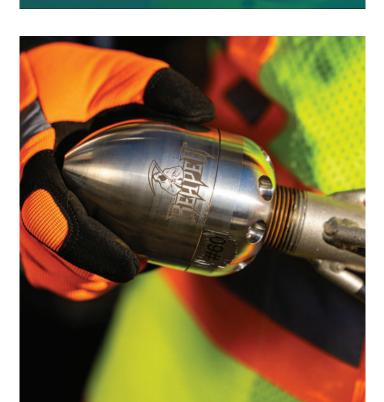


ROTATING SEWER JETTING NOZZLE



"Optimized stream quality results in greater impingement, allowing the use of one tool for various applications like cutting, cleaning, removal, and more."

> Joshua Rangel, President All County Plumbing, Inc.





SUPERIOR THRUSTING POWER

The Reaper simultaneously clears and cleans by combining a powerful rotating front stream that cuts through blockages and cleans the pipe walls, while the back streams propel the nozzle forward to meet the challenge.

The rear jets have proven to pull a line up to 800 feet!



ATTACK THE **TOUGHEST BLOCKAGES**

What's the best way to clear a blockage with the Reaper? Follow these two easy steps!

- 1. Feed the nozzle all the way to the troubled spot.
- 2. Pull back the hose to run into the blockage (6"-12" depending on pipe size). This ensures the front rotating stream hits the

full diameter of the pipe to cut the blockage at its most outer point and clear the blockage with

maximum power and efficiency.





DESIGN FEATURES

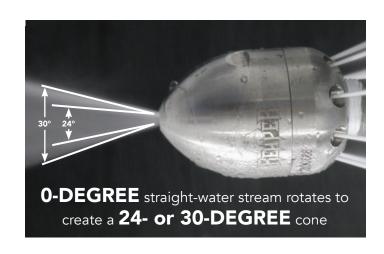
- Stainless steel housing and tungsten carbide wear surfaces
- Spray angles optimized for maximum pulling, thrusting and cleaning power
- Fully field-repairable Repair kits get you back up and running in about 10 minutes
- Greater impingement allows you to cut through the blockages faster, completing more jobs in a day

APPLICATIONS

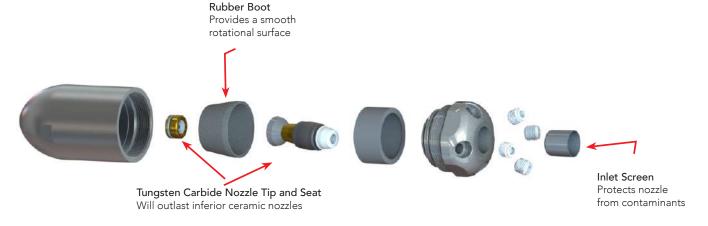
- Municipal Sewer Cleaning
- Commercial and Residential Drain Cleaning
- Paraffin Wax
 Removal
- FOG Removal
- Root Removal

SPRAY CHARACTERISTICS

- Front Jet Spray Angle: 24 (3/8") or 30-degree (1/4", 1/2", 1")
- Rear Jets Spray Angles: 20-degree angle
- Flow Rates: 3.7 74.5 GPM
- Inlet Pressure: 1,500 4,000 PSI (1" maximum 3,000 PSI)
- Nozzle Sizes: #6.0 #80.0

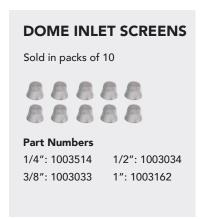


REAPER EXPLODED VIEW











1.2" (30.5mm)

REAPER 1/4"

Pipe Size: Ideal for 2-4" pipes Flow Rating: 3.7-8 GPM Front Nozzle Angle: 30 Degrees Rear Jets: 3 or 4 at 20 degrees Maximum PSI Rating: 4,000 PSI



1.6" (104.1mm)

REAPER 3/8"

Pipe Size: Ideal for 3-6" pipes Flow Rating: 3.7-12 GPM Front Nozzle Angle: 24 Degrees Rear Jets: 4 at 20 degrees Maximum PSI Rating: 4,000 PSI



REAPER 1/2"

Pipe Size: Ideal for 4-8" pipes Flow Rating: 7.3-24 GPM Front Nozzle Angle: 30 Degrees

Rear Jets: 4 at 20 degrees

Maximum PSI Rating: 4,000 PSI



2.9" (73.7mm)

REAPER 1"

Pipe Size: Ideal for 6-18" pipes Flow Rating: 28.3-74.5 GPM Front Nozzle Angle: 30 Degrees Rear Jets: 8 at 20 degrees Maximum PSI Rating: 3,000 PSI

NOZZLE SIZE	FNPT NOZZLE PART NUMBER	BSPP NOZZLE PART NUMBER	ROTOR REPAIR KIT PART NUMBER	REAR JET REPAIR KIT	FLOW RATE CHART					
					@1,500 PSI (103 Bar)	@2,000 PSI (138 Bar)	@2,500 PSI (172 Bar)	@3,000 PSI (207 Bar)	@3,500 PSI (241 Bar)	@4,000 PSI (276 Bar)
1/4" NOZZLE - IDEAL FOR 2" - 4" OR 50MM - 100MM PIPES										
6.0	1003521-060	1003522-060	1003513		3.7 GPM (14.0 LPM)	4.2 GPM (15.9 LPM)	4.7 GPM (17.8 LPM)	5.2 GPM (19.7 LPM)	5.6 GPM (21.2 LPM)	6.0 GPM (22.7 LPM)
8.0	1003521-080	1003522-080	1003513		4.9 GPM (18.5 LPM)	5.7 GPM (21.6 LPM)	6.3 GPM (23.8 LPM)	6.9 GPM (26.1 LPM)	7.5 GPM (28.4 LPM)	8.0 GPM (30.2 LPM)
3/8" NOZZLE - IDEAL FOR 3"- 6" OR 90mm - 180mm PIPES										
6.0	1003031-060	1003204-060	1003029-060	1003030-060	3.7 GPM (14.0 LPM)	4.2 GPM (15.9 LPM)	4.7 GPM (17.8 LPM)	5.2 GPM (19.7 LPM)	5.6 GPM (21.2 LPM)	6.0 GPM (22.7 LPM)
9.0	1003031-090	1003204-090	1003029-090	1003030-090	5.5 GPM (20.8 LPM)	6.4 GPM (24.2 LPM)	7.1 GPM (26.9 LPM)	7.8 GPM (29.5 LPM)	8.4 GPM (31.8 LPM)	9.0 GPM (34.1 LPM)
12.0	1003031-120	1003204-120	1003029-1224	1003030-120	7.3 GPM (27.6 LPM)	8.5 GPM (32.2 LPM)	9.5 GPM (36.0 LPM)	10.4 GPM (39.4 LPM)	11.2 GPM (42.4 LPM)	12.0 GPM (45.4 LPM)
1/2" NOZZLE - IDEAL FOR 4" - 8" OR 110mm - 225mm PIPES										
12.0	1003032-120	1003205-120	1003029-1230	1003030-120	7.3 GPM (27.6 LPM)	8.5 GPM (32.2 LPM)	9.5 GPM (36.0 LPM)	10.4 GPM (39.4 LPM)	11.2 GPM (42.4 LPM)	12.0 GPM (45.4 LPM)
15.0	1003032-150	1003205-150	1003029-150	1003030-150	9.2 GPM (34.8 LPM)	10.6 GPM (40.1 LPM)	11.9 GPM (45.0 LPM)	13.0 GPM (49.2 LPM)	14.0 GPM (53.0 LPM)	15.0 GPM (56.8 LPM)
18.0	1003032-180	1003205-180	1003029-180	1003030-180	11.0 GPM (41.6 LPM)	12.7 GPM (48.1 LPM)	14.2 GPM (53.8 LPM)	15.6 GPM (59.1 LPM)	16.8 GPM (63.6 LPM)	18.0 GPM (68.1 LPM)
24.0	1003032-240	1003205-240	1003029-180	1003030-240	14.7 GPM (55.6 LPM)	17.0 GPM (64.4 LPM)	19.0 GPM (71.9 LPM)	20.8 GPM (78.7 LPM)	22.4 GPM (84.8 LPM)	24.0 GPM (90.8 LPM)
1" NOZZLE - IDEAL FOR 6" - 18" OR 180mm - 460mm PIPES										
40.0	1003155-400	1003206-400	1003029-180	1003163-400	28.2 GPM (106.7 LPM)	32.5 GPM (123.0 LPM)	36.4 GPM (137.8 LPM)	39.8 GPM (150.7 LPM)		
60.0	1003155-600	1003206-600	1003029-180	1003163-600	42.9 GPM (162.4 LPM)	49.5 GPM (187.4 LPM)	55.3 GPM (209.3 LPM)	60.6 GPM (229.4 LPM)		
80.0	1003155-800	1003206-800	1003029-180	1003163-800	52.7 GPM (199.5 LPM)	60.8 GPM (230.2 LPM)	68.0 GPM (257.4 LPM)	74.5 GPM (282.0 LPM)		