

# UNITED

**SURFACE SOLUTIONS**

## CENTRIFUGAL BARREL DEBURRING



## Centrifugal Barrel Finishing



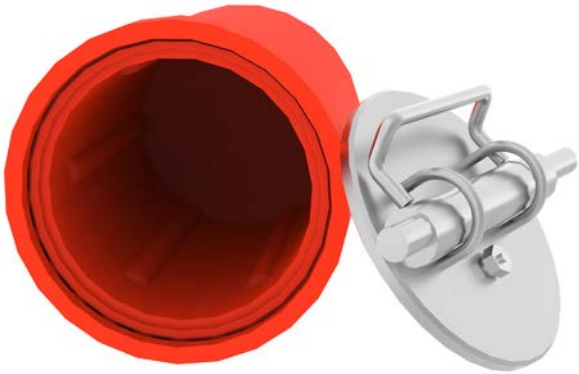
The CPC250 is United's smallest deburring system. The CPC250 is an upright centrifugal barrel deburring machine. It spins along a vertical axis and contains four small barrels. The CPC250 is perfect for small parts that require quick processes without sacrificing power. It is more powerful and consistent than vibratory machines and tumblers while having a smaller footprint. Equipped with United's touchscreen controls, the CPC250 can be programmed quickly and easily to meet all deburring and mass finishing needs.

Unlike vibratory bowls, the CPC250 Centrifugal Barrel Finishing System yields quick and consistent results. Although it is smaller than other CBFs, it can deburr small parts 10 times faster than any vibratory tumbler with more consistency and precision. With additional barrels on standby, parts and media can be changed in less than a minute. Due to its smaller barrels, the CPC250 consumes less media and compound than mini harperizers or other vertical barrel finishers.



# CPC250

*Precision Deburring for Smaller Parts*



While barrels are fixed to the turret, the CPC250's urethane liners are removable for easy loading and unloading. Liners are easily replaceable and allow for easy preparation and replacement.



A touchscreen and push-button controls make operating the CPC250 simple. Process storage allows operators to repeat processes without reprogramming. Other control schemes are available as options.



The CPC250 is perfect for small parts such as those used medical, dental, and precision products. Processes can be fine-tuned to consistently produce perfect finishes after every run.

## Specifications

Max Capacity	0.25 Cubic Feet (7.07 Liters)
Barrel Capacity	0.0625 Cubic Feet (1.77 Liters)
Barrel Dimensions	W 4.5" (114mm) x H 6" (152mm)
Machine Dimensions	W 28.5" x H 48" x D 28.5"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	1HP, inverter controlled, single-phase
Turret Speed	0 - 350* RPM, fully adjustable
Rotation Ratio	1:1.25 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Painted Steel
Power Requirements	208/230 VAC
Compressed Air	Not required.
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.
Options	Extra Barrel Liners Digital Touch Controls Allen-Bradley Controls

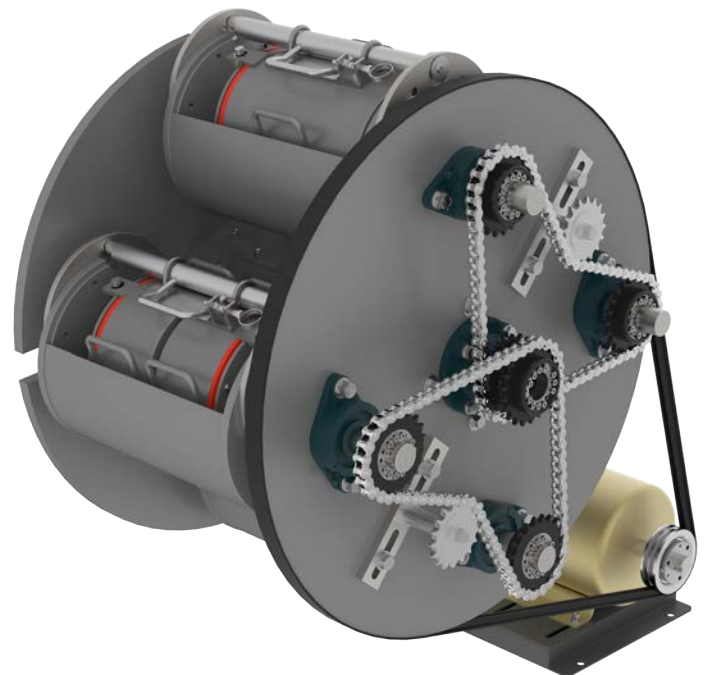
\* Max RPM dependent on process

## Centrifugal Barrel Finishing



The CPC1000 is United's most economical deburring system available. Gone are the long process times of tumblers and vibratory finishers. The CPC1000 can reach speed in excess of 250 RPM and can generate forces exceeding 30Gs, processing parts quickly and consistently. The system can deburr and finish parts up to 7" x 9.5". Equipped with United's exclusive PLC and touchscreen controls, precision finishes are at your fingertips. Processes can be stored and recalled for consistent results every time.

Although simpler than other machines, the CPC1000's turret design still features United's butterfly chain design and makes no sacrifices. The CPC1000 is powerful and modular. Because barrels are separate from the turret's cradles, various types of parts can be processed during the same run. Barrels are secured using United's cam system, but can be easily removed and taken to a workstation such as United's TC250 to complete processing.



# CPC1000

## Modular Processing

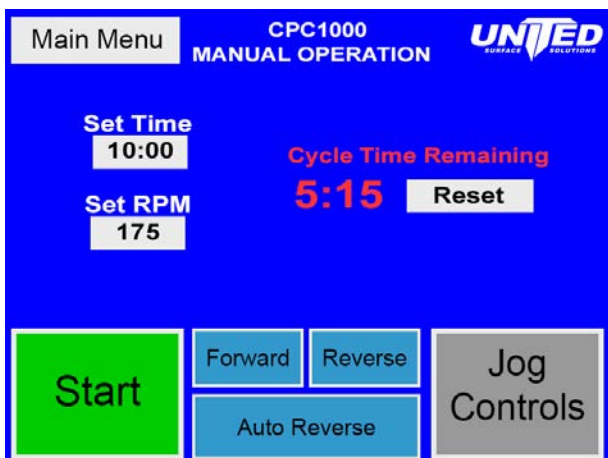


Barrels are locked with a simple lid and cam system, ensuring parts are secure. United's secure locking cam system doesn't require tools and is easy to use.

Barrels are available in 2 sizes, 1/4 cubic foot volume and 1/8 cubic foot volume.



The CPC1000 can process a wide variety of parts with high precision. Its modular barrel design allows for different parts to be processed at the same time, offering versatility and efficiency.



United's simple touchscreen controls give operators complete control over each process. Settings can be stored so processes can be started quickly and easily.

Specifications	
Max Capacity	1 Cubic Foot (28.3 Liters)
Barrel Capacity	0.25 Cubic Feet (7.07 Liters) up to 4 0.125 Cubic Feet (3.54 Liters) up to 8
Barrel Dimensions	0.25 Cu.Ft.   10" x 6.5" 0.125 Cu.Ft.   4" x 6.5"
Machine Dimensions	W 35.5" x H 46.25" x D 46"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	3HP, inverter controlled, three-phase
Turret Speed	0 - 250* RPM, fully adjustable
Rotation Ratio	1:1 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Painted Steel
Power Requirements	208/230 VAC
Compressed Air	Not required.
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.
Options	Extra Barrel Liners Stainless Steel Barrels Allen-Bradley Controls

\* Max RPM dependent on process



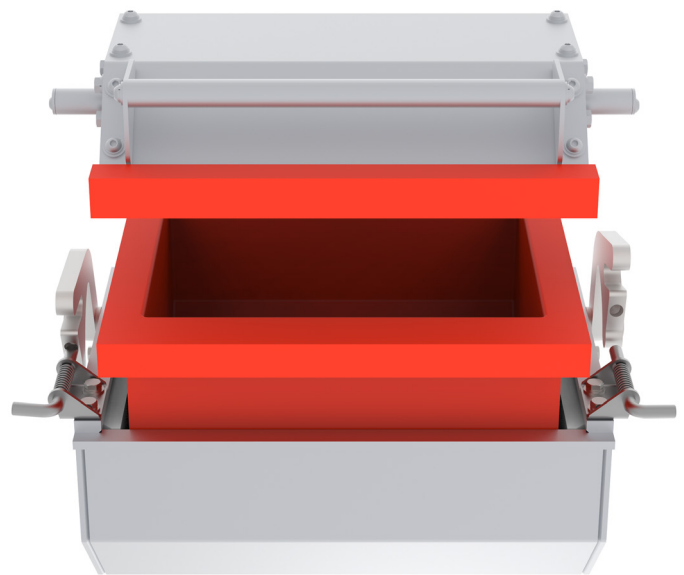
# CPC1500

## CENTRIFUGAL BARREL DEBURRING

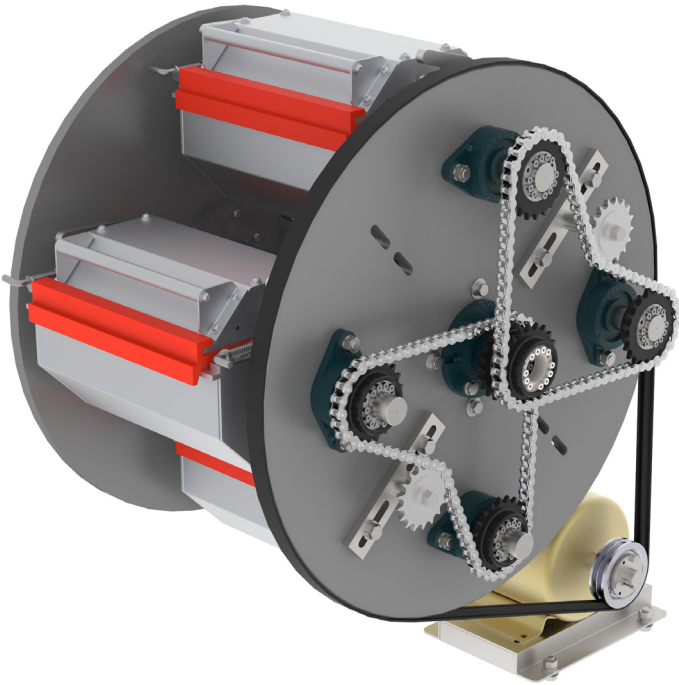


The CPC1500 is United's newest deburring machine. It combines the power and compactness of the CPC1000 and the CPC250 while improving usability. Like the CPC250, it features removable barrel liners, making processing quick and easy. The 1.5 ft<sup>3</sup> size allows for processing of larger parts without sacrificing ease of use. The system can reach speeds in excess of 250 RPM and can generate forces exceeding 30Gs. Like all of United's deburring systems, the CPC1500 comes standard with United's exclusive PLC and Touchscreen control. Processes can be stored and recalled for consistent results every time.

The CPC1500's new barrel is United's largest removable barrel. The urethane barrel allows for loading and unloading in a nearby workstation, such as United's TC250, instead of needing to load individual parts into the machine. Operators can load the next batch into extra barrels as the machine runs. Barrels also come in a divided variant, similar to our CPC4000, giving each barrel the ability to support multiple compartments.



## CENTRIFUGAL BARREL DEBURRING



Parts of all sizes and materials can be processed in the CPC1500 quickly and consistently.

Although simpler than other machines, the CPC1500's turret design still features United's butterfly chain design and makes no sacrifices. Because barrels are separate from the turret's cradles, various types of parts can be processed during the same run. Barrels are secured using United's newly designed locking system, but can be easily removed and taken to a workstation such as United's TC250 to complete processing.

Specifications	
Max Capacity	1.5 Cubic Feet (28.3 Liters)
Barrel Capacity	0.375 Cubic Feet (10.6 Liters)
Barrel Dimensions	Length: 11.0" (0.279 m) Flat to flat: 8.875" (0.225 m)
Machine Dimensions	W 38.5" x H 48" x D 50.5"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	3HP, inverter controlled, three-phase
Turret Speed	0 - 250* RPM, fully adjustable
Rotation Ratio	1:1 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Urethane, Removable
Power Requirements	208/230 VAC
Compressed Air	Not required.
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.

## Centrifugal Barrel Finishing



The CPC4000 Mass Finishing System is the most versatile unit available. Just like all of the other systems offered by United, the CPC4000 comes standard with a PLC and touchscreen controls and a stainless steel construction. It can be upgraded to be fully automated with an elevator and media & water fill system. The CPC4000 can process both small and large parts up to 27.5" long. Barrel lids weigh only 19 lbs. The urethane barrels can be divided up to 10 separate compartments and can be adjusted to meet any deburring or mass finishing needs.



The automated rinse and separation system separates and rinses parts and media through interchangeable stainless steel separation screens which come in different sizes and are easily changed. The CPC4000 eliminates the need to remove barrels from the machine to access parts and media. Simply remove the lid and dump contents below.



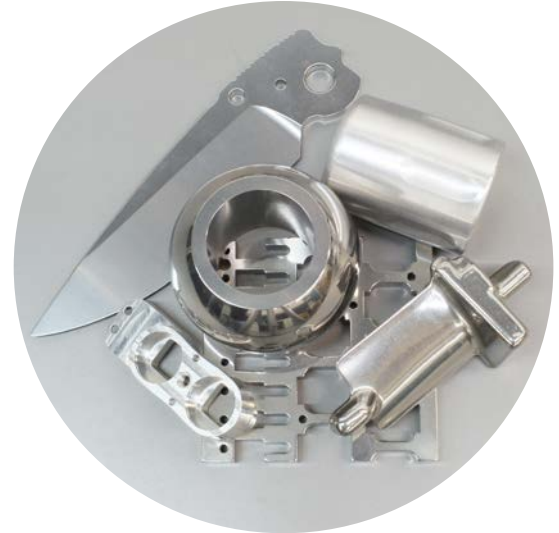


# CPC4000

*Powerful & Compact*



The CPC4000FA is the fully automated model of the CPC4000. It includes a media elevator as well as a media, water, and optional liquid compound fill system. Media is stored in a hopper above the main unit to allow for quick process turnaround and eliminates heavy lifting. The CPC4000FA reduces downtime by keeping media in the system, allowing operators to continuously run processes.



The CPC4000 is capable of processing a high variety of parts thanks to its powerful drive system and barrels with optional divided compartments. United can tailor custom processes for any part at no extra cost, ensuring any part can be processed with ease and precision.

Specifications	
Max Capacity	4 Cubic Feet (113.27 Liters)
Barrel Capacity	1 Cubic Foot (28.32 Liters) Up to 10 compartments per barrel.
Barrel Dimensions	L 27.5" (698.5mm) x W 8.75" (222.3mm)
Machine Dimensions	W 86.75" x H 58.44" x D 50.5"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	10HP, inverter controlled, three-phase
Turret Speed	0 - 225* RPM, fully adjustable
Rotation Ratio	1:1 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Stainless Steel + Urethane
Power Requirements	460/480VAC
Compressed Air	Required for CPC4000FA
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.
Options	Divided barrels with dividers. Allen-Bradley Controls Indicator Beacon

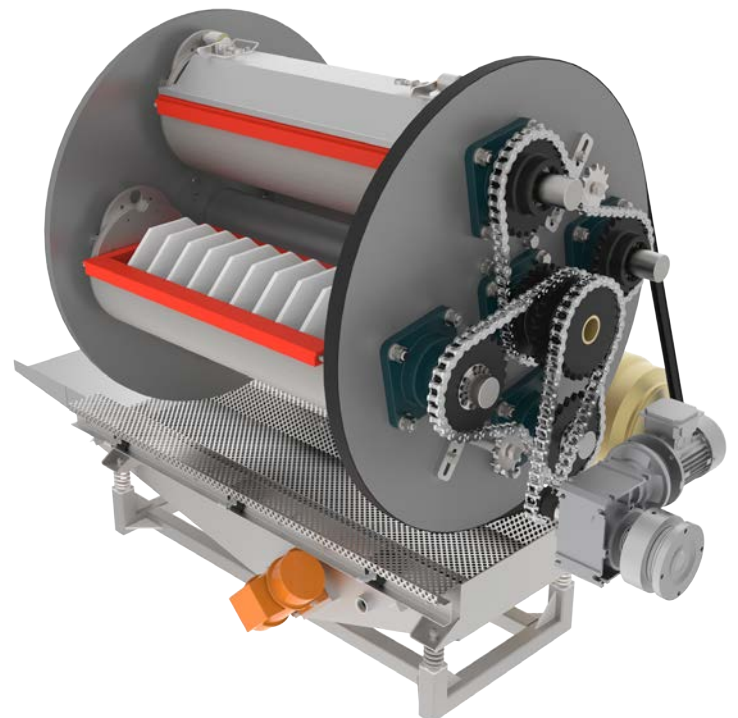
\* Max RPM dependent on process

## Centrifugal Barrel Finishing



The CPC6000 is United's newest system available. It combines the simple operation of United's other machines while offering unmatched power. Parts as long as 30" can be processed with ease and precision. Each barrel can be divided into as many as 10 compartments, providing the versatility to process a wide variety of parts. The CPC6000 can be equipped with our automated media and compound fill system as well as United's advanced media elevator.

The drive system in the CPC6000 is powerful and robust. It features United's signature butterfly chain design. United's control system allows processes to range from heavy material removal to delicate surface refinement on a large scale. Available with up to 10 divided compartments per barrel, the CPC6000 continues United's attention to process versatility and precision finishes. Just as with the CPC4000, the CPC6000 features a vibrating separator with easily interchangeable screens, specially designed not to damage parts.



# CPC6000

*High Capacity & Power*



The CPC6000FA is the fully automated model of the CPC6000. It includes a media elevator as well as a media, water, and optional liquid compound fill system. Media is stored in a hopper above the main unit to allow for quick process turnaround and eliminates heavy lifting. The CPC6000FA reduces downtime by keeping media in the system, allowing operators to continuously run processes.



Barrels on the CPC6000 are longer and deeper than the CPC4000, offering 50% more capacity and having the space to process larger parts.

## Specifications

Max Capacity	6 Cubic Feet (170 Liters)
Barrel Capacity	1.5 Cubic Feet (42.47 Liters) Up to 10 compartments per barrel.
Barrel Dimensions	L 30" (762mm) x W 10.5" (267mm)
Machine Dimensions	W 99" x H 72" x D 72"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	20HP, inverter controlled, three-phase
Turret Speed	0 - 175* RPM, fully adjustable
Rotation Ratio	1:1 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Stainless Steel + Urethane
Power Requirements	460/480VAC
Compressed Air	Required
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.
Options	25HP Motor Divided barrels with dividers. Allen-Bradley Controls Indicator Beacon

\* Max RPM dependent on process

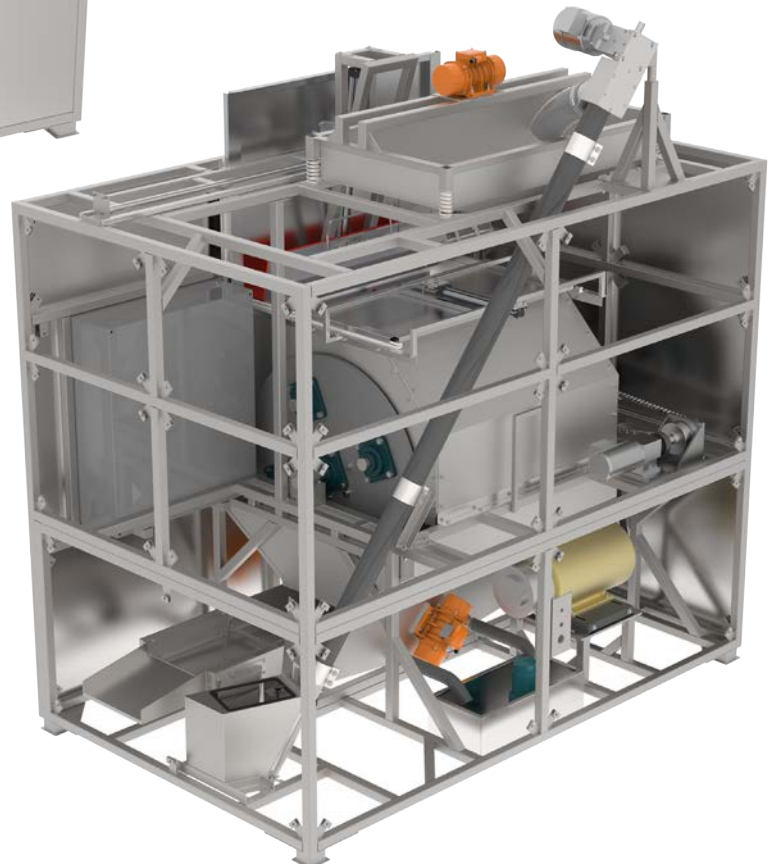
## Centrifugal Barrel Finishing



The CPC12000 is the most advanced and automated system available. Parts as long as 44" can be processed with ease. It contains our automated media and liquid compound fill system as well as United's advanced media elevator. Its automatic doors and lid lift system alleviate the need for any heavy lifting. It comes standard with United's PLC and touchscreen controls, retaining the simplicity of United's smaller machines without sacrificing power or precision.



Close-up of the CPC12000's lid lift.

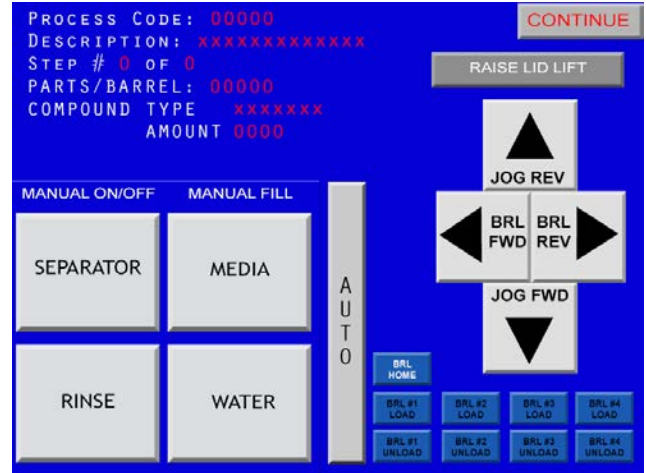


# CPC12000

## Advanced Automated Deburring



The CPC12000's automated material handling system removed the need for any heavy lifting. When each barrel's contents are emptied underneath, the separator sends parts down the chute, media to the elevator back up to the hopper, and pumps water out to be recycled.



The CPC12000's touchscreen controls gives operators access to all of its advanced features. These include the media elevator, hopper, and elevator, the parts/media separator with rinse system, turret & barrel controls, process storage, the lid lift, and maintenance tasks.

### Specifications

Max Capacity	12 Cubic Feet (346 Liters)
Barrel Capacity	3 Cubic Feet (85 Liters) Up to 15 compartments per barrel.
Barrel Dimensions	L 44" (1118mm) x W 12" (305mm)
Machine Dimensions	W 128" x H 140" x D 78"
User Interface	Touchscreen with Process Storage
Main Drive/Motor	30HP, inverter controlled, three-phase
Turret Speed	0 - 135 RPM, fully adjustable
Rotation Ratio	1:1 - Turret : Barrel
Construction	Machine: 304 Stainless Steel Barrels: Stainless Steel + Urethane
Power Requirements	460/480VAC
Compressed Air	Required
Dry Floor Compatible	Yes
Warranty	Up to 3 yrs, determined by component.
Options	Divided barrels with dividers. Allen-Bradley Controls

\* Max RPM dependent on process