

Echo Couplant Solutions

<i>All Echo Ultrasonics® couplants have been formulated with operator safety and environmental regulations as a priority.</i>						
	Couplant	Key Benefits	Viscosity	Temperature Range	Corrosion Characteristics	
Ambient Temperature	SuperSoniX™	<ul style="list-style-type: none"> Highest performance gel couplant Expanded Ambient Temperature Gel couplant, not stringy or sticky Gel viscosity remains in place for overhead and vertical surfaces Broad operating range Slow drying Water-soluble Improved stability against corrosion salts 	Medium	-10 to 220°F -23° to 104°C	Very Good	
	UltraSoniX™	<ul style="list-style-type: none"> High performance Glycerin-free, in accordance with FAA Advisory Circular AC 25-29 Overhead/vertical application (medium and high viscosity) Slow drying Fast Wetting No nitrates, nitrites, glycol ethers or formaldehyde Water soluble, acrylic polymer, lower residue than most couplants 	High Medium	10 to 220°F -12° to 104°C	Very good Meets ASTM F519	

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Ambient	EchoPure™	<ul style="list-style-type: none"> • Couplant of choice for Phased Array Manual UT Inspection (PAMUT). Eliminates dry spots under the wedge and resulting element drop out. Improves defect reproducibility. • Complies with P91 steel inspection requirement for a water-free couplant. • Broadest temperature range for water-soluble couplants • No couplant build up which can result in false indications. • Very slow drying and salt stable • Overhead / vertical application • Excellent transducer lubrication 	High Medium Low Fluid	-60 to 350°F -51 to 176°C	Very good Meets ASTM F519
	SoniX™	<ul style="list-style-type: none"> • Salt stable (boiler and corrosion salts, etc.) • Strong lubricious coupling film • Fast Wetting • No nitrates, nitrites, glycol ethers or formaldehyde • Glycerin-free • Water soluble, cellulose based 	High viscosity fluid 40,000 cps	18° to 120°F -8° to 50°C	Very good Meets ASTM F519
	Forever Wedge	<ul style="list-style-type: none"> • High viscosity fluid for phased array and angle beam wedge attachment and for coupling delay lines • Won't dry, run, leach or dissolve with water or couplants • Eliminates the need to replace wedge couplant during inspections 	Fluid	-50 to 700°F -45 to 371°C	N/A

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	Glycerin	<ul style="list-style-type: none"> • GE approved for the inspection of CFM56-7B engine fan blades in accordance with service bulletin SB72-1033. • Packaged from USP glycerin, 99+% • Will not harden on equipment • Pumpable fluid • Boiling point 555°F / 290°C • Compatible with most plastics 	Low viscosity fluid	65° to 500°F 18° to 260°C	Can be corrosive to carbon steel and aluminum No corrosion effect on most plastics, fiberglass or composites
Powder	EchoMix Powder SINGLE	<ul style="list-style-type: none"> • ONE PART powder • Easily mixed in water • Good wetting • Salt resistant • No formaldehyde • Compact for shipping and storage • Water soluble • Operating range can be extended with propylene glycol antifreeze 	Medium gel 23,000 cps Adjustable low to high	32° to 120°F 0° to 50°C	Mild, short term ferrous corrosion inhibition
Specialty	Echo Shear Wave	<ul style="list-style-type: none"> • Transmit normal incidence shear wave • Water soluble • Easily removed with water wash • Low toxicity, non-irritating 	High viscosity paste	40 to 90°F 4° to 32°C	
	Echo Z+	<ul style="list-style-type: none"> • High acoustic impedance • Decreases surface noise • Ideal for rough surfaces and concrete • Strong ferrous corrosion inhibition 	Medium viscosity paste or Fluid	0 to 200°F -18° to 93°C	Strong ferrous corrosion inhibition
	Echo 8ZH	<ul style="list-style-type: none"> • For flow metering and long-term monitoring at elevated temperatures • Enhanced acoustic impedance • Reduces acoustic noise from rough surface 	Paste	Short term: -45 to 750°F Long term: -45 to 400°F	

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High Temperature	VersaSonic®	<ul style="list-style-type: none"> • Broad operating range – subzero to 700°F • Best performing UT couplant between 300 and 700°F • Fast Response, no wait time • Low smoke / Low toxicity /No char residue • Does not contain peanut oil 	Gel and paste	-10° to 700°F -23 to 371°C	Best long-term corrosion protection Meets ASTM F519
	HiTempco	<ul style="list-style-type: none"> • Less smoke than VersaSonic • No residue or varnish • Fast response, no wait time • Excellent corrosion inhibition • Non-toxic, non-irritating 	Paste	-50 to 775°F -45 to 412°C	Excellent corrosion inhibition
	EchoTherm™	<ul style="list-style-type: none"> • Most economical ultra-high temperature couplant for use above 700°F and in ports. • EchoTherm contains a plastic polymer which melts and begins to smoke at 750°F • Leaves plastic residue (char) 	Paste	200° to 1000°F 93 to 538°C	N/A
	EchoTherm Extreme™	<ul style="list-style-type: none"> • Highest performance extreme temperature couplant • Fast Response, no wait time • No plastic polymer / char residue • Broadest operating range • Low smoke 	Paste	-40° to 1250°F -40 to 675°C	Meets ASTM F519
Sonotech Replacement	Echo 700	<ul style="list-style-type: none"> • Replaces Sono 900 (discontinued) 	Paste	600 to 700°F 316 to 371°C	
	Echo 760	<ul style="list-style-type: none"> • Replaces Sono 950 (discontinued) 	Paste	600 to 760°F 316 to 404°C	
	Echo 775	<ul style="list-style-type: none"> • Replaces Sono 1100 	Paste	700 to 775°F 371 to 413°C	

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Fluid	EchoFLOW	<ul style="list-style-type: none"> Easily pumped in extreme cold environment Environmentally safe, approved for use on the Alaskan Tundra Water-soluble. 	Fluid	-40 to 150°F -40 to 65°C	N/A
	Echo 3HT	<ul style="list-style-type: none"> Water-soluble. No need to remove Least expensive intermediate temperature fluid 	Fluid	-30 to 350°F -34 to 177°C	
	Echo 6HT	<ul style="list-style-type: none"> Low-cost silicone-based fluid Replacement for peanut, canola and mineral oils Low in viscosity, which is maintained over a broad operating range. No sticky film, varnish or smoke Less subject to under insulation cracking (which leads to a lower auto-ignition temperature) 	Fluid	-40° to 675°F -40° to 357°C	Excellent
	Echo 8 HT™	<ul style="list-style-type: none"> Broadest operating range Three Viscosities: thin to very thick liquid for AUT and MUT Minimal smoke Excellent lubricant Low toxicity / Non-irritating Non-irritating Auto-ignition temperature: 850°F / 454°C 	Fluid	-50° to 800°F -45° to 425°C	Excellent