



The World's Leading Specialist in Spray Mist Equipment and Coolant



## **MIST COOLANT SYSTEMS**

**FLEXIBLE**

**RELIABLE**

**SAFE**

# Kool Mist General Purpose Models with Stainless Tank

General purpose models will handle most machine shop work such as drilling, tapping, pantographing, cutoff saws, band saws, surface grinders, etc. See Large capacity models for heavy milling and profiling, single point threading and turning, Blanchard grinding, large tool and cutter grinding, and large cutoff saws. *Air supply required.*

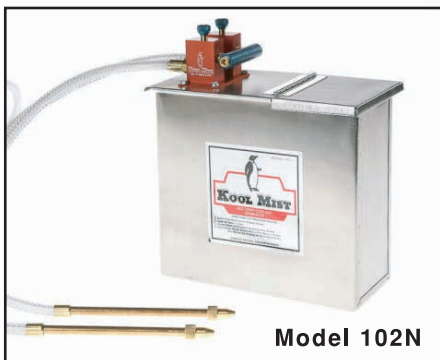
**Completely Portable.** The controls for all of these systems are factory mounted to the tanktop instead of to the machine, so that the entire system can be relocated at will. Multi nozzle systems have a separate control for each coolant line. The controls are manifolded so that only one air hose is required. Each unit comes fully assembled ready for hook-up to your shop air supply.

**No Scrambled Lines.** Coolant and compressed air are brought to the nozzle separately through a coaxial line, halving the number of lines to the machine. This eliminates tangling of unnecessary lines and gives the operator more work space. Coolant line exteriors are either nylon braided for strength, or may be metal braided for protection from hot chips. All lines are four feet long, but can be made longer on special order.

**Easy-to-Use Control.** Output from each nozzle is regulated by a single knob on the control. Mist spray may be turned on or off instantly to coordinate with the cutting cycle, and the spray mix made lean or rich as needed.



## New Flexline Spray Mist Cooling System



**Nozzle Positioners.** There are three options for aiming the spray mist exactly where you want it. The options are as follows:

### Flexlines made with "LOC-LINE".

The Flexlines are available in standard 12" or 18" length or longer lengths are available on special order. The lines are attached to a heavy duty magnetic base for ease of use. The combination of "LOC-LINE" flexibility and the magnetic base provides an infinite variety of positions.

**Brass Nozzles.** 5/16" dia. in 6" length with a swivel base attached to a heavy duty magnetic base. There is a two-way top swivel providing an infinite variety of positions.

**Permanent Positioner.** Comes with a swivel base and a two-way top swivel. The permanent positioner can be attached to any convenient bolt or hole.

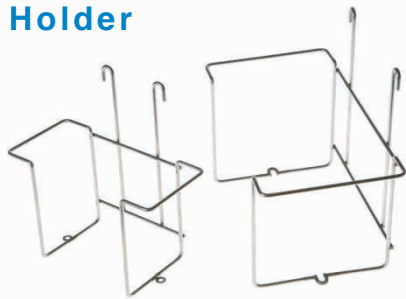
**Multi-Nozzle Models.** Standard units may have up to four coolant lines and nozzles. Multi-nozzle systems have a separate control for each line. Models with more than four outlets are available on special order.

# MIST COOLANT SYSTEMS WITH STAINLESS TANK

Type of Service	Coolant Line Type & Length	Stainless Steel Tank Capacity	Nozzle Length*	1 Outlet Model No	2 Outlets Model No	3 Outlets Model No	4 Outlets Model No
General Purpose 5/16" Nozzle	Coolant Line Type & Length	1 gal	6" Brass	100N	102N	—	—
			12" Flexline	100NF12	102NF12	—	—
			18" Flexline	100NF18	102NF18	—	—
		3 gal	6" Brass	350N	352N	353N	354N
			12" Flexline	350NF12	352NF12	353NF12	354NF12
			18" Flexline	350NF18	352NF18	353NF18	354NF18
	Metal braided 4'	1 gal	6" Brass	100F	102F	—	—
			12" Flexline	100FF12	102FF12	—	—
			18" Flexline	100FF18	102FF18	—	—
		3 gal	6" Brass	350F	352F	353F	354F
			12" Flexline	350FF12	352FF12	353FF12	354FF12
			18" Flexline	350FF18	352FF18	353FF18	354FF18
Large Capacity 3/8" Nozzle	Nylon braided 4'	3 gal	6" Brass	400N	402N	403N	404N
	Metal braided 4'			400F	402F	403F	404F
	Nylon braided 4'	5 gal coated steel tank		450N	452N	453N	454N
	Metal braided 4'			450F	452F	453F	454F

\*Straight nozzle is standard. 45° and 90° nozzles are available on brass nozzles.

## Stainless Steel Tank Holder



## Mounting Bracket

ITEM	MODEL
Mounts 100	MB-1
Mounts 350	MB-3

Mounts to a wall or a flat surface.

## K-75: Our Most Advanced Model

- Turret takes up to four coolant lines: one furnished *add others as needed.*
- All lines ball-checked. No flowback.
- See-through drawer shows coolant level.
- Can be moved from machine to machine.
- Made of hi-strength structural plastics.



K-75	Unit with 1 outlet & mounting bracket
K-75K	Kit: adds 1 outlet
205	Magnetic nozzle positioner

Just one **Model K-75** can handle most cooling jobs in your shop. Hangs on bracket (furnished) or stands anywhere. Volume and spray cone width are adjustable for each line.



# Models for Use With Your Own Tank or Sump

## General Purpose Models

These models are to used with your own Tank or Sump. Our General Purpose models are best used in production operations that require minimal set up changes. This unit is a similar design to our Lite Duty, but equipped with longer lines and nozzles for heavier use. The general purpose models generate a wider spray traveling a further distance than the Lite Duty models. Air supply required.

### Simplest of the Systems:

The controls of these units are mounted permanently to the machine, close to the operator and the cut.

### No Coolant Tank Furnished:

Coolant mix may be placed in the machine sump, or in any clean container that will not contaminate the coolant. If the sump is used the conventional flood coolant pump must be made inoperative.

### Coaxial Coolant Line:

Coolant and compressed air are not mixed until they reach the nozzle. To overcome the need for dual lines, Kool Mist has developed a coaxial line, or a hose within a hose. Coolant line exteriors may be nylon braided for normal duty, or metal braided from protection from hot chips and abrasion.

### Easy to Use Control:

Output from each nozzle is regulated by a single knob on the control. Mist Spray may be turned on or off instantly to co-ordinate with the cutting cycle, and the spray mix made lean or rich as needed. Nozzle position can be a permanent mount or the flexible magnetic base. Straight nozzle is standard. 45 and 90 deg. nozzles are available.



Model 80F18

Model 80SM

Type of Service	Nozzle Length	Coolant Line Type & Length	Control Mounting	Nozzle Positioner	Model Number	
					One Outlet	Two Outlets
Light Duty	4" Brass	Nylon Braided 2'	Fixed	See Pg. 5	80S	N/A
	4" Brass	Nylon Braided 2'	Fixed	Magnet	80SM	N/A
	12" Flexline	Nylon Braided 4	Fixed	Magnet	80F12	N/A
	18" Flexline	Nylon Braided 4	Fixed	Magnet	80F18	N/A
	12" Flexline	N/A	PortaMist	Magnet	60M12	N/A
	18" Flexline	N/A	PortaMist	Magnet	60M18	N/A
	6" Brass	Nylon Braided 3	Fixed	See Pg. 5	101N	112N
General Purpose	6" Brass	Nylon Braided 3	Fixed	See Pg. 5	101F	112F
	12" Flexline	Nylon Braided 4	Fixed	Magnet	101NF12	112NF12
	18" Flexline	Nylon Braided 4	Fixed	Magnet	101FF18	112NF18

\*Straight nozzle is standard. 45° and 90° nozzles are available.

## Automatic Mist Coolant Systems

### Automatic Cooling System

Saves you money because the coolant is sprayed only when the machine is actually in operation.

The efficiently built unit is ON for constant flow, but it designed to start and stop simultaneously with operation. Starts and stops automatically. A coolant saver!

All automatic models can be used with customer's tank. Simply drop 4' long siphoning line into any tank.

Kool Mist automatic models can be adapted to automatic operation on practically all machine tools.

**Model 100AP** For light to medium duty machine operation. No tank.  
Coolant line = 4' length, 13/32" O.D.  
Type of Line = Nylon only  
Probe = 6" in choice of straight, 45 deg. and 90 deg.



Model 100AP

Air supply required.

## PORTAaMIST Features

Single Air/Coolant Control Valve  
 Adjustable Spray Nozzle  
 Heavy Duty Magnetic Base  
 12" or 18" Flexible LOC-LINE Nozzle Positioner

4 ft. Coolant Hose with Anti Syphon Check Valve  
 4 ft. Air Hose with Male Pipe Thread Fitting  
 1 yr. Warranty and Available Parts



*Faster set-ups and improved production.*

## Nozzle Positioners

These positioners aim the mist spray exactly where you want it. A swivel base and a two-way top swivel provide an infinite variety of positions.

The permanent positioner can usually be attached to any convenient bolt or hole. The magnetic type is simply placed on any iron or steel surface.

Type	Light Duty	General Purpose	Large Capacity
	Model No.	Model No.	Model No.
Permanent	300	305	305
Magnetic	200	205	205



Permanent

Magnetic

## Quick On-Off Control Air Switches



Item	No.
Air Switch	26
4' air hose w/fittings	264

### Excellent for Every Machining Operation

Drilling  
 Tapping  
 Turning & Facing  
 Thread Chasing

Surface Grinding  
 Tool Grinding  
 Blanchard Grinding  
 Reaming

Milling  
 End Milling  
 Profiling  
 Die Sinking

Pantographing  
 Abrasive Cutoff  
 Power Hacksawing  
 Bandsawing

### Kool Mist Universal Flood or Mist Coolants

The Kool Mist unique formula of coolant is safe for people, working materials and the tools used to shape them. The cost to use Kool Mist is about \$.03 per operating hour. Because Kool Mist comes in concentrated form, it may be diluted with water in solutions up to 32:1. One gallon therefore makes 33 gallons of mix, or enough for 33 eight hour shifts at typical usage.

Both Kool Mist coolant formulas are biodegradable, greatly reducing storage and disposal concerns. They both meet OSHA, NASA, AEC and EPA standards. Spent coolant requires no special treatment and will have no adverse environmental effect

### Formula "77" for Tougher Service Improved Coolant for Mist and Flood Cooling

The improved Formula "77" is highly recommended for mistcooling any metal or alloy where tougher machining conditions require greater lubricity. It is particularly useful where tool pressure is exceptionally great or where the material is very abrasive. Formula "77" provides the extra lubrication needed to protect the cutting edge of the tool. Formula "77" has been reformulated to provide the same safety for use as Formula "78" where incorporating additional lubricity ingredients for more demanding machining applications. In addition, Formula "77" provides excellent service in most general purpose flood cooling applications. One coolant-Formula "77" will fill most of your general mist and flood coolant needs. Formula "77" eliminates double coolant inventory, cuts storage space requirements and reduces your costs.

Part Number: Formula 77-1	1 gallon (in plastic bottles) .....
Part Number: Formula 77-4	Case (four 1 gallon Plastic bottles per case) .....
Part Number: Formula 77-5	5 gallon pail .....
Part Number: Formula 77-55	55 gallon drum .....



**SEE MORE  
Formula "78" for Light Duty**

**Formula "77"** - like Formula "78" - will not cause dermatitis, acidity, or buildup, and creates no rust or corrosion when diluted with clean water. Workpieces and machine parts remain clean and unstained.

### Formula "78" for Light Duty Improved Coolant for Mist Systems

New formula improved after years of research, Formula "78" is a chemical base mist coolant that dissolves in water to a clear solution. It is the most universal mist coolant available. It can be used on any metal or alloy, and displays high efficiency in the cutting of exotic metals and alloys such as Monel, Inconel, Titanium, etc., as well as all non-ferrous metals. Formula "78" meets all OSHA standards. It is free of halogens and sulfides. It is safe for operators whether in liquid or mist form. Our proprietary formula completely prevents dermatitis and rancidity, and the formulation contains no irritants.

All components for Formula "78" are dissipated into the atmosphere by cutter heat except on; a chemically compounded lubricant that clings to the tool to reduce friction, the prime cause of heat.

Part Number: 78-1	1 gallon (in plastic bottles)
Part Number: 78-4	Case (four 1 gallon plastic bottles per case)
Part Number: 78-5	5 gallon pail
Part Number: 78-55	55 gallon drum



**Concentrated. One gallon makes 33 gallons.**

# Superior Performance as a Mist or as a Flood Coolant

## Our spray mist coolant will not cause:

**Dermititis • Rust • Stains • Plugged lines and nozzles**

Formulas “77” and “78” will assure superior results and maximum safety conditions from your spray mist system regardless of make.

All metal cutting applications generate heat due to metal deformation and chip friction at the tool chip interface. Coolants allow for this heat to be minimized or removed from the operation. By removing the heat generated in the operation, tool life increases and part finish is improved. Both coolants can help boost your output, improve your micro-finishes, and extend your tool life.

### Outstanding Efficiency

No ordinary mist coolant matches Kool Mist for effectiveness. In a given time, Kool Mist can absorb 1000 times as much as an equal volume of flood coolant. With destructive heat removed as fast as it generates, production is often doubled and tool life tripled. Heavier cuts, coarser feeds, faster speeds and better micro-finishes become possible even on tough new alloys and exotic metals.

### Safe for People, Machines and Parts

Kool Mist contains no halogens or sulfides and is totally free of dangerous or otherwise troublesome chemicals. It is harmless to operators and ends problems of mist fog fumes. Kool Mist will not cause corrosion, buildup, rancidity or objectionable odors. Neither will it create rust or stains on machined parts even when diluted 32:1 with water. As a result, it sharply reduces parts spoilage, eliminates employee health claims and precludes problems with health and environmental agencies such as OSHA.

### Improves Machinability

Kool Mist makes common materials more machinable because its outstanding cooling action keeps tools sharp and lubricated. It provides excellent results on ferrous metals, brass, bronze, aluminum and many plastics. Kool Mist is often the only answer to cutting special alloys and exotic metals.

Drills hold their diameters, and cutting edges longer with mist, and chip move freely up and out of the flutes. Unlike flood coolants, the clear mist holds up and mills visible throughout the pass while giving ample cooling. Mist-cooled cutter grinder wheel hold their form longer and do not burn or crystallize narrow lands on costly cutters.

Mist angles into tapped hole keeps tap cool, lowers torque, prevents chip welding, and greatly extends tap life. Mist-cooled surface grinder wheels don't load up quickly, need fewer dressings, and give better micro-finishes.

### Works with many Mist Systems

Kool Mist may be used in just about any mist spray coolant system. It will not attack or react with hoses, tanks, or valves. Solids do not precipitate from the solution, so there is no possibility of accumulated sludge or clogging of small passages and nozzles.

### Biodegradable

Both Kool Mist coolant formulas are biodegradable. Greatly reducing storage and disposal concerns and procedures. Coolant may be disposed of without special treatment and will no adverse environmental effect.

### A Little Does a Lot

Kool Mist comes in concentrated form, and may be diluted with water solutions up to 33 gallons of mix, or enough for 33 shifts of eight hours each at average rate of use. Therefore, making coolant costs under 3 cents an hour.

# Kool Mist Starter Kits

## Kool Kit Starter Special Model 500 includes:

- One Model 100N Mist Coolant System with one gallon stainless steel tank
- One Adjustable Magnetic Nozzle Positioner
- One Gallon Formula 78 Concentrate Coolant (Light duty spray mist coolant )

## Light duty Kool KIT Model 580 includes:

- One Model 80S Mist Coolant System
- One Magnetic Mounted Nozzle Positioner
- One Gallon Formula 78 Concentrate Coolant (Light duty spray mist coolant )



## PORTaMIST Kit Model 560 Includes:

- One PORTaMIST Model 60M unit including air and coolant hoses, heavy duty magnetic base, simple single knob control, and 12" flexible LOC-LINE® positioner
- One gallon Kool Mist Formula 78 concentrated coolant
- One four-ounce sample of Formula 77 concentrated coolant



## PORTaMIST Kit Model 560-18 Includes:

- One PORTaMIST Model 60M-18 unit including air and coolant hoses, heavy duty magnetic base, simple single knob control, and 18" flexible LOC-LINE® positioner
- One gallon Kool Mist Formula 78 concentrated coolant
- One four-ounce sample of Formula 77 concentrated coolant



Available through your industrial distributors.

Regional Factory Stock in:

Cincinnati, OH • Fort Worth, TX • San Francisco, CA • Vancouver, WA • Torino, Italy