



THE R. J.
MARSHALL
COMPANY

**Fiber Blends &
Compounds for Maximum
Performance & Economy**
~Since 1980~



Expanded Blends and Compounds

- Lower raw material cost
- High reinforcement strength (High tensile)
- Improved viscosity control (Slump resistance)
- Rapid dispersibility (Lower processing costs)
- Excellent chemical resistance

ARAMID (AR)	DESCRIPTION	APPLICATIONS
AR990, AR991	Aramid / Talc	High tensile thermoset, High tensile asphalt & elastomeric roof coatings, mastics, & adhesives
AR59CB	Aramid / Carbonate	Sealants
AR36IA	100% expanded aramid	Fire break compounds
POLYETHYLENE (PE)		
PE210, PE230, PE250 PE270, PE290, PE2000 PE245SL	Polyethylene / Talc	Asphalt & Elastomeric
PE24JA, PE26JA	100% polyethylene pulp	Roof coatings, sealants, mastics, caulks, crack resistant stuccos & plasters
KAYOCEL (KA)		
KA1690, KA650	Secondary cellulose / Calcium carbonate	Asphalt roof coatings, mastics, friction brakes, clutches & gaskets
6W100, 16W100, 6W50	Primary cellulose	Acoustical / textured paints
SPECIALTY BLENDS		
105MA	Polyethylene / Glass	"Non-balling" tire sealant
APC/54JA, APC/9KA	Proprietary	Glass atomized protective coat
FH80, FH200	Hardwood fiber	Glass partitioning agents

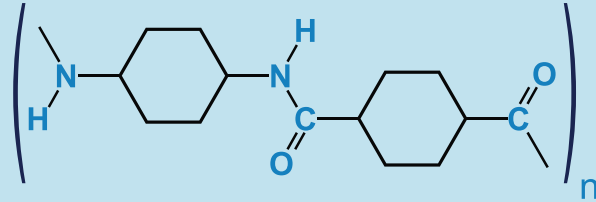


Marshall Additive
TECHNOLOGIES
DIVISION OF THE R.J. MARSHALL COMPANY

FIBER FACTS

ARAMID - Poly-para-phenylene terephthalamide

One of the strongest synthetic reinforcing fibers known.



ARAMID STAPLE FIBER - Aramid yarn or chopped yarn. (needle like structure)

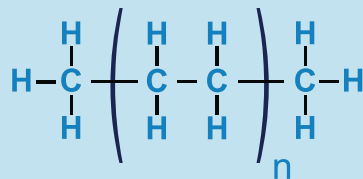
ARAMID PULP - Highly fibrillated Aramid fiber

EXPANDED ARAMID PULP - An Aramid pulp that has been processed to impart greatest surface area thus maximizing physical properties and ease of dispersibility.

FIBER BLENDS - A blend of two or more fibers or fibers and pulps.

FIBER COMPOUNDS - A mixture of a pulp and non-fibrous functional or non-functional (filler) material.

POLYETHYLENE - $(C_2H_4)_n$, a linear hydrocarbon, has a density of 0.91-0.96 g/cc, a melting point of 115-135°C, and is known for high chemical resistance and inertness. The pulp is highly fibrillated and an excellent reinforcing fiber.



PRIMARY CELLULOSE - A bleached and purified natural wood or cotton derived polysaccharide, having a density of 1.5g/cc, and used to manufacture of paper and food products. Cellulose have relatively high water and oil absorption. Cellulose decomposes at 260-270°C.


SECONDARY CELLULOSE PULP - A cellulose from reclaimed news and magazine stock.

Other Products From Marshall Additive Technologies

ResNsand Ultra:


A series of sized polycarbonate particles that disperse clear in clear coat thermoset resins and considerably increases the abrasion resistance of the polymer. Its primary uses are anti-skid for thermoset poured floors, piers, decks, handicap ramps, shower stalls, baths, hot tubs and aircraft carrier decks.

POLYMER ENHANCING, CROSS-LINKABLE
ResNsand[®] Ultra
The Virtually Invisible Polymer/Resin Aggregate and Extender
Lightweight • Clear • Durable




ResNsand Ultra used on the deck of the USS Ronald Reagan

100% post-industrial recycled material
Zero Crystalline Silica
Zero Heavy Metals




Flame Retardants & Smoke Suppressants:

An extensive line of flame retardants and smoke suppressants including alumina trihydrate (1 μ m), magnesium hydroxide, zinc borate, zinc stannate and zinc hydroxystannate. Our C-TEC products are designed to be cost effective replacements for antimony trioxide and ammonium octamolybdate (AOM).




THE R.J. MARSHALL COMPANY



**Non-Halogen
Fire Retardants and
Smoke Suppressants**

- Aluminum Trihydroxide (ATH)
- Magnesium Hydroxide
- Antimony Oxide
- Antimony Oxide Replacements
- Ammonium Octamolybdate (AOM)
- AOM Replacements
- Zinc Borates
- Zinc Stannates



To discuss your specific requirements or to place sample orders or commercial orders, we encourage you to contact us at:

Marshall Additive Technologies

26776 West 12 Mile Road

Southfield, Michigan USA 48034

Telephone: 800-338-7900 or Customer Care: 888-514-8600

Fax: 877-717-5577

Email: salesinfo@rjmarshall.com

For more information, visit our website: www.Rjmarshall.com



**Marshall Additive
TECHNOLOGIES**
DIVISION OF THE R.J. MARSHALL COMPANY

NOTE: All statements, technical information and recommendations are based on tests we believe to be reliable. The accuracy or completeness is not guaranteed. The following is made in place of all warranties, expressed or implied. Our only obligation is to replace product proven to be defective. We shall not be liable for injury, loss or damage, direct or indirect, from using or not being able to use the product. Before using, customer must determine the suitability of the product for the intended use and customer assumes the responsibility.

August 2017