incorporated into the 777 and 787

primary structures and the 777X wing. CMA has a fully-integrated supply chain producing precursor and carbon fiber in its Decatur plant, and precursor, carbon fiber, and prepreg in a single manufacturing facility in Spartanburg. This is the cornerstone of Toray's growth in North America, addressing critical supply chain redundancies and diversification.



## TORAY CARBON FIBERS EUROPE (CFE)

CFE began producing carbon fiber in 1982 in France and has forged a reputation as the European leader in the carbon fiber market, providing premium products under the TORAYCA® brand name that were developed to suit the varying needs of aerospace and other industries. Its strategy is to continue expanding sales in new and existing markets by working in close partnership with its customers as well as Toray group companies and producing high-quality carbon fiber, composites materials and Advanced Towpreg.



## TORAY ADVANCED MATERIALS KOREA (TAK)

TAK produces TORAYCA® carbon fiber in Korea for customers in Asia as well as customers worldwide. The fiber is used for various industrial applications, such as pressure vessels, automobiles, civil engineering works, and sports & leisure products. It also closely communicates with Toray Japan and its Asian sales channels to develop new business.



## ZOLTEK

ZOLTEK is a global leader in the production of industrial grade large tow carbon fiber and carbon fiber intermediate products for use in wind turbine blades, automotive parts, thermoplastic compounding, offshore drilling, civil engineering, marine works, and various other commercial products.

Since 2014, Zoltek has been a member of the Toray group and has expanded its production capacity to meet the world's growing demand. It is expected that large tow carbon fibers will be used more frequently in automobile structures in the future.



## TORAY ADVANCED COMPOSITES (TAC)

Toray Advanced Composites, acquired by Toray in July 2018, is a leader in the development and manufacture of a wide range of thermoset and Toray Cetex® thermoplastic-based advanced composite materials. With 4 manufacturing sites throughout Europe and the US, Toray Advanced Composites supplies a portfolio of prepreps in fabric, unidirectional tape, bulk molded compounds and reinforced thermoplastic laminate formats for use in aerospace, satellite and communication, space, motorsport and high-performance industrial applications. Additionally, Toray AmberTool® tooling prepreps have over 25 years of history in providing composite tooling material solutions.



## COMPOSITE MATERIALS (ITALY) (CIT)

CIT manufactures woven carbon, special fabrics, multiaxial, prepreps and unidirectional tapes. It also formulates and applies its own resins, mainly epoxy and phenolic, as well as other formulations depending on the designated use and areas of application, such as in industrial, aerospace, automotive, sports and leisure, medical, and civil engineering fields. Its approach to composites is both specific and global, translating the

customer's specific requirements into a product offer that satisfies their specific need, in the most efficient and effective way. This is made possible thanks to its ability to manage the entire production process. It has testing laboratories, weaving and impregnating equipment, and a staff of specialized engineers who understand the specific applications and customer requests in order to design the most suitable solution, all in-house.



## euro advanced carbon fiber composites (eacc)

eacc stands for innovation, expertise and cultural diversity. eacc primarily manufactures CFRP/GFRP visible automotive parts such as tailgates/decklids, front bonnets and wheel arches with a focus on large parts – innovative designs and new surfaces such as recycled carbon or special 3D structures are our stronghold. In the field of electromobility, we offer lightweight CFRP components such as battery housings and special components for high-performance electric motors. We have also been supporting non-automotive sectors such as medical technology, transport, wind energy and the food industry with future-oriented products for several years now. eacc manufactures carbon components precisely to customer specifications, in the highest quality, efficiently and in a robust RTM/SMC/PCM process. Our portfolio also includes development activities such as concept creation, material selection, product design and FEA, collaborating with the customer from initial development across series production.



## DELTA-TECH / DELTA-PREG (DELTA)

DELTA-PREG is a prepreg manufacturer, whose unique products are developed and engineered by parent company DELTA-TECH. Both companies have been members of Toray Group since 2015. DELTA is highly rated for its strongly customer-oriented and responsive attitude, offering the composite market an extensive portfolio of prepreps as well as on-site technical support. Mechanical characterizations from its internal testing facilities are also available upon customer request, while internal R&D constantly works to meet new market requirements. Its prepreps are widely used in the high-end automotive industries globally, as well as in racing cars and bikes, sports and leisure and the industrial sector.



## TORAY CARBON MAGIC (TCM)

TCM is an expert in making full use of the weight-reducing designs and technologies and the carbon fiber reinforced plastic molding and processing technologies that have been cultivated through years of race car development. It dramatically improves the performance of various parts and structures used in various industries, such as automobiles, motorcycles, aircraft, aerospace, drones, railways, industrial equipment, medical equipment, and sports. This is due its expertise in design, analyses, trial production, and mass production of precision and complicated parts and large structures. Its products are developed, designed, and prototyped in Japan and mass-produced at its subsidiary in Thailand, Carbon Magic Thailand, with optimized processes and cutting-edge equipment.



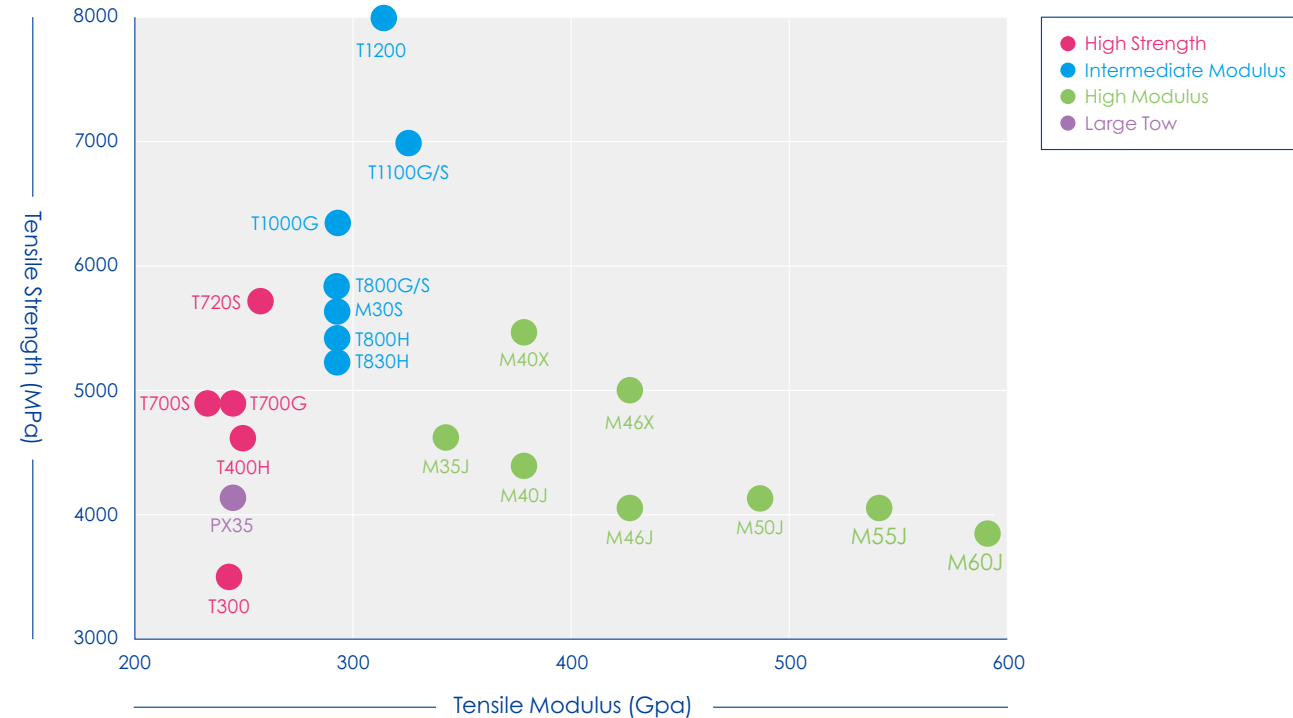
## TORAY PERFORMANCE MATERIALS CORP. (TORAY PMC)

TORAY PMC, a subsidiary of TORAY ADVANCED COMPOSITES, produces components from thermoplastic composite materials. Its Toray CFRT® composites have unique attributes, and when used strategically, can reduce weight significantly while increasing stability, strength and resiliency. They are tunable from one end of the component to the other. Toray PMC works with its customers to design custom parts that are truly engineered. It provides engineering services related to design, development, analysis and production of components from continuous fiber reinforced thermoplastic composites. Its focus is on performance, cost, aesthetics, quality and manufacturability.



# CARBON FIBER PORTFOLIO

Toray supplies the most comprehensive range of carbon fiber materials in the market, covering high- performance premium fiber for aircraft applications, to the cost- competitive large tow, large volume fiber produced by our subsidiary Zoltek.



## FEATURES

### M55J

- ▶ Ultra high modulus fiber
- ▶ Suitable for satellite and high-end industrial use
- ▶ Industrial standard for large scale satellites and high end automobiles

### PX35

- ▶ Standard for large tow fiber
- ▶ Available both in continuous fiber and chopped fiber

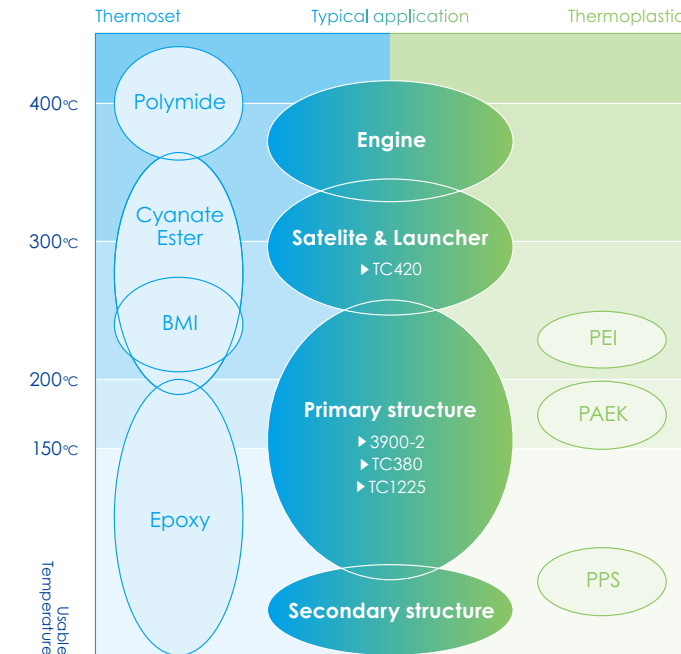
### T1100G/S

- ▶ "State of the art" high tensile strength among Toray's intermediate modulus fiber lineup
- ▶ Suitable for high-end applications

# RESIN PORTFOLIO

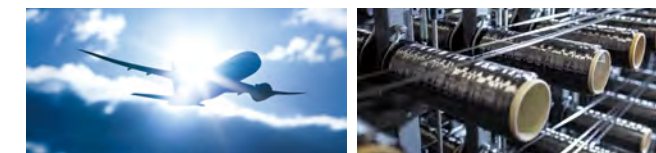
▶ learn more on the following pages

We supply a comprehensive range of resin and prepreg lineups for aerospace, sports & broad industrial applications.

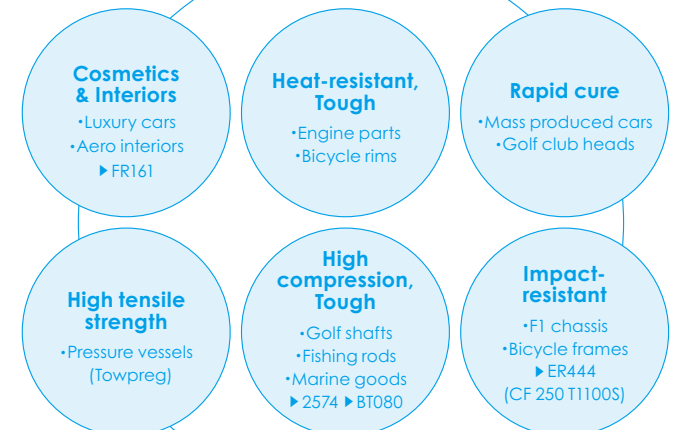


## Aerospace Applications

We have both thermoset and thermoplastic resins from low to high usable temperature grades to cover all typical aerospace applications.



## AUTOMOTIVE



## QUALITY OF LIFE

## ENERGY

## Sports & Industrial Applications

We have various resin and prepreg grades to meet a wide range of different requirements, particularly from sport and industrial markets based on specifications other than usable temperature.



# RESIN PORTFOLIO HIGHLIGHTS : Aerospace

## Primary Structure: Epoxy - 3960 : Toray Composite Materials America -

### Product Information

#### Resin type

Epoxy

#### Features

- Proven technology
- Highly toughened
- Flexible layup methods

#### Process

Autoclave & Over Cure

#### Offered by

Toray Composite Materials America

#### Other Lineups

2510 (Toray Composite Materials America)

2511 (Toray Composite Materials America)

3990 (Toray Composite Materials America)

#### Applications

- Primary aerostructures  
To be registered in CMH-17 (Q4 2025)



Bell V-280

Maximum Service Temperature	130 °C
Typical Cure Temperature	180 °C
Typical Cure Cycle	120 minutes 180 °C
Post-cure (when needed)	-
Shelf life	42 days

## Primary Structure: Epoxy (OoA) - TC380 : Toray Advanced Composites -

### Product Information

#### Resin type

Epoxy

#### Features

- Excellent open hole compressive strength
- High CAI strength 289 MPa (42 ksi)
- Excellent hot/wet strength retention

#### Process

Autoclave OoA/VBO

#### Offered by

Toray Advanced Composites

#### Other Lineups

TC275-1 (Toray Advanced Composites)

2510 (Toray Composite Materials America)

2511 (Toray Composite Materials America)

3960 (Toray Composite Materials America)

#### Applications

- Launchers
- Aerostructures



Aerostructures

Maximum Service Temperature	120°C
Typical Cure Temperature	180 °C
Typical Cure Cycle	60 minutes @ 107°C + 120 minutes @ 180°C
Post-cure (when needed)	Possible
Shelf life	Up to 28 days at ambient temperature

## Primary Structure: Thermoplastics - Toray Cetex® TC1225 : Toray Advanced Composites -

### Product Information

#### Resin type

Engineered PAEK (PolyArylEtherKetone) Thermoplastics

#### Features

- Relatively low processing temperature enables shorter cycle times
- Excellent toughness and Compression After Impact (CAI) resistance
- Very low moisture absorption

#### Process

ATL/AFP – Autoclave/OoA/Press Molding

#### Offered by

Toray Advanced Composites

#### Other Lineups

TC1100 (PPS, Toray Advanced Composites)

TC1200 (PEEK, Toray Advanced Composites)

TC1320 (PEKK, Toray Advanced Composites)



Fuselage Structures

#### Applications

- Aerostructures

Maximum Service Temperature	130°C
Process Temperature Range	320–380°C
Shelf life	Indefinite at ambient temperature

## High Temperature Materials: Cyanate Ester TC420: Toray Advanced Composites

### Product Information

#### Resin type

Cyanate Ester

#### Features

- Excellent elevated temperature properties
- Elevated glass transition properties with post cure

#### Process

Autoclave, or Out of Autoclave

#### Offered by

Toray Advanced Composites

#### Other Lineups

RS8-HT BMI, RS51 PI

#### Applications

- High temperature aerostructures
- Aircraft engines



Spacecraft Heatshield

Maximum Service Temperature	260°C continuous 315C short term
Initial Cure Temperature	180°C
Typical Cure Cycle	120 minutes @ 80 °C + 90 minutes @ 235 °C (post cure)
Post-cure (when needed)	Possible
Shelf life	Up to 21 days at ambient temperature



# RESIN PORTFOLIO HIGHLIGHTS :

# Sports & Industry

## Racing & Automotives - ER444(CF 250 T1100S) : Composite Materials (Italy) -

### Product Information

#### Resin type

Epoxy

#### Features

- T1100S fiber based fabric
- The best performing prepreg for F1 chassis

#### Process

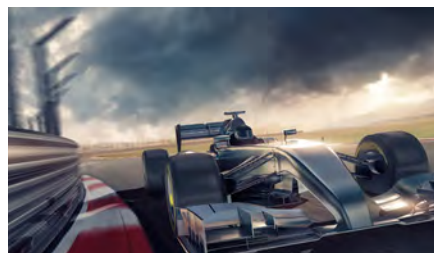
Autoclave

#### Offered by

Composite Materials (Italy)

#### Applications

- F1



F1 Chassis Side Intrusion Panel

Tg (DMA)	145°C
Typical Cure Temperature	120°C-135°C
Typical Cure Cycle	120 minutes @ 135°C
Post-cure (when needed)	-
Shelf life	10 days

## Sports - 2574 : Toray Industries - NANALLOY TECHNOLOGY

### Product Information

#### Resin type

Epoxy

#### Features

- High compressive properties

#### Process

- Autoclave
- Oven
- Hot press molding

#### Offered by

Toray Industries

#### Applications

- Sporting goods
- General industry



Sumitomo Rubber XXIO 11 • Pinarello DOGMA F12

Tg E'(DMA)	130°C
Cure Temperature Range	130°C
Typical Cure Cycle	120 minutes @ 130°C
Post-cure (when needed)	-
Shelf life	30 days

## Marine Applications - BT080 : Delta-Preg -

### Product Information

#### Resin type

Epoxy

#### Features

- High compressive properties

#### Process

- Oven (Out of Autoclave)
- Autoclave

#### Offered by

Delta-Preg

#### Applications

- Marine
- General industry



Marine Applications

Tg (DMA)	140°C
Cure Temperature Range	80°C-120°C
Typical Cure Cycle	12 hours @ 80 °C (OoA)
Post-cure (when needed)	60 minutes @ 120°C
Shelf life	60 days

## Interior - FR161 : Delta-Preg -

### Product Information

#### Resin type

Epoxy

#### Features

- Flame retardant system to meet the below regulations.

Regulation	Category
EN45545-2	- Flammability - Heat Release - Smoke Density - Gas Toxicity
FAR 25.853	- Flammability - Heat Release - Smoke Density
UL-94	- V-0

- Good mechanical performance

#### Process

Autoclave, Press molding

#### Offered by

Delta-Preg

#### Applications

- Aero interiors
- Railway



Aero Interior Applications

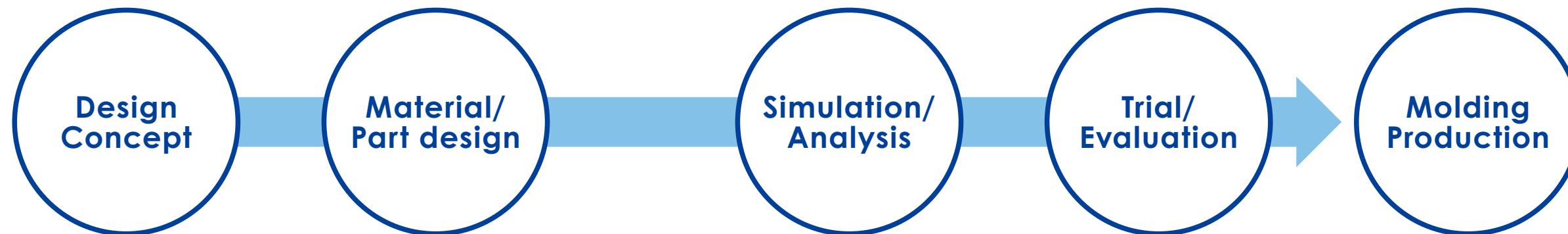
Tg (DMA)	160°C
Typical Cure Temperature	120°C-135°C
Typical Cure Cycle	120 minutes @ 135°C
Post-cure (when needed)	60 minutes @ 120 °C (Autoclave) 20 minutes @ 145 °C (Press)
Shelf life	30 days

# COMPOSITE SOLUTIONS

## From Design to Production

Toray provides comprehensive solutions and full process support from design to molding production in order to co-develop new programs with our valued customers.

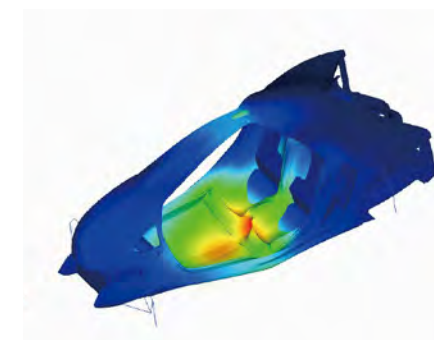
-  Toray (Automotive Center)
- Toray Carbon Magic
- Tokyo R&D
- Toray Engineering
- Toray Research Center
-  Carbon Magic Thailand
-  Toray (Automotive Center Europe)



Our design services provide full support to our customers in the early stage of their projects.



Technological material development as a leading CF supplier. Proposing optimized materials from a variety of recipes.



Proposing optimized designs to take advantage of the CFRP materials.



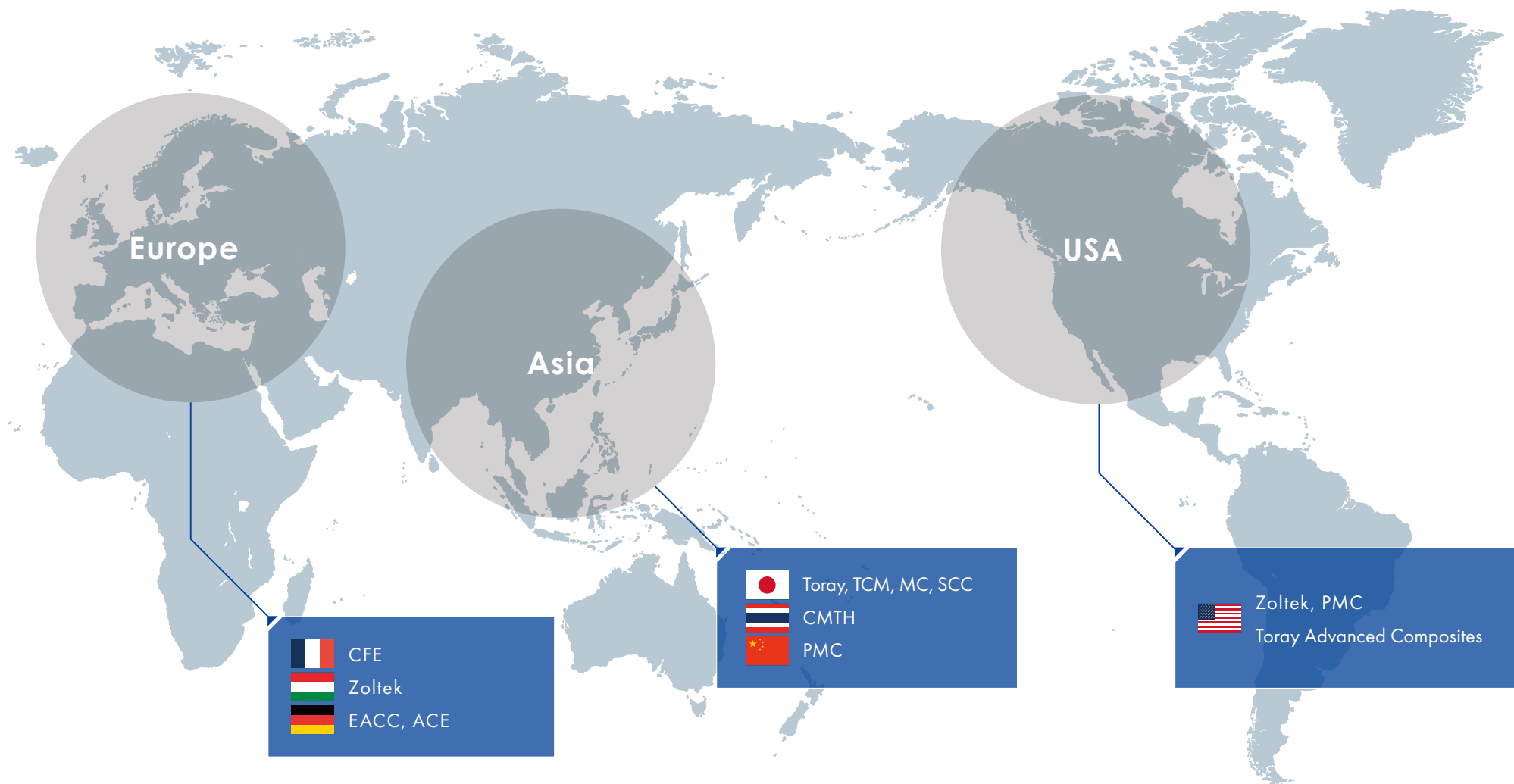
Evaluating from various angles to confirm performance works as designed. Toray Group owns a variety of the latest evaluation facilities.



Proposing a variety of molding processes for generating high quality molding production, such as Auto-clave, Resin Transfer Molding, Pultrusion, Filament Winding, and Press molding.

# COMPOSITE PRODUCTION

## Our Global Network for Composite Production Enables Us to Provide Optimal Molding Solutions for Our Customers Around the World



## Composite Processes



### Resin Transfer Molding (RTM)

With RTM, a dry continuous carbon fiber preform is placed within a closed mold. Thermoset resin is then injected, under pressure, to combine with the fabric and cure in-situ, to create a composite part. Our RTM has "A-coat" technology to allow for a no-primer painting process.



### Sheet Molding Compound (SMC)

SMC utilizes chopped carbon fibers, set within a resin matrix which is then compression molded. This is suitable for the production of high volume composite components that include thin-walled structures, and results in excellent part reproducibility.



### Autoclave (AC)

Autoclave curing of composite components transforms intermediary composite products into finished parts, through the application of heat and pressure to cure or consolidate laminates and remove voids. Our AC process is an established and trusted solution for Formula 1 and Motorsport applications.



# LOCATIONS

## JAPAN

### Toray Industries, Inc. Tokyo Head Office

Nihonbashi Mitsui Tower, 1-1, Nihonbashi-Muromachi 2-chome, Chuo-ku, Tokyo 103-8666, Japan  
**TEL** (81) 3-3245-5111

### Osaka Head Office

Nakanoshima Mitsui Bldg., 3-3, Nakanoshima 3-chome, Kita-ku, Osaka 530-8222, Japan  
**TEL** (81) 6-6445-4101

### Toray Carbon Magic Co., Ltd.

215-1 Miyoshi, Maibara, Shiga 521-0023, Japan  
**TEL** (81) 749-54-2828

**Main Business:** Research, development, design, manufacturing and marketing of CFRP composites

## AMERICAS

### Performance Materials Corp. (PMC)

1150 Calle Suerte, 93012 Camarillo, CA, U.S.A.  
**TEL** (1) 805-482-1722

**Main Business:** Manufacturing and marketing of thermoplastic composites and laminates for the sporting goods, footwear and medical markets.

### Toray Composite Materials America, Inc. (CMA)

#### Head Office and Tacoma Plant:

19002, 50th Ave. E., Tacoma, WA 98446, U.S.A.  
**TEL** (1) 253-846-1777

#### Decatur Plant:

2030 Highway 20 Decatur, AL 35601, U.S.A.  
(P.O. Box 248, Decatur, AL 35602, U.S.A.)  
**TEL** (1) 256-260-2626

#### Spartanburg Plant:

2202 Moore-Duncan Highway, Moore, SC 29369, U.S.A.  
**TEL** (1) 864-586-3444

#### Dallas Office:

700 Parker Square Suite 275, Flower Mound, TX 75028, U.S.A.  
**TEL** (1) 972-899-2930

**Main Business:** Development, manufacturing and marketing of polyacrylonitrile-based carbon fibers and carbon fiber prepreg

### Zoltek Corporation (ZUS)

3101 McKelvey Road, Bridgeton, MO 63044, U.S.A.  
**TEL** (1) 314-291-5110

**Main Business:** Manufacturing and marketing of large tow carbon fiber composite materials

### Toray Advanced Composites USA Inc. (TACUS)

18255 Sutter Blvd. 95037 Morgan Hill, CA, U.S.A.  
**TEL** (1) 408-465-8500

**Main Business:** Manufacturing and marketing of thermoplastic UD tapes, thermoset prepregs, surfacing films, molding compounds and adhesives for the aerospace and industrial markets

### Toray Advanced Composites ADS LLC (TACADS)

2450 Cordelia Road, 94534 Fairfield, CA, U.S.A.  
**TEL** (1) 707-359-3400

**Main Business:** Manufacturing and marketing of thermoset prepregs and molded parts for the aerospace and industrial markets

### Zoltek de Mexico S.A. de C.V. (ZMX)

Km. 3 Carretera a El Salto, El Salto, Jalisco, Mexico 45680  
**TEL** (52) 33-3284-3333

**Main Business:** Manufacturing and marketing of large tow carbon fiber composite materials

## EUROPE

### Composite Materials (Italy) s.r.l. (CIT)

Via Quasimodo, 33, 20025 Legnano (Milano), Italy  
**TEL** (39) 0331-467-555

**Main Business:** Manufacturing and marketing of carbon fiber fabrics and prepregs

### Delta-Preg S.p.A.

Localita Bonifica del Tronto, 64016 Sant'Egidio alla Vibrata (TE), Italy  
**TEL** (39) 0861-815106

**Main Business:** Manufacturing and Sales of carbon fiber prepregs

### Delta-Tech S.p.A.

Localita Rifoglieto 60a/int.1, 55011 Altopascio (LU), Italy  
**TEL** (39) 0583-269080

**Main Business:** Development and manufacturing of resin matrices for carbon fiber prepregs

### euro advanced carbon fiber composites GmbH (eacc)

Fritz-Mueller-Strasse 11-27, 73730 Esslingen, Germany  
**TEL** (49) 711-18-5678-20

**Main Business:** Manufacturing and marketing of CFRP parts and components

### Toray Advanced Composites Netherlands B.V. (TACNL)

G.van der Muelenweg 2, 7443 RE Nijverdal, The Netherlands  
**TEL** (31) 548-633-933

**Main Business:** Manufacturing and marketing of thermoplastic and thermoset composite materials

### Toray Advanced Composites UK Ltd (TACUK)

Amber Drive, NG16 4BE Langley Mill, Nottingham, United Kingdom  
**TEL** (44) 1773-530899

**Main Business:** Manufacturing and marketing of thermostat and thermoplastic prepregs

### Toray Carbon Fibers Europe S.A. (CFE)

RD817, 64170 Lacq, France  
**TEL** (33) 5-59-60-71-00

#### Paris Office:

18-20 Avenue de la Porte d'Italie, 75013 Paris, France  
**Email** sales.cfe.mb@mail.toray

#### German Office:

c/o HQ, 1st Floor, Dornhofstr.34, D-63263 Neu-Isenburg, Germany  
**Email** sales.cfe.mb@mail.toray

**Main Business:** Manufacturing and marketing of carbon fibers, composite pultruded products and Advanced Towpreg

### Toray International U.K. Ltd. (TIUK)

7th Floor, 69 Leadenhall Street, London, EC3A 2BG, England, U.K.  
**TEL** (44) 20-7663-7700

**Main Business:** Trading activities

### Zoltek Zrt. (ZHU)

Varga Jozsef ter 1 Nyergesujfalu, Hungary 2537  
**TEL** (36) 33-536-000

**Main Business:** Manufacturing and marketing of large tow carbon fiber materials

## ASIA

### PMC Performance Materials (Guangzhou) Ltd. (PMCGZ)

48 Hongmian Avenue, Guangzhou  
**TEL** (86) 020-36872887

**Main Business:** Manufacture and marketing of thermoplastic composites for the footwear and consumer electronics markets.

### Toray Advanced Materials Korea Inc. (TAK)

Korea Toray R&D Center, 7, Magokdong-ro 10-gil, Gangseo-gu, Seoul, 07790, Republic of KOREA  
**TEL** (82) 2-3279-1000

**Main Business:** Manufacturing and marketing of PET film, PET film fabricated products, polyester filament yarns, polyester staple fibers, spunbond non-woven fabrics, carbon fibers, water treatment products and PPS resin and compounds

### Toray International (China) Co., Ltd. (TICH)

8th Floor, Park Place, 1601 West Nanjing Road, Jing An District, Shanghai 200040

**TEL** (86) 21-3251-8558

**Main Business:** Trading activities

### Toray International India Private Limited (TIID)

Equinox Business Park Tower 3, 6th Floor, Lal Bahadur Shastri Marg Kurla, Mumbai 400070 Maharashtra, India

**TEL** (91) 22-6123-0400 (or 0401, 0402, 0403, 0404)

**Main Business:** Trading activities

### Toray International Singapore Pte. Ltd. (TISP)

111 Somerset Road, #14-01, Singapore 238164, Republic of Singapore  
**TEL** (65) 6533-3288

**Main Business:** Trading activities

### Toray International Taipei Inc. (TIIP)

6th Floor, No. 451, Changchun Road, Songshan District, Taipei 10547  
**TEL** (886) 2-2716-5000

**Main Business:** Trading activities