Revolution Tyre Changer

WalkAway™ Operation Adds Capacity

NEW

4TH GENERATION!



Key features at a glance



PATENT PENDING

WalkAway™ Operation

- ✓ 80-second unattended bead breaking and demounting process
- ✓ When paired with wheel balancing, 25%+ time savings is possible
- 57% less time spent changing a tyre using WalkAway[™]

PATENT PENDING

Automatic Adds Simplicity

- ✓ Same procedure for all tyres and wheels
- ✓ Operator experience no longer a factor



PATENTED

Leverless Tool Head

- ✓ Demounts without levers
- Prevents damage to tyre and rim



PATENT PENDING

"Go" Pedal Controls Operation

- ✓ Press "Go" to make selection
- Hold "Go" to advance procedure



















PATENTED

Space Saving Wheel Lift

- Spindle lifts tyre directly into position
- ✓ Built-in wheel lift reduces overall footprint



PATENTED

Powered Press Arms

- ✓ Mount virtually any tyre
- ✓ Powered for maximum control



EXCLUSIVE

Animations & Videos

- ✓ Animations train operator "on the job"
- ✓ Video training for new users
- ✓ Video library of special procedures





PATENT PENDING

Automatic and autonomous operation saves time,



Mount and Clamp





WalkAway™ Mode

The TCRH allows the operator to "walk away" during bead breaking and demounting process.

- ✓ Available for tyres 2 through 4 in a set
- ✓ Status indicator lamp signals when the machine is in operation, stopped, or requires operator





Steady Green

machine operating



Flashing Green

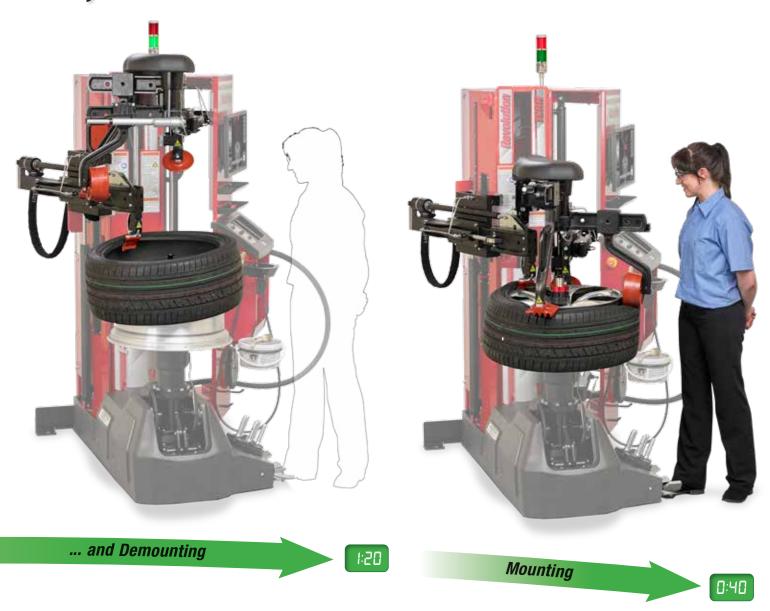
tasks completed



Steady Red

operator required

effort, and mistakes



The Operator's Responsibilities When Using WalkAway™ bead breaking and demount.



✓ Load and unload the assembly



✓ Orient TPMS and enable WalkAway[™]



Offload old tyre

Fully automatic adds safety



 Operator stands back and lets machine do the work



- Inflation station algorithm fills to set pressure automatically not necessary to stand on foot pedal to inflate
- Inflation controls keep operator away from assembly



- ✓ No levers to hit operator
- Automatic press arms replace using levers for mounting



- Operator's hands stay away from the assembly
- ✓ No pinch points
- ✓ No risk of rim slipping



- ✓ Protects operator's back
- ✓ No need to lift heavy assemblies





- Monitors TPMS location constantly
- Won't allow tyre to be mounted or demounted in unsafe TPMS location



Tyre and Wheel Safety

- Automatic procedure protects rim and tyre
- ✓ All rim contact, or near rim contact, is plastic

Fully automatic eliminates experience gap

The Revolution[™] can elevate your tyre-changing team with differing experience levels to a team of experts.

Conventional Tyre Changer

Equipment is the tool and the technician is the tyre changer.



Experience makes the difference.

17 critical decisions for conventional tyre changers

Bead Breaking with Shovel

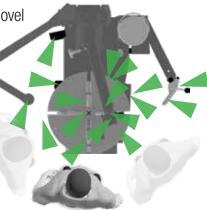
- Avoid TPMS sensor
- 2. Set angle and position of shovel
- 3. Avoid rim

Clamp

- 4. Inside or outside
- 5. Use jaw protectors or not
- 6. Position jaws as needed

Demount

- 7. Set mount head
- 8. TPMS sensor position
- 9. Use lever protector or not
- 10. Reloosen bottom bead

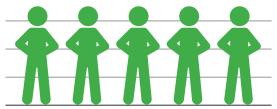


Mount

- 11. Position mount head
- 12. Over/under head
- 13. TPMS sensor position
- 14. Use press arms as needed
- 15. Keep tyre turning with rim Inflation
- 16. Inflate, then check pressure
- 17. Repeat as needed

Revolution™ Tyre Changer

The Revolution is the tyre changer and the technician is an equipment operator.



All experts in no time.

critical decisions for the Revolution



- 1. Select clamp size
- 2. Set TPMS sensor and rim diameter
- 3. Use press arms as needed
- 4. Set inflation pressure

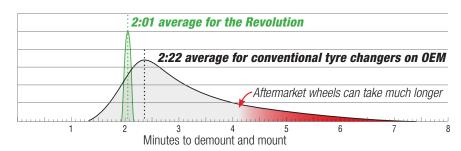
VS.

Fully automatic saves time

Tyre Changing is an all day task, not a race for single tyres. Assembly after assembly, the Revolution[™] outpaces conventional equipment.

Eliminate Cycle Time Variation

The Revolution[™] handles virtually all tyres in the same time.





WalkAway™ mode adds capacity





Tyre 1	Tyre 2	Tyre 3
2:20 per tyre		

Idle





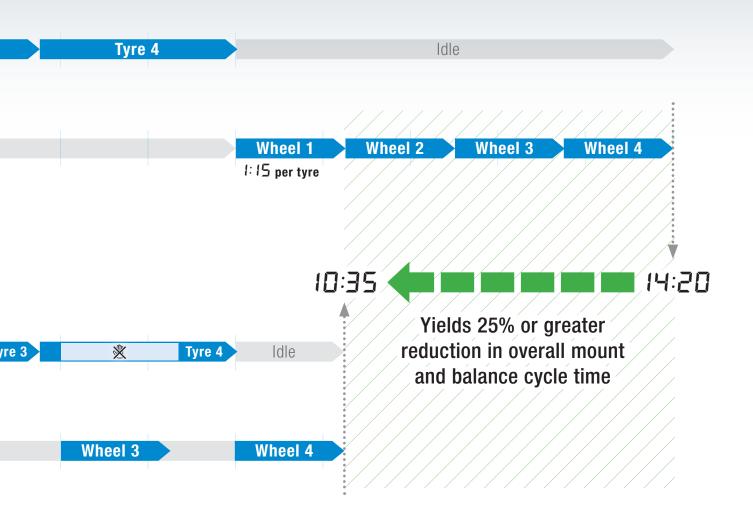
57% changing a tyre using WalkAway!

% 1:20 Tyre 1 Tyre 2 * 2:20 per tyre Unattended Operation Wheel 1 Idle Wheel 2

1:15 per tyre

OEM Fitments Modern	Low profile (under 50 series)	Traditional	Heavy assembly (over 30" assembly)	Run flat	Large diameter (over 20" wheel)		
Percent of Fitments	37%	27%	14%	15%	7%	100%	
Old Equipment (skilled operator)	2:08	1:20	3:14	4:06	3:59	RVERRGE	 15%
Revolution™ (any operator)	2:00	1:56	2:00	2:07	2:10	2:01	IMPROVEMENT <

Most technicians mount and balance sequentially. First demounting and mounting all four tyres, then balancing all four assemblies. The Revolution $^{\text{\tiny TM}}$ tyre changer's new walk-away mode, frees the operator to balance assemblies while the Revolution $^{\text{\tiny TM}}$ demounts another tyre — unattended — saving time and adding capacity.



Fully automatic simplifies training

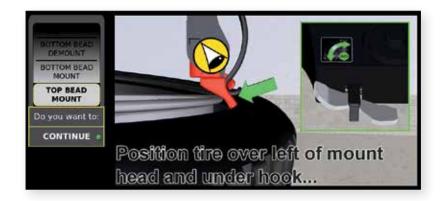
Technique is no longer a requirement for tyre changing — learn on one tyre and apply same skills to all tyres.

The old push here, pull there technique learned through making mistakes and busted knuckles no longer applies. On the Revolution[™], the same process learned for one tyre assembly applies to all tyre assemblies.

Three Ways to Train:

The "Walk Me Through It" Mode

- Animation details each step
- 13 unique animations
- Can be bypassed by experienced operator



25 On-board videos

Including:

- Basic operation
- Detailed operations
- Special procedures
- Accessories



STANDARD

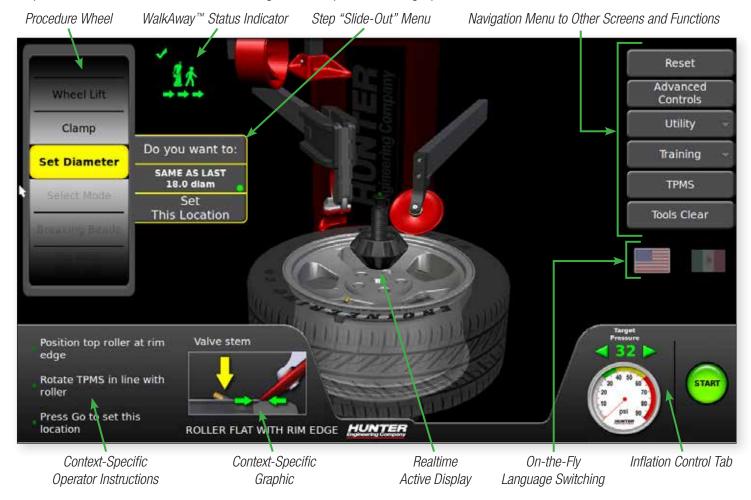
Camera Monitors Operations

- ✓ Identify incorrect operation
- Verify proper work
- ✓ Protect your investment



Touchscreen interface is simple to use

The display shows the operator's current step and monitors progress. Interactions with screen are generally not required. When needed, slide out menus guide the operator through procedure.



NEW HunterNet® Capable

New Revolution[™] tyre changers are HunterNet[®] capable. Tyre changers with wired internet connections will be able to:

- Report usage data*
- ✓ Populate trend reports*
- ✓ Log individual tyre changes including before and after photos*







Powerful Dynamic Features

PATENTED

Powered press arms assist on demand

- Utilize press arms only when necessary or set up to always use them
- Press arms adjust automatically
- Press arms power clockwise to prevent tyre slippage

PATENTED

Bead loosening rollers are damage free

- Bead loosening rollers work best for widest variety of tyres
- Procedure loosens even the most stuck on soft sidewall tyres



No risk of rim damage



PATENTED

Leverless tool head advantages

- Demounting hook automatically deploys to catch and lift bead
- ✓ No risk of lever damage to operator or rim
- Demount hook always avoids TPMS sensor no risk of damage
- Mount head designed to work with clad, raised spoke and all unique wheel designs









PATENTED

TPMS protection is automatic

Once the operator sets the diameter and positions valve stem/TPMS, the Revolution $^{\text{\tiny M}}$ tracks the sensor during mounting and demounting, avoiding costly damage.



Top bead demount



Bottom bead demount



Bottom bead mount



Top bead mount

Fast inflation saves time

Inflation station automatically fills tyre to desired pressure.

✓ Operator stands back or can WalkAway[™] from inflation



Blast inflation directs large blast of air for tough bead seating.



Clamping versatility

- Powerful hydraulic clamp holds wheel secure
- Center clamp design avoids clamping damage
- Three position cone handles wide variety of wheels







Hydraulic operation is powerful and precise

- Hydraulic operation with filter means long durable life, much like industrial equipment
- Hydraulic operation means power and control
- Each tool can be moved quickly or slowly into position and held as needed





Reduce comebacks and do it right the first time

PATENTED

Match-mounting

When used with Hunter's Road Force[®] Elite, the Revolution[™] quickly and easily helps eliminate vibration problems balancers alone can't fix.

The Revolution's bead roller discs allow spinning of tyre on rim, helping match-mount stiffest point on tyre to low spot on rim.





PATENT PENDING

Bead Massage

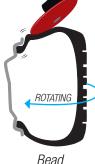
The Revolution tyre changer features a WalkAway[™] bead massage sequence.

During bead massage, rollers apply force to the tyre walls, assisting proper bead seating and reducing vibration concerns.

When combined with Road Force® match-mounting, virtually all vibrations can be eliminated.



Bead is sealed, but not completely seated



Bead massage



7 lbs. reduction (avg.)

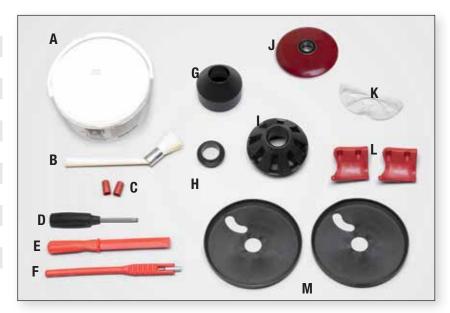


50% of tyre sets are significantly improved using bead massage*

Standard Accessories

The standard Revolution[™] tyre changer comes equipped to handle virtually all tyre and wheel combinations.

Α	RP6-3784	Paste
В	RP6-1506	Paste brush
C	69-1394-2	Pin protector (2)
D	221-759-2	Valve core remover
Ε	221-659-2	Bead starting tool
F	RP11-2020688	Valve puller
G	192-233-1	In-between cone (2)
Н	192-225-1	Small polymer cone (2)
I	192-226-1	Double-sided polymer cone (2)
J	111-154-1	Spare roller
K	179-15-2	Glasses
L	221-713-2	Polymer mount head (2)
M	69-1392-2	Rubber platten cover (2)



Flange plate kit 20-3158-1

Ideal for plastic clad wheels or reverse wheels where maximum protection is needed.

Maximum diameter 240 mm.



Additional Accessories

The following options can be used to enhance serviceability of specialized applications.



Flange plate accessory pin kit 20-3675-1

For wheels with extreme lug hole and lug depth variances.



Dual wheel adaptor 20-2964-1

Optional adaptor adds clamping capability for dual wheels, 19.5 in. wheels and other wheels with large center holes.



Thick bead kit 20-3160-1

Wider hook for thicker beads. Suitable for skid steer, load range G-H-J-tyres. Plus, reverse wheel plate for 19.5-and 17.5-in. rims.

Specifications



Power Requirements	TCRHE-216: 208-230V, 1Ph, 60Hz, 24A
	TCRHE-215: 208-230V, 1Ph, 50Hz, 24A
	TCRHE-435: 230/380V, 3Ph, 50Hz, 10/6A
Air Cumply Doguiromente	$8.6 \pm 1.7 \text{har} (125 \pm 25 \text{nei})$

	TUNNE-433: 230/300V, 3FH, 30NZ, 10/0A
Air Supply Requirements	8.6 ± 1.7 bar (125 ± 25 psi)
Mount / Demount Tool	Polymer Self Inserting Leverless
Clamping Type	Center w/Quick Clamp
Bead Loosening Type	Upper / Lower Roller
Match Mounting Capable	Yes
Rim Diameter Range	305 mm – 762 mm (12 in. – 30 in.)
Maximum Tyre Diameter	1,270 mm (50 in.)
Maximum Whool Width	381 mm (15 in)

Maximum Wheel Width 381 mm (15 in.)

Variable up to 15 rpm Clockwise/Counter Clockwise **Drive** Torque: 1186 Nm (875 ft-lbs)

Shipping Weight 842 kg (1,857 lbs)

Footprint Comparison

Revolution™

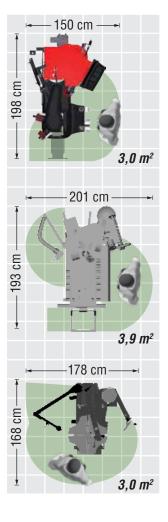
Revolution is space efficient for a premium changer.

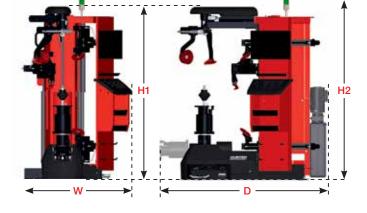


Other popular premium tyre changers are larger.

Typical Tabletop

Even simple conventional changers are larger than they appear when work area is factored.





TCRH Revolution™

Width (W)	Height (H1)	Height (H2)	Depth (D)	Weight
1272 mm	1994 mm	2185 mm	1981 mm	842 kg
50 in	78.5 in	86.0 in	^{78 in}	1856 lbs

Because of continuing technological advancements, specifications, models and options are subject to change without notice.





This product is listed to UL201 Garage Equipment Standard by Intertek (ETL) Testing Laboratories.

Meets national electrical code requirements for electrically powered shop equipment — 1st for an electric tyre changer!

