

Water-Cooled MIG Barrels

Robotic Water-Cooled-to-the-Tip®

D/F MACHINE SPECIALTIES 1750 Howard Drive North Mankato, MN 56003 Phone: (507) 625-6200 Fax: (507) 625-6203

WATER-COOLED-TO-THE-TIP® ROBOTIC DOCKING SPOOL® MACHINE BARRELS

The 650 amp Remote Mount Docking Spool®/Water-Cooled-to-the-Tip® Barrels accommodate two (2) different sizes and two (2) different lengths of water-cooled nozzle assemblies. Whether you are running steel, metal cored, or aluminum wire, the correct barrel can be chosen for a neat and clean installation, and for optimum performance for your application. These barrels are fully water cooled internally and externally. The internal body of the barrel is water cooled, thus putting the watercooling on the tip. This has increased tip life up to 14 times longer. Also, because the water-cooling is on the tip, this enables customers to use our less expensive C122 slip-in copper tips for many high-current, single-arc welding applications. These barrels are available in 5-inch and 8-inch lengths. Each length is available with our standard size nozzles (1.125" OD). The wire diameter range is .030" through 1/8" with hard/cored wire, and 3/64" through 3/32" with aluminum wire.

The models NCM-W/C-T-A and HTM-W/C-T-A are similar to the models above but differ in gas flow capacity. These models are our high capacity (Series A) nozzles (1.445" OD) that provide more gas coverage for larger diameter wire. You can switch between the standard nozzles and high capacity nozzles if you have the correct inner parts for each. The W/C-Tip Barrels can run the complete line of D/F standard size C122 DHP contact tips and the complete line of D/F standard size CuCrZr (copper chromium zirconium) contact tips, as well as any custom current tip configuration you may need.

The D/F Water-Cooled-to-the-Tip Barrels are standard equipped with a single Water Out & Power Cable and are rated at 650 amps (continuous duty cycle). These ratings are, however, dictated by the contact tip. The NCM (slip-in) series of contact tips is rated up to 450 amps (continuous duty cycle). If your welding application requires amperages above 450, you must change to the heavy duty threaded CuCrZr series of contact tips rated up to 650 amps (continuous duty cycle).

In some instances C122 DHP is adequate, but for stainless steel and stiff, high column strength or abrasive wire such as flux cored and metal cored, CuCrZr is the correct choice. D/F Machine Specialties can increase several key characteristics creating a higher-quality consumable with increased conductivity, even higher softening temperature and improved hardness. This means a reduction in arc start failures, increased tip life, and an increase in productivity.

The Water-Cooled-to-the-Tip Barrels can also be retrofit to have two Water Out & Power Cables, increasing the continuous duty cycle rating to 850 amps. These amperages require the use of the threaded CuCrZr current tips.

MODEL EXPLANATION

NCM-W/C-T - Normal Duty, Collet Action (Slip-In Tip), Machine Barrel, Water-Cooled to the Tip

HTM-W/C-T - Heavy Duty, Threaded Tip, Machine Barrel, Water-Cooled to the Tip

NCM-W/C-T-A - Normal Duty, Collet Action (Slip-In Tip), Machine Barrel, Water-Cooled to the Tip, Series A High Capacity

HTM-W/C-T-A - Heavy Duty, Threaded Tip, Machine Barrel, Water-Cooled to the Tip, Series A High Capacity

FEATURES

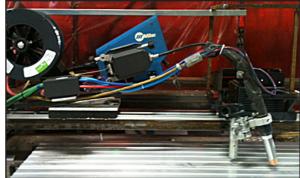
- Fully Water-Cooled Internally Tip Recessed in Water Cooling
- Fully Water-Cooled Externally Gas Cup Recessed in Water Cooling
- 650 Amps Continuous Duty Cycle
- Up to 850 Amps Continuous with Dual Power Cables
- · Adaptable to Any Wire Feeder or Power Source
- Withstands Preheat Upwards of 900 Degrees

ORDERING INFORMATION - (Complete Assemblies)

DESCRIPTION	CODE NO. (NCM)	CODE NO. (HTM)	
5" Long Nozzle	40748	40749	
8" Long Nozzle	40138	40155	
Series A5" Nozzle	40747	40746	
Series A8" Nozzle	40139	40156	

Add Footage Digit to Code Number for Utility Length Required.

Example: Require 40747 with 4 Ft. Utilities - 40747-4







MODEL SPECIFICATIONS - CONTINUOUS DUTY CYCLE

Model	Current Capacity	Length w/ 5" Noz.	Length w/ 8" Noz.	Dia. of W/C Noz.	Weight w/ 5" Noz.	Weight w/ 8" Noz.	Cooling Required	Recommended Wire Diameter Range	Instruction Manual
NCM-W/C-T	450 amps	9.25"	12.25"	1.125"	2.8 lbs.	3.5 lbs.	3 quarts/		
NCM-W/C-T A	450 amps	9.25"	12.25"	1.445"	2.8 lbs.	3.5 lbs.	min	.030"-5/32" Hard/Cored,	534 (All 5" Noz.)
HTM-W/C-T	850 amps	9.25"	12.25"	1.125"	2.8 lbs.	3.5 lbs.	3 quarts/	3/64"-1/8" AL	600 (All 8" Noz.)
HTM-W/C-T A	850 amps	9.25"	12.25"	1.445"	2.8 lbs.	3.5 lbs.	min		