

# **POWERBLADE**

## **Electric Cordless Lawn Mowers**



### **User Manual**

[Revision 3.0 February 2020]

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READ THIS MANUAL CAREFULLY BEFORE USE – FAILURE TO DO SO MAY RESULT IN INJURY, PROPERTY DAMAGE AND MAY VOID WARRANTY. • KEEP THIS MANUAL FOR FUTURE REFERENCE. • Products covered by this manual may vary in appearance, assembly, inclusions, specifications, description and packaging.

**THE BATTERY MAY HAVE SOME CHARGE ON ARRIVAL, IT IS IMPORTANT HOWEVER THAT THE BATTERY IS CHARGED PRIOR TO USE.**

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# Safety

Safety messages are designed to alert you to possible dangers or hazards that could cause death, injury or equipment or property damage if not understood or followed. Safety messages have the following symbols:

 <p>You <b>WILL</b> be <b>KILLED</b> or <b>SERIOUSLY INJURED</b> if you do not follow instructions.</p>	 <p>You <b>CAN</b> be <b>KILLED</b> or <b>SERIOUSLY INJURED</b> if you do not follow instructions.</p>	 <p>You <b>CAN</b> be <b>INJURED</b> if you do not follow instructions or equipment damage may occur.</p>
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It is important that you read and understand the instruction manual before use and keep the manual in a safe place for future reference. Safety information presented here is generic in nature – some advice may not be applicable to every piece of equipment. The term “equipment” refers to your product, be it electrical mains, battery or petrol engine powered.

Read all safety warnings and all instructions. When using the equipment, basic safety precautions detailed here must always be followed to reduce the risk of fire, electric shock, personal injury and material damage.

**IMPORTANT** – Handle the equipment safely and carefully.

**BEFORE USE** - If you are not familiar with the safe operation/handling of the equipment, or are in any way unsure of any aspect of suitability or correct use it for your application, you should complete training conducted by a person or organization qualified in safe use and operation of this equipment, including fuel/electrical handling and safety.

## WARNINGS

- Read all safety warnings and all instructions. When using the equipment, basic safety precautions detailed here must always be followed to reduce the risk of fire, electric shock, personal injury and material damage.
- Do not operate the equipment in flammable or explosive environments, such as in the presence of flammable liquids, gases or dust. The equipment may create sparks or heat that may ignite vapours, dust etc
- Keep clear of moving parts.
- Equipment may be a potential source of electric shock or injury if misused.
- Do not operate the equipment if it is damaged, malfunctioning or is in an excessively worn state.
- Do not allow others to use the equipment unless they have read this manual and are adequately trained.

## General Work Area Safety

Work areas should be clean and well lit. Do not operate the equipment if bystanders, animals etc are within operating range of the equipment or the general work area.

## General Personal Safety

Keep packaging away from children - risk of suffocation! Operators must use the equipment correctly. When using the equipment, consider conditions and pay due care to persons and property.

Prevent unintentional starting of the equipment - ensure equipment and power source switches are in the OFF position before connecting or moving the equipment. Do not carry equipment with hands/fingers touching any controls. Remove any tools or other items that are not a part of the equipment from it before starting or switching on.

Stay alert and use common sense when operating equipment. Do not overreach. Keep proper footing and balance at all times. Do not use equipment when tired or under the influence of drugs, alcohol or medication. This equipment is not intended for use by persons with reduced physical, sensory or mental capabilities.

You must wear appropriate protective equipment when operating, servicing, or when in the operating area of the equipment to help protect from serious injury, including eye injury, inhalation of toxic fumes, burns, and hearing loss. Always wear eye protection. Protective equipment such as respirators, non-skid safety shoes, hard hat, hearing protection etc should be used for appropriate conditions. Other people nearby should also wear appropriate personal protective equipment. Do not wear loose clothing or jewellery, which can be caught in moving parts. Keep hair and clothing away from the equipment.

If devices are provided for the connection of dust extraction and collection facilities, ensure these are connected and properly used. Use of dust collection can reduce dust-related hazards.

## General

Do not force the equipment. Use the correct equipment for your application. The correct equipment will perform better and be safer within its design parameters.

Do not use the equipment if the ON/OFF switch malfunctions – any equipment that cannot be controlled with the ON/OFF switch is dangerous and must be repaired.

Use the equipment and accessories etc. in accordance with these instructions, considering working conditions and the work to be performed. Using the equipment for operations different from those intended could result in hazardous situations.

Before use, inspect the equipment for misalignment or binding of moving parts, loose components, damage or any other condition that may affect its operation. If damaged, have the equipment repaired by an authorized service centre or technician before use.

Always keep the equipment and accessories (cutting tools, nozzles, bits etc) properly maintained. Keep the equipment, controls and handles dry and free from dirt, oil and grease.

Store the equipment out of reach of children or untrained persons. To avoid burns or fire hazards, let the equipment cool completely before transporting or storing. Never place the equipment in places where there are flammable materials, combustible gases or combustible liquids etc.

The equipment is not weather-proof, and should not be stored in direct sunlight, at high ambient temperatures or locations that are damp or very humid.

## Lawn Mower Use and Care

- The equipment is designed for domestic use only.
- Wear substantial footwear, such as boots, and long trousers when operating the product. Do NOT wear open shoes and shorts.
- Check the work area before mowing and remove any objects (stones etc) that may be thrown by the mower or may otherwise damage it.
- Avoid cutting wet or very tall grass. If grass is tall, mow in several passes, each time reducing the cut height.
- Do not use the equipment for purposes it is not designed for, such as shredding leaves or wood chipping.
- Avoid steep slopes when mowing. If mowing inclines, mow across the face of the incline, not up and down it.
- Use caution when reversing or pulling the equipment towards you, and changing direction.
- After stopping the motor, always allow all moving components (blades etc) to stop before moving, lifting etc.
- Remove the battery before cleaning, transporting or storing the equipment.
- Stop the motor if the equipment requires tilting or moving over non-grass surfaces.
- Do not use the equipment when raining or in wet conditions.

**General Battery and Charging Safety**

- Use only with the batteries and battery charger specified by the manufacturer.
- When battery is charged, disconnect the charger from the power supply and remove the battery from the charger.
- Batteries can explode in the presence of an ignition source, such as a pilot light. To reduce the risk of serious personal injury, never use any cordless product in the presence of open flame. Exploding batteries can propel debris and chemicals.
- Do not use the charger in wet areas or expose it to rain or water.
- Do not open the battery – danger of short-circuiting and/or explosion.
- Do not attempt to destroy or disassemble the battery pack or remove any of its components.
- Do not touch the battery terminals with metal objects and/or body parts as short-circuit and/or personal injury may result.
- Explosion hazard – protect the battery against heat; for example, direct sunlight and fire. Do not store batteries in vehicles or locations subject to heat.
- Explosion hazard – do not open and/or short-circuit the battery.
- Poison hazard – battery leakage (liquid ejection). Under extreme conditions, liquid may be ejected from the battery – avoid contact. If contact accidentally occurs, immediately seek medical attention, and flush with water. If liquid contacts eyes, immediately seek medical attention, flush with clean water for at least 10 minutes. Liquid ejected from the battery may cause irritation or burns.
- Ensure that the battery charger electrical cord is not subjected to damage or stress. Do not operate the battery charger if it has a damaged electrical cord or plug.
- For best results, charge batteries in temperatures between 7°C (45°F) and 40°C (104°F).
- Dispose of non-serviceable batteries in an environmentally responsible manner and according to local regulations.

**General Electrical Safety**

- Inspect electrical equipment, extension cords, power bars, and electrical fittings for damage or wear before each use. Repair or replace damaged equipment immediately.
- Ensure all power sources conform to equipment voltage requirements and are disconnected before connecting or disconnecting equipment.
- When wiring electrically powered equipment, follow all electrical and safety codes.
- Wherever possible, use a residual current device (RCD).
- Electrically grounded equipment must have an approved cord and plug and be connected to a grounded outlet.
- Do not bypass the on/off switch and operate equipment by connecting and disconnecting the power cord.
- Do not use equipment that has exposed wiring, damaged switches, covers or guards.
- Do not use electrical equipment in wet conditions or damp locations.
- Do not use electrical cords to lift, move or carry equipment.
- Do not tie electrical cords in tight knots and ensure electrical cords do not present trip hazards.

**General Service Information**

- Have the equipment serviced or repaired at authorized service centres by qualified personnel only.
- Replacement parts must be original equipment manufacturer (OEM) to help ensure that equipment safety is maintained.
- Do not attempt any maintenance or repair work not described in this instruction manual.
- After use, the equipment and components may still be hot – allow the equipment to cool and disconnect spark plugs and/or electrical power sources and/or batteries from it before making adjustments, changing accessories or performing repair or maintenance.
- Do not make adjustments while the equipment is running.
- Perform all service related activities under suitable conditions, such as a workshop etc.
- Replace worn, damaged or missing warning/safety labels immediately.
- Do not clean equipment with solvents, flammable liquids or harsh abrasives.

# Table of Contents

<b>Safety .....</b>	<b>2</b>
<b>Applicable Models .....</b>	<b>5</b>
<b>General Parts Identification .....</b>	<b>6</b>
<b>Batteries and Battery Charging .....</b>	<b>7</b>
Charging.....	7
<b>Lithium Battery Care and Maintenance .....</b>	<b>9</b>
Top 3 Battery Care Requirements .....	9
<b>EX-500 Parts Identification and Assembly .....</b>	<b>10</b>
<b>EX-400 Parts Identification and Assembly .....</b>	<b>12</b>
<b>Lawn Mower Operation .....</b>	<b>14</b>
Preparing the Mower for Use .....	14
Starting and Stopping the Motor .....	14
After Use .....	15
Folding / Unfolding the Handle.....	15
Adjusting Cutting Height.....	15
Using the Grass Catcher.....	16
Using the Mulching Plug .....	16
Using the Side Discharge Chute.....	17
Using the Deck Wash Function.....	17
Mowing Guidelines .....	17
Cleaning Guidelines .....	18
Cleaning the Drive Belt .....	19
<b>Transportation and Storage .....</b>	<b>19</b>
<b>Troubleshooting.....</b>	<b>19</b>
<b>Specifications.....</b>	<b>20</b>



## Applicable Models

This manual applies to the following Power Blade lawn mowers:

**EX-400** Cordless Lawn Mower



**EX-500** Cordless Lawn Mower



## General Parts Identification

Lawn mowers come with all parts required for normal domestic use. A basic toolkit may also be included. It is strongly recommended that you familiarise yourself with all major components of the machine before using it or performing any maintenance tasks.



Products detailed in this manual may vary in appearance, inclusions, description and packaging from those shown or described. For example, a side discharge chute may apply to some models. This section shows typical major components common to most electrically powered lawn mowers; the position of some components may also vary between models.



No.	Name	No.	Name
1	Deck	9	Cut Height Adjuster
2	Motor	10	Rear Guard (shown in "up" position)
3	Handle	11	Grass Catcher
4	Cutting Blade	12	Deck Wash Hose Connector (where applicable)
5	Safety Key (where applicable)	13	Battery
6	Starting Button	14	Battery Charger
7	Motor Safety Bar (where applicable)		
8	Battery Compartment		

# Batteries and Battery Charging



Batteries may come supplied in a low-charge condition for shipping reasons – charge before use. • A battery that is new or has not been used for a long period does not charge to full capacity until after approximately 5 charge/discharge cycles. • Do not recharge batteries after using them if they are not to be used for an extended period. • Recharge batteries only as and when required. • If the battery is warm after use, allow it to cool before charging, otherwise it may not fully charge. • Use only with the batteries and battery charger specified by the manufacturer. • Batteries can explode in the presence of an ignition source, such as a pilot light. Never use any cordless product in the presence of open flame. Exploding batteries can propel debris and chemicals. • Do not use the charger in wet areas or expose it to rain or water. • Ensure that the battery charger electrical cord is not subjected to damage or stress. Do not operate the battery charger if it has a damaged electrical cord or plug. • Do not open the battery – danger of short-circuiting and/or explosion. • Do not touch the battery terminals with metal objects and/or body parts as short-circuit and/or personal injury may result. • For best results, charge batteries in temperatures between 7°C (45°F) and 40°C (104°F). • Dispose of non-serviceable batteries in an environmentally responsible manner and according to local regulations. Charging time varies for different battery types depending on battery capacity and charger output etc. • To prolong battery life, avoid leaving the battery pack on charge for extended periods (over 30 days without use). • During charging, the battery may become warm and some noise may be emitted – this is normal.

## Charging

Generally, if the lawn mower stops during use, the cutting power reduces, or the motor slows considerably, it indicates that the battery needs charging. Some batteries may include a function for checking the current charge status. Some models may feature carrying more than one battery "on-board" and may also automatically switch from one battery to the other when one battery is exhausted.

### EX-500

Batteries for the EX-500 have a display built-in that shows current charge status. To use the functions, press and hold button (A) on the battery – charge capacity is shown as green lamps for 25%, 50%, 75% and 100%, with a secondary red lamp that illuminates if charging is required.

The battery charger has charge status LED indicators that illuminate and flash in various combinations:

- **Red ON** – Charging.
- **Green ON** – Battery charged.

1. Plug the battery charger power supply into an electrical outlet and switch on.
2. Slide the battery fully into the battery charger. The battery charger indicator LEDs will indicate battery charge status. Charging takes approximately 2.5 hours from fully discharged.
3. When the battery is fully charged, unplug the charger from power supply and remove the battery pack.





## EX-400

Batteries for the EX-400 have a display built-in that shows current charge status. To use the functions, press and hold button **(A)** on the battery – charge capacity is shown as green lamps for 25%, 50%, 75% and 100%, with a secondary red lamp that illuminates if charging is required.

The battery charger has charge status LED indicators that illuminate and flash in various combinations:

- **Red** - No battery detected.
- **Red Flash** - Battery fault detected.
- **Green Flash** – Charging.
- **Green ON** – Battery charged.

1. Plug the battery charger power supply into an electrical outlet and switch on.
2. Slide the battery fully into the battery charger. The battery charger indicator LEDs will indicate battery charge status. Charging takes approximately 2.5 hours from fully discharged.
3. When the battery is fully charged, unplug the charger from power supply and remove the battery pack.








# Lithium Battery Care and Maintenance

## Top 3 Battery Care Requirements

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1. **Charge battery before first use.** The battery may arrive with some charge, regardless of this the battery must be charged for 2.5 hours on the initial charge and for each subsequent charge. 
  2. **Charge battery immediately when it is depleted.** Do not store a depleted battery. This will permanently impact the life of the battery. If the battery is going to be stored for a period of time, fully charge the battery before storing. 
  3. **Disconnect battery when not in use.** To prolong the life of a battery, disconnect it from the unit when not in use. Disconnect chargers from the battery once charged. 
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To ensure the battery maintains optimum performance, follow the guidelines outlined below.

- For best results, charge batteries in temperatures between 10°C and 30°C
- When battery is charged, disconnect the charger from the power supply and remove the battery from the charger.
- If a battery is stored or otherwise unused for an extended period, and the battery has no charge remaining when you check it, consider it to be damaged. Do not attempt to recharge it or to use it. Replace it with a new battery.
- Use only with the battery charger specified by the manufacturer.
- Ensure that the battery charger electrical cord is not subjected to damage or stress. Do not operate the battery charger if it has a damaged electrical cord or plug.
- Do not use the charger in wet areas or expose it to rain or water.
- The typical estimated life of a Lithium-Ion battery is about two to three years or 300 to 500 charge cycles, whichever occurs first. One charge cycle is a period of use from fully charged, to fully discharged, and fully recharged again
- Explosion hazard – protect the battery against heat; for example, direct sunlight and fire. Do not store batteries in vehicles or locations subject to heat.
- Batteries can explode in the presence of an ignition source, such as a pilot light. To reduce the risk of serious personal injury, never use any cordless product in the presence of open flame. Exploding batteries can propel debris and chemicals.
- Do not open the battery – danger of short-circuiting and/or explosion.
- Do not attempt to destroy or disassemble the battery pack or remove any of its components.
- Do not touch the battery terminals with metal objects and/or body parts as short-circuit and/or personal injury may result.
- Explosion hazard – do not open and/or short-circuit the battery.
- Poison hazard – battery leakage (liquid ejection). Under extreme conditions, liquid may be ejected from the battery – avoid contact. If contact accidentally occurs, immediately seek medical attention, and flush with water. If liquid contacts eyes, immediately seek medical attention, flush with clean water for at least 10 minutes. Liquid ejected from the battery may cause irritation or burns.
- Dispose of non-serviceable batteries in an environmentally responsible manner and according to local regulations.

Failure to adhere to the requirements above may result in the battery becoming inoperative or battery life being reduced. In extreme cases or abuse, battery overheating or fire may result.

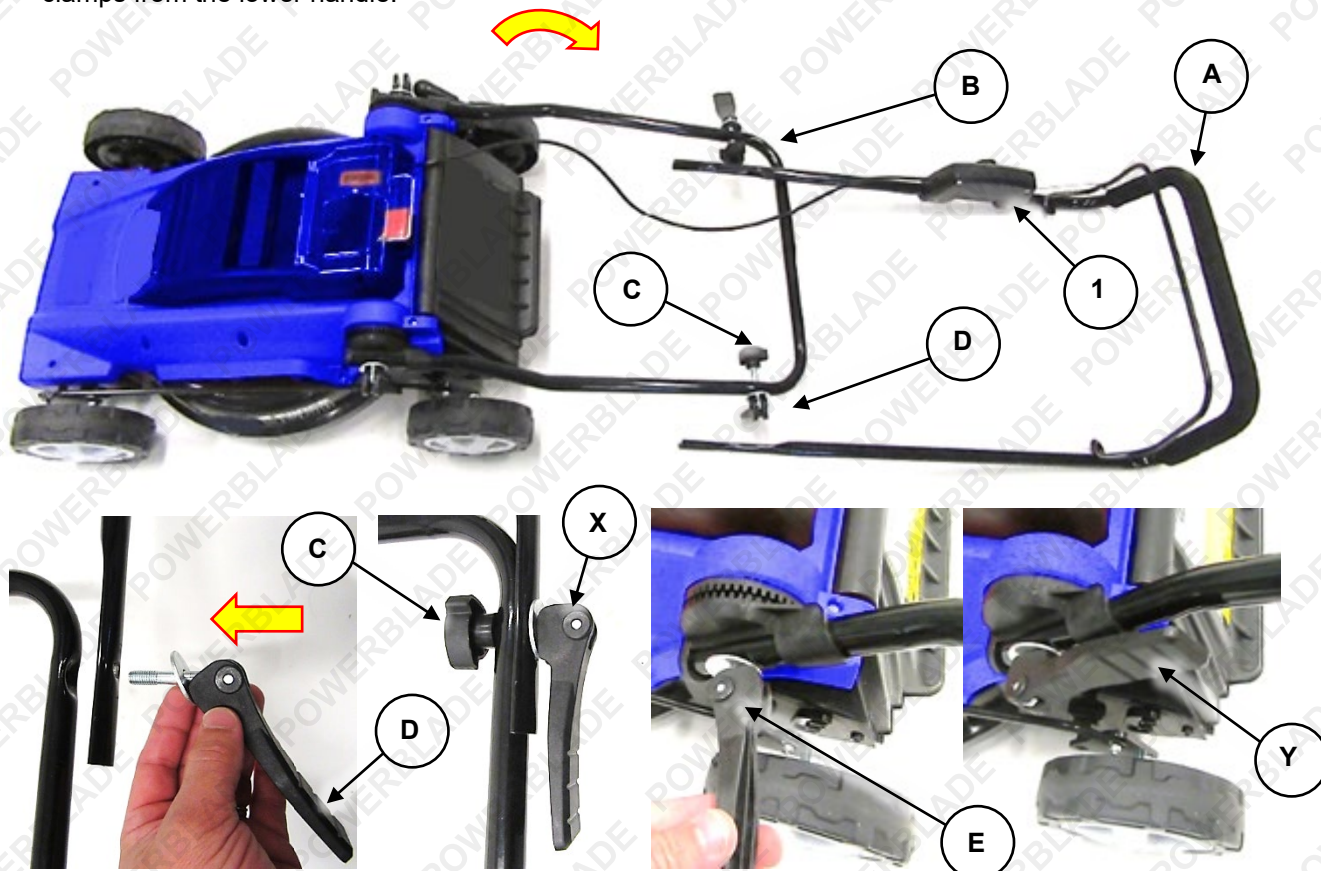
# EX-500 Parts Identification and Assembly



No.	Name	No.	Name
1	Lawn Mower (includes deck, motor, handle etc)	4	Battery Charger
2	Grass Catcher	5	Battery
3	Safety Key		



1. Set the machine out so the upper handle (A) is behind the mower – ensure that the control button (1) is on the right-hand side when viewing the mower from behind. Rotate the lower handle (B) around so that it is also behind the mower, then remove (rotate left) the nuts (C) from the clamps (D), then remove the clamps from the lower handle.



2. Place the upper handle (A) in position so the ends of the handle "wrap" around the top section of the lower handle (B). Secure the upper handle using the clamps (D) and nuts (C). Insert the clamp bolts from the outside of the handle and install (rotate right) the nuts so that when the clamp is in the locked position (X), the handles are secure.
3. Raise the handle assembly to a comfortable position, then secure it by locking the bottom clamps (E). If required, adjust the clamp by screwing the clamp bolt in / out so that when the clamp is in the locked position (Y), the handle is secure.
4. Once the handle is secure, check that the motor cable (F) is routed along the top of the handle, without kinks etc, and is secured to the handle with any supplied cable clips.



Route the cable on top of the handle tubing, not underneath. Having the cable on top of the handle tubing helps reduce the possibility of stressing the cable when folding / unfolding the handle.



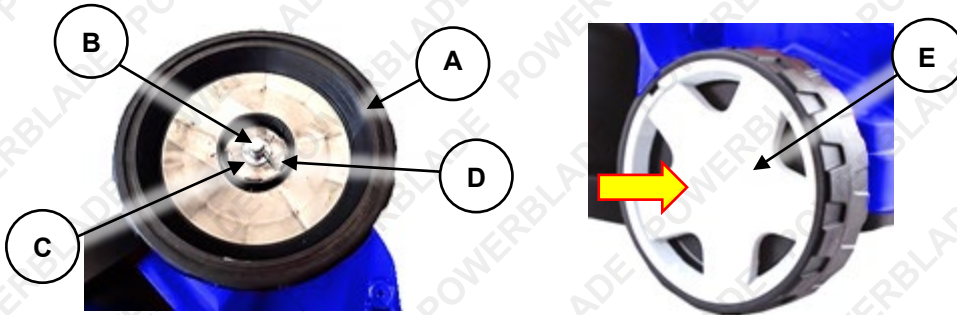
# EX-400 Parts Identification and Assembly



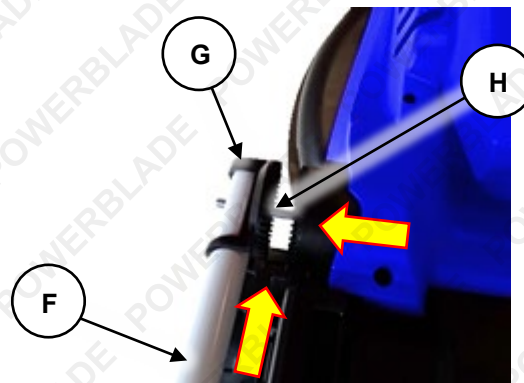
No.	Name	No.	Name
1	Handle	7	Wheel and Wheel Cover (x4 each)
2	Lawn Mower (includes deck and motor)	8	Split Pin (x4)
3	Grass Catcher (2pcs)	9	Washer (x4)
4	Grass Catcher Handle	10	Grass Catcher Handle Screw
5	Battery Charger	11	Cable Clip
6	Safety Key	12	Battery



4. Slide a wheel (A) onto the axle (B), then place a washer (C) on the axle and secure the wheel and washer using a split pin (D). Insert the split pin through the hole in the axle, then bend the legs of the split pin around the axle to prevent it falling out
5. Place a wheel cover (E) onto the wheel and press firmly in the centre with the palm of your hand until the cover "clips" into place. Repeat steps 1 and 2 for each wheel.



6. Place the handle (F) into position by sliding the ends into the handle brackets (G), located above the rear wheels.
7. Insert the handle bolts (H) through the handle brackets and handle tubes.



8. Attach the grass catcher handle to the upper grass catcher part and secure it with the supplied screw.
9. Join the upper and lower grass catcher parts together. Ensure that the locking tabs on each part are aligned, then press the parts together firmly so that all locking tabs "clip" together.

# Lawn Mower Operation

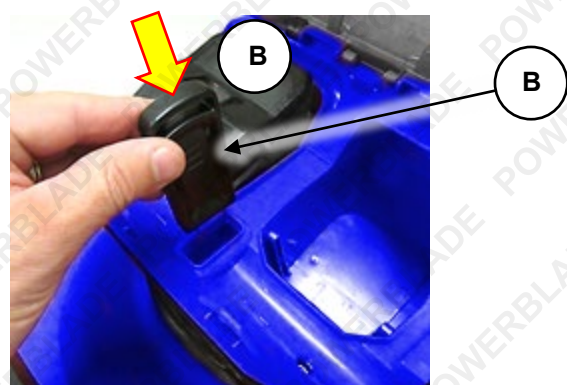


Always wear suitable protective clothing and equipment when using the machine. • Inspect the machine before each use and check for wear or damage. If the machine is damaged, have it inspected and repaired at an authorised service centre before using it again. • If you experience excessive vibration from the mower during operation, this is an indication of wear or damage. It is recommended to have it inspected and repaired at an authorised service centre before using it again. • Be aware that once the motor is running, the cutting blades will be rotating and parts of the machine may be hot. • Ensure that the area to be mowed is free of objects that may get caught in the mower or be thrown by it (stones, branches etc).

The lawn mower may have additional features to "just" cutting grass. For example, mulching, side discharge chute etc.

## Preparing the Mower for Use

- Ensure the battery is adequately charged.
- Insert the battery (some models may allow 2 batteries to be inserted). Open the compartment lid and insert the battery (A). Batteries can be inserted correctly in one direction only – ensure that the battery is fully inserted. Close the battery compartment lid fully to help prevent grass cuttings etc from getting in.
- Insert the "safety key" (B) – the appearance of the safety key and the location where it is inserted may vary. For the EX-500, the safety key must be inserted into a slot inside the battery compartment. For the EX-400, the safety key must be inserted into a slot beside the battery compartment.

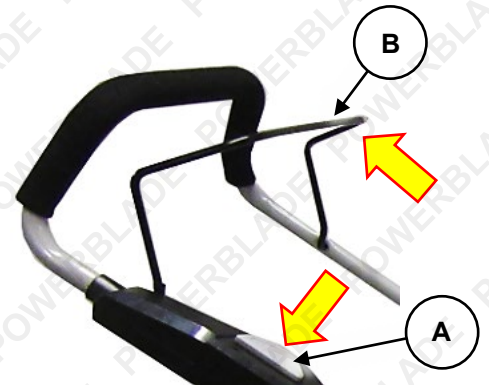


## Starting and Stopping the Motor

The mower has a "safety bar" [also known as a "brake bar" or "bail"] and power switch that must be engaged simultaneously for the motor to start. When the motor is running, the safety bar must remain held against the handle – if the bar is released, the motor automatically stops. This is a safety feature to help ensure that the mower operator is behind the mower while the motor is running. To start and run the motor:

1. Press in and hold the power switch (A) – the switch will generally "click" when properly engaged.
2. Gently pull the motor safety bar (B) against the handle.
3. After 2 to 3 seconds, the motor will start – the mower may have a "soft-start", which starts the motor slowly, then builds up speed. Once the motor is running, stop pressing the power switch.
4. Hold the safety bar against the handle to keep the motor running.

To stop the motor, release the safety bar.



## After Use



It is recommended to charge the battery after each use. • Always remove the batteries before lifting, transporting or storing the machine to prevent possible accidental starting.

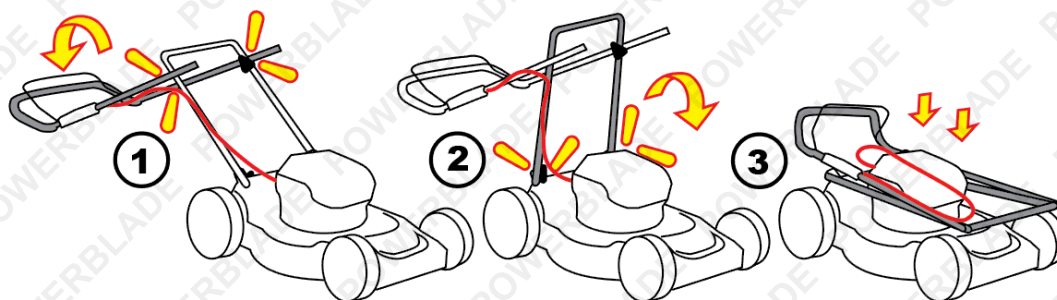
- Release the safety bar to stop the motor.
- Clean the lawn mower, including under the deck and the cutting blade. For models that have a "deck wash" function, use that to clean the underside of the lawn mower.
- Remove the safety key.

## Folding / Unfolding the Handle



Fold the handle as shown. Do NOT pull or stretch the motor cable. Unfold the handle in reverse order to the folding procedure. • There may be some variation between models to the appearance of the handle and/or the method for assembling the handle parts – some may use levers, some may use bolts and nuts. The procedure, however, remains the same.

1. Unlock the upper handle from the lower handle, then gently rotate the upper handle down toward the rear guard.
2. Unlock the lower handle from the lawn mower, then gently rotate it and the upper handle toward the front of the lawn mower.
3. When finished, the handles should be resting on top of the mower. For models that use nuts and bolts to fasten the handles, place the bolts/nuts back into the handles to prevent loss.



## Adjusting Cutting Height

Most mowers feature adjustable cutting heights. The mechanism raises/lowers the lawn mower deck and has several steps. When setting cutting height, note that weeds can spread more easily in very short grass. If the grass is long it may be necessary to cut it in several passes, each time lowering the cutting height. To set the cutting height:

1. Pull the height adjustment lever (A) outward so that it disengages the locking mechanism.
2. Rotate the lever forward to raise, or backward to lower, then release it at the desired height.



For the EX-400:



Ensure the blades have completely stopped spinning before turning the lawn mower over.

1. Turn the lawn mower over to access the underside.
2. Locate the rear axle (A), and note the height adjustment notches (B) where the rear axle passes through the mower deck.
3. Place your hands at either end of the axle and pull the axle from the notch.
4. Move the axle to the required notch, then release so it is sitting fully in the notch.





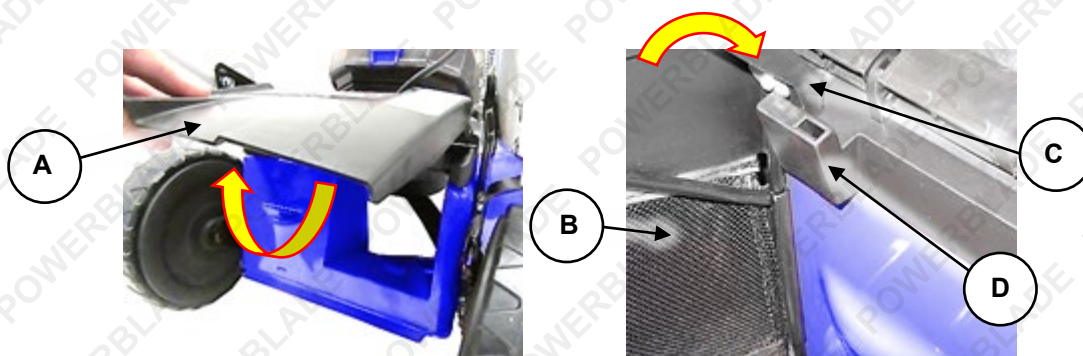
## Using the Grass Catcher



Ensure that the mulching plug (if equipped) is not installed when using the grass catcher.

When you want to catch the grass cuttings for disposal, use the grass catcher. The grass catcher hooks to the rear of the mower, under the rear guard. To attach and detach it:

1. Lift the bottom edge of the rear guard (**A**) sufficiently to allow the catcher to pass underneath it. Hold the guard in this position.
2. Insert the catcher (**B**), with open end toward the mower, and hook the catcher fingers (**C**) onto the mounting points (**D**), then lower the rear guard so it rests on the top of the grass catcher.

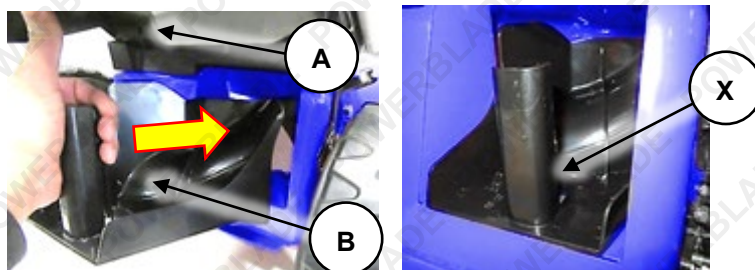


To remove the grass catcher, lift the bottom edge of the rear guard, then lift the grass catcher to unhook it from the mower. Once unhooked, pull the grass catcher out and lower the rear guard.

## Using the Mulching Plug

Some models may feature a "mulching plug". Mulching is to re-circulate the cut the grass through the blades so that is very finely "chopped" and can be left on the cut grass as a "grass feed". When mulching, the grass catcher is not required. To install the mulching plug:

1. Remove the grass catcher, if installed. Lift and hold the rear guard (**A**).
2. Insert the mulching plug (**B**) by sliding it straight into the opening in the deck until the tongue on the bottom of the plug "clicks" into the slot in the mower deck. Ensure the plug is fitted correctly, then lower the rear guard.



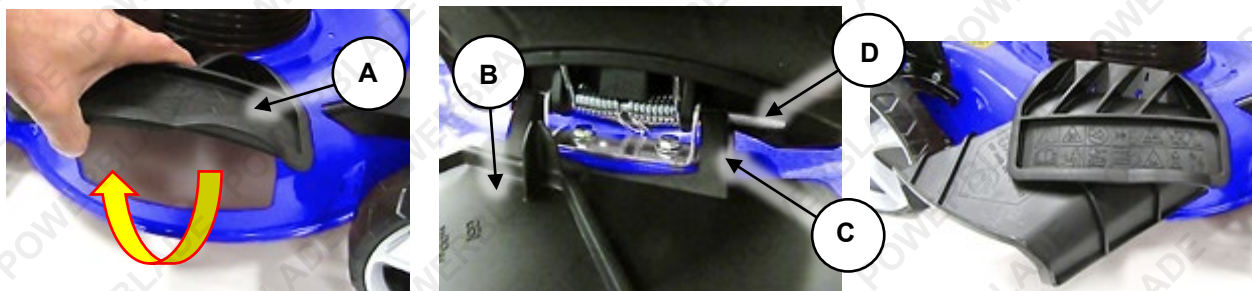
To remove the mulching plug, lift the rear guard, squeeze the mulching plug handle at point **X** to release the tongue from the deck and gently pull the mulching plug out, then lower the rear guard.



## Using the Side Discharge Chute

Some models may feature a "side discharge chute". The side discharge chute ejects the grass cutting to the side of the mower. When using the side discharge chute, the grass catcher is not required. To install the side discharge chute:

1. Remove the grass catcher, if installed. Lift and hold the flap (A) on the side of the mower deck.
2. Insert the side discharge chute (B) under the flap. Ensure that the hooks (C) on the side discharge chute hook onto the flap hinge pin (D), then lower the flap.



To remove the side discharge chute, lift the flap, unhook and remove the chute, then lower the flap.

## Using the Deck Wash Function

Some models may have a "deck wash" function to help make cleaning the blades and underside of the deck easier. Note that the function is not intended to completely clean the mower – it will remove some built-up cuttings and dirt from the deck, but more importantly, will soften it up to make removal by hand easier. Keeping the underside of the deck clean will prolong the life of the machine and blades. To use the deck wash function:

1. Install the mulching plug and side discharge chute and lower the deck to the lowest cutting height.
2. Attach a garden hose to the deck wash port (A) and turn the water on.
3. Start the motor and allow it to run for approximately 30 to 60 seconds – be aware that water and grass cuttings/dirt will be ejected through the side discharge chute.
4. Stop the motor and turn off the water, remove the battery then scrape away cuttings/dirt from the deck by hand (wear gloves) or using a suitable tool. This procedure may have to be repeated several times.



## Mowing Guidelines

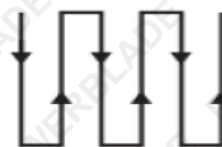


If the machine strikes against an object during mowing or an object gets caught in the mower, stop the machine immediately and remove the battery. Allow the machine to stop running completely before inspecting it and/or removing any objects that may be caught in it. If the machine is damaged, have it inspected and repaired at an authorised service centre before using it again. • If you experience excessive vibration from the mower during operation, this is an indication of wear or damage. It is recommended to have it inspected and repaired at an authorised service centre before using it again.

The following information are general guidelines to mowing:

- The equipment is designed for domestic use only.
- Always wear substantial footwear, such as boots, and long trousers when operating the product. Do NOT wear open shoes and shorts.
- Do NOT use the equipment for purposes it is not designed for, such as shredding leaves or wood chipping.
- Check the work area before mowing and remove any objects (stones etc) that may be thrown by the mower or may otherwise damage it.
- Avoid cutting wet grass. Wet grass clippings tend to stick to the underside of the deck.

- Avoid cutting very tall grass. If the grass is tall, mow in several passes, each time reducing the cut height.
- Avoid overly steep slopes when mowing and, when mowing on an incline, mow across the face of the incline, not up and down it.
- Do not start self-propelled models (where applicable) with the drive mechanism engaged.
- Use caution when reversing or pulling the equipment towards you, and changing direction.
- After stopping the motor, always allow all moving components (blades etc) to stop moving before moving, lifting etc.
- Stop the motor if the equipment requires tilting or moving over non-grass surfaces.
- Be aware that cutting more than one third of the total height of the grass may affect the health of the grass, and that weeds are able to spread more easily in extremely short grass. A healthier lawn is achieved by regular mowing and not cutting the grass back excessively.
- When mowing, move the mower through the grass at a sensible rate to not strain the machine or otherwise reduce its effectiveness, and to achieve the best cutting results.
- Mow in slightly overlapping rows. An effective pattern is to mow in straight lines, starting along the longest edge of the work area, then turning at the end and mowing the next row and so on. Using a regular pattern helps keep the result neat and reduces the chance of uncut areas.
- For lawns with trees or flowerbeds, for best results it is recommended to cut 1 or 2 rows around the circumference of trees/flowerbeds.
- Regularly empty the grass catcher. Some models may feature an indicator to show when the grass catcher requires emptying. This is usually a small flap on the top of the catcher that lifts when the catcher becomes full.



## Cleaning Guidelines



Do NOT expose any part of the machine to water (except for the deck underside for machines with a "deck wash" function). Exposure to water may create an electrical shock hazard and / or may damage the machine electronics. **Exposing the machine to water or other liquids may void any product warranty.** • Remove the battery and safety key from the machine before cleaning. • Do not use solvents, chemicals or abrasives when cleaning the machine, as some surfaces may be damaged. • Wear gloves or use suitable tools to assist in cleaning – do not use bare hands. • Clean the machine after every use to ensure best performance and longest service life.

- Use a soft cloth for cleaning.
- Use a brush for parts that may be difficult to reach.
- Ensure air vents and surfaces designed for heat dissipation are clean and free of obstructions or debris.
- Remove clippings, dirt etc from the underside of the deck and cutting blades (the [deck wash](#) function on some models assists this procedure).
- It is recommended to lightly oil the cutting blades after each use to help prevent corrosion.
- Ensure all chutes and flaps are clean and not obstructed.
- Ensure that spring-loaded parts, such as the rear guard, return to the normal position when released.
- Clean and check the grass catcher for any damage – replace damaged parts. Allow the grass catcher to dry thoroughly before storing to prevent mildew or deterioration of the catcher netting (where applicable).
- Ensure that all control cables, levers, switches etc are clean and operate normally and smoothly.

## Cleaning the Drive Belt

From time-to-time, the drive belt needs to be accessed and cleaned to remove any accumulated debris that can cause the self-propelling function to stop working.

Please see video link to the right for a general overview on how to access and diagnose the drive belt.

**Video Tutorial:**  
[Drive Belt Diagnosis](#)



## Transportation and Storage



Always ensure that the machine is cool enough to touch before transporting or storing. • Do not expose the equipment or battery charger to rain or water – store in dry areas.

### Preparing for Transport and Storage

- Remove the battery.
- Clean the equipment before transport or storage.
- Store the equipment in a dry, well-ventilated area and out of the reach of children.




## Troubleshooting



Do not have the motor running during inspection and maintenance unless specifically required. • The machine should be cool enough to touch before performing maintenance activities. • Some maintenance activities described may be beyond the scope of some users. For procedures that you are not comfortable with or have the tools or experience for, have the unit serviced by a service centre or qualified technician.

The following information may assist in identifying a problem and rectifying it.

### Difficulty starting the mower.

Possible Fault	Action
<i>Incorrect procedure</i>	Press the power switch until it "clicks" and hold in this position, then gently draw safety lever to handle.
	
<i>No voltage</i>	Ensure the battery is charged and is correctly inserted. Ensure that the safety key is correctly inserted.
	
<i>Blades obstructed</i>	Remove the battery and remove any obstructions to the blades.
	
<i>Battery or control switch faulty</i>	Have battery and / or machine tested and repaired at an authorised service centre.

### Key Start function not working.

Possible Fault	Action
<i>Battery drained</i>	<ul style="list-style-type: none"> <li>• Manually start the mower and run it for a period of time.</li> <li>• Do not turn the mower OFF and ON to empty the catcher.</li> <li>• Recharge the battery with a battery charger.</li> </ul>



**Grass cutting is poor.**

Possible Fault	Action
<i>Blades dull or damaged</i>	Sharpen or replace cutting blades.



<i>Cutting too much in one pass</i>	Adjust the cutting height and rate of mowing to reduce load on the engine. For tall or very thick grass, cut in several passes. Do not attempt to cut beyond the capacity of the machine.
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<i>Cutting height not suitable</i>	Adjust cutting height as required.
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**Excessive vibration.**

Possible Fault	Action
<i>Blades dull or damaged</i>	Sharpen or replace cutting blades.



<i>Fasteners loose</i>	Check all accessible fasteners for tightness.
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<i>Motor output shaft worn or bent</i>	Replace worn or damaged parts as required.
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## Specifications

**EX-500**

<b>Battery</b>	36V 2.6Ah Rechargeable Lithium Battery
<b>Height Adjustments</b>	5 position (25-75mm)
<b>Cutting Width</b>	370mm
<b>Charger Specs</b>	2.5 charge time, SAA plug
<b>Starting System</b>	Push Button Start with Safety Key
<b>Working Area</b>	200-400m <sup>2</sup>
<b>Grass Catcher</b>	35L
<b>Noise</b>	96dB
<b>Motor</b>	Brushed



**EX-400**

<b>Battery</b>	40V 2.0Ah Rechargeable Lithium Battery
<b>Motor</b>	900W Motor
<b>Height Adjustments</b>	3 position (20-56mm)
<b>Cutting Width</b>	320mm
<b>Charger Specs</b>	1.5hr charge time
<b>Starting System</b>	Push Button Start with Safety Key
<b>Grass Catcher</b>	30L

*Note: Minimal Assembly required*



**Some experts believe the incorrect or prolonged use of almost any product could cause serious injury or death. For information that may reduce your risk of serious injury or death, consult the points below and additionally, the information available at [www.datastreamserver.com/safety](http://www.datastreamserver.com/safety)**

- Consult all documentation, packaging and product labelling before use. Note that some products feature online documentation which should be printed and kept with the product.
- Check product for loose / broken / damaged / missing parts, wear or leaks (if applicable) before each use. Never use a product with loose / broken / damaged / missing parts, wear or leaks (if applicable).
- Products must be inspected and serviced (if applicable) by a qualified specialist every 6 months assuming average residential use by a person of average weight and strength, above average technical aptitude, on a property matching average metropolitan specification. Intended use outside these guidelines could indicate the product is not suitable for intended use or may require more regular inspection or servicing.
- Ensure all possible users of the product have completed an industry recognized training course before being given access to the product.
- The product has been supplied by a general merchandise retailer that may not be familiar with your specific application or your description of the application. Be sure to attain third-party approval for your application from a qualified specialist before use regardless of prior assurances by the retailer or its representatives.
- This product is not intended for use where fail-safe operation is required. As with any product (take an automobile, aircraft, computer or ball point pen for example), there is always a small chance of technical issues that needs to be repaired or may require replacement of the product or a part. If the possibility of such failure and the associated time it takes to rectify could in any situation inconvenience the user, business or employee then the product is not suitable for your requirements. This product is not for use where incorrect operation or a failure of any kind, including but not limited to a condition requiring product return, replacement, service by a technician or replacement of parts could cause a financial loss, loss of employee time or an inconvenience requiring compensation.
- If this item has been purchased in error after considering the points above, simply contact the retailer directly for details of their returns policy, if required.

