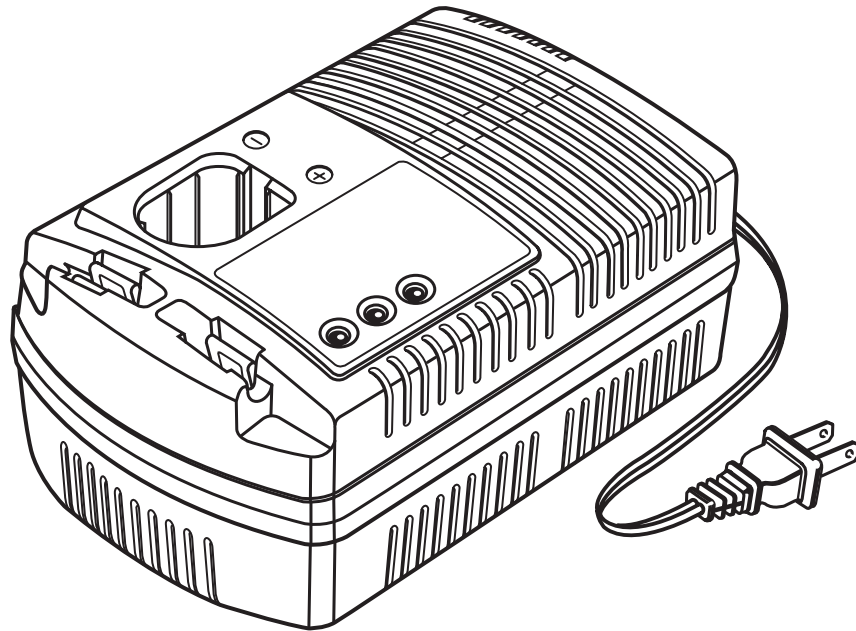


RYOBI[®] OPERATOR'S MANUAL

1400677 Battery Charger



SPECIFICATIONS:	
Charger	1400677
Input	120 Volts, 60 Hz, AC Only – 60 Watts
Charging Voltage	9.6 -18 Volt
Charging Current	1.8 Amperes
Net Weight	2.9 Lbs.

THANK YOU FOR BUYING A RYOBI BATTERY CHARGER.

Your new battery charger has been engineered and manufactured to Ryobi's high standard for dependability, ease of operation, and operator safety. Properly cared for, it will give you years of rugged, trouble-free performance.

⚠ CAUTION: Carefully read through this entire operator's manual before using your new battery charger.

Pay close attention to the Rules for Safe Operation, Warnings, and Cautions. If you use your battery charger properly and only for what it is intended, you will enjoy years of safe, reliable service.

Thank you again for buying Ryobi tools.

SAVE THIS MANUAL FOR FUTURE REFERENCE

RULES FOR SAFE OPERATION

The purpose of safety symbols is to attract your attention to possible dangers. The safety symbols, and the explanations with them, deserve your careful attention and understanding. The safety warnings do not by themselves eliminate any danger. The instructions or warnings they give are not substitutes for proper accident prevention measures.

SYMBOL MEANING



SAFETY ALERT SYMBOL:

Indicates danger, warning, or caution. May be used in conjunction with other symbols or pictographs.



DANGER: Failure to obey a safety warning will result in serious injury to yourself or to others. Always follow the safety precautions to reduce the risk of fire, electric shock and personal injury.



WARNING: Failure to obey a safety warning can result in serious injury to yourself or to others. Always follow the safety precautions to reduce the risk of fire, electric shock and personal injury.



CAUTION: Failure to obey a safety warning may result in property damage or personal injury to yourself or to others. Always follow the safety precautions to reduce the risk of fire, electric shock and personal injury.

NOTE:

Advises you of information or instructions vital to the operation or maintenance of the equipment.



WARNING:

Do not attempt to operate this battery charger until you have read thoroughly and understand completely all instructions, safety rules, etc. contained in this manual. Failure to comply can result in accidents involving fire, electric shock, or serious personal injury. Save operator's manual and review frequently for continuing safe operation, and instructing others who may use this battery charger.

IMPORTANT SAFETY INSTRUCTIONS FOR CHARGER

- **SAVE THESE INSTRUCTIONS.** This manual contains important safety and operating instructions for battery charger part number 1400677.
- Before using battery charger, read all instructions and cautionary markings on battery charger, and product using battery charger. Carefully read and understand these instructions and the Operator's Manual for the product using this charger.



WARNING:

To reduce risk of injury, charge only nickel-cadmium type rechargeable batteries. Other types of batteries may burst causing personal injury and damage.

- Do not expose charger to rain or snow or other wet conditions.

- Use of an attachment not recommended or sold by the battery charger manufacturer may result in a risk of fire, electric shock, or injury to persons.
- To reduce risk of damage to charger body and cord, pull by plug body rather than cord when disconnecting charger.
- Make sure cord is located so that it will not be stepped on, tripped over, or otherwise subjected to damage or stress.
- An extension cord should not be used unless absolutely necessary. Use of improper extension cord could result in a risk of fire and electric shock. If extension cord must be used, make sure:
 - a. That pins on plug of extension cord are the same number, size and shape as those of plug on charger.
 - b. That extension cord is properly wired and in good electrical condition; and
 - c. That wire size is large enough for AC ampere rating of charger as specified below:

RECOMMENDED MINIMUM A.W.G. SIZE FOR EXTENSION CORDS FOR BATTERY CHARGERS

Ampere Rating (on face plate)	0 - 2.0	2.1 - 3.4
Cord Length (Feet)	Wire Size (A.W.G.)	
25'	16	16
50'	16	16
100'	16	16

NOTE: AWG = American Wire Gage

RULES FOR SAFE OPERATION (Continued)

- **DO NOT OPERATE CHARGER WITH A DAMAGED CORD OR PLUG.** If damaged, have replaced immediately by a qualified serviceman.
- Do not operate charger if it has received a sharp blow, been dropped, or otherwise damaged in any way; take it to a qualified serviceman.
- Do not disassemble charger; take it to a authorized serviceman when service or repair is required. Incorrect reassembly may result in a risk of electric shock or fire.
- To reduce risk of electric shock, unplug charger from outlet before attempting any maintenance or cleaning. Turning off controls will not reduce this risk.
- Do not use charger outdoors.
- Disconnect charger from power supply when not in use.
- Do not insert foreign matter into the hole for the battery in charger.
- Do not charge by means of an engine generator or DC power source.
- Do not disassemble the battery.
- Do not store the tool and battery in locations where the temperature may reach or exceed 104°F (40°C). Such as outside sheds or metal buildings in summer.
- Do not incinerate the battery, even if it is severely damaged or completely worn out. The battery may explode in fire.
- Under extreme usage or temperature conditions, battery leakage may occur. If liquid comes in contact with your skin, wash immediately with soap and water, then neutralize with lemon juice or vinegar. If liquid gets in your eyes, flush them with clean water for at least 10 minutes, then seek immediate medical attention.

PRECAUTIONS REGARDING THE USE OF CHARGER AND BATTERY

- Do not charge battery when temperature is below 50°F or above 100°F.
- Never attempt to connect two chargers together.
- The charger is designed to operate on standard household electrical power. Do not attempt to use it on any other voltage.
- Do not short-circuit the battery.
- Do not discharge battery beyond normal use limits. Further discharging (such as by placing a rubber band on the trigger switch) can cause a deep discharge which may result in polarity reversal of a cell rendering the battery useless.

SAVE THESE INSTRUCTIONS



Look for this symbol to point out important safety precautions. It means attention!!! Your safety is involved.



WARNING:



The operation of any power tool can result in foreign objects being thrown into your eyes, which can result in severe eye damage. Before beginning power tool operation, always wear safety goggles or safety glasses with side shields and a full face shield when needed. We recommend Wide Vision Safety Mask for use over eyeglasses or standard safety glasses with side shields.

OPERATION

USE 1400677 BATTERY CHARGER ONLY WITH BATTERY PACK NOS. 1400651, 1400652, 1400655, 1400671 AND 1400672

CHARGING BATTERY PACK

See Figures 1 & 2.

Battery pack's are shipped in a low charge condition to prevent possible problems. Therefore, you should charge it prior to use.

NOTE: Batteries will not reach full charge the first time they are charged. Allow several cycles (operating tool followed by recharging batteries) for them to fully charge.

TO CHARGE

- Use 1400677 battery charger only with recommended battery packs. See list above.
- **Make sure power supply is normal house voltage, 120 volts, 60 Hz, AC only.**
- Connect charger to power supply.
- Place battery pack in charger aligning raised rib in charger with groove in battery pack.
- Press down on battery pack to be sure contacts on battery pack engage properly with charger contacts.
- Red light should turn on. Red light indicates fast charging mode.

If red light is flashing, this indicates battery pack is deeply discharged or hot.

If battery pack is hot, red light should become steady after battery pack has cooled down.

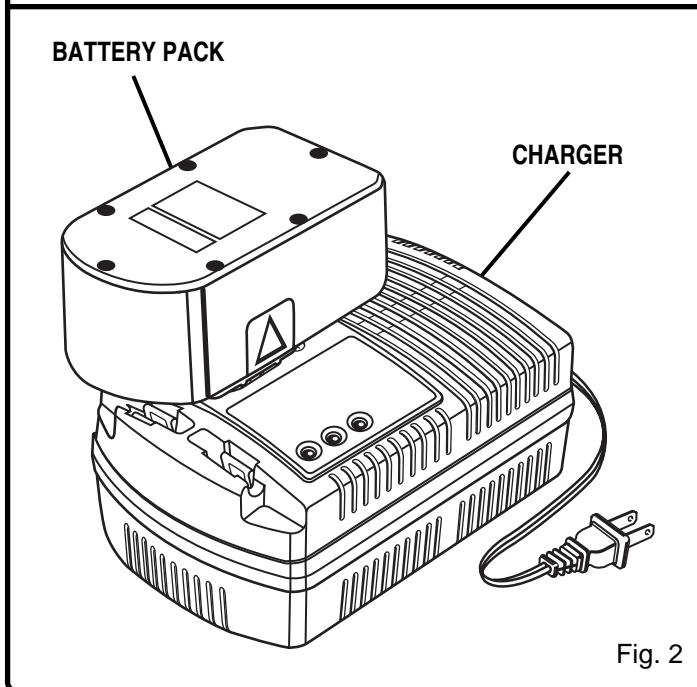
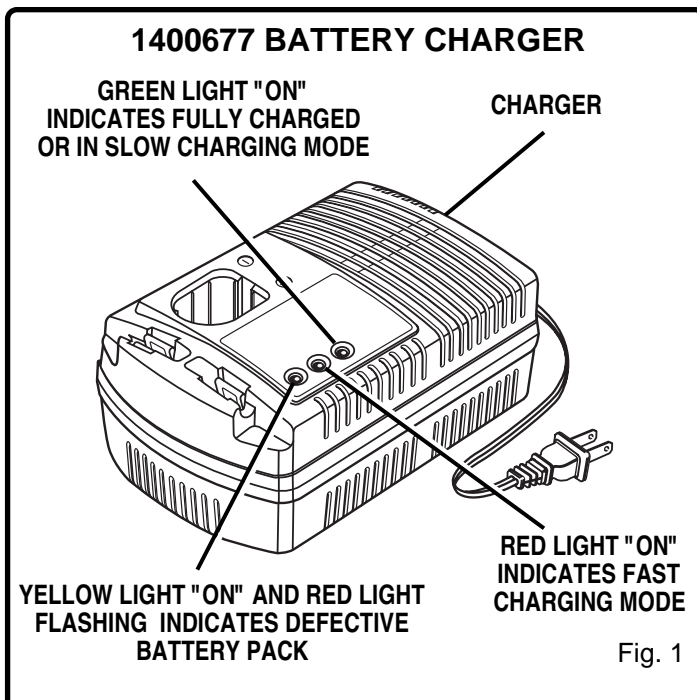
If battery pack is deeply discharged, red light should become steady after voltage has increased, normally within 30 minutes.

If after one hour red light is still flashing, this indicates a defective battery pack and should be replaced.

Green light on indicates battery pack is fully charged or in slow charging mode to maintain battery pack charge.

Yellow light on and red light flashing indicates defective battery pack. Return battery pack to your nearest Ryobi Authorized Service Center for checking or replacing.

- When your battery pack becomes fully charged, the red light will turn **OFF** and the green light will turn **ON**.
- After normal usage, 1 hour of charging time is required to be fully charged. A minimum charge time of 1-1/2 hours is required to recharge a completely discharged tool.
- The battery pack will become slightly warm to the touch while charging. This is normal and does not indicate a problem.
- **DO NOT** place charger in an area of extreme heat or cold. It will work best at normal room temperature.
- When the batteries become fully charged, unplug your charger from power supply and remove the battery pack.



OPERATION

IMPORTANT INFORMATION FOR RECHARGING HOT BATTERIES

When using your tool continuously, the batteries in your battery pack will become hot. You should let a hot battery pack cool down for approximately 30 minutes before attempting to recharge. When the battery pack becomes discharged and is hot, this will cause the red light on your battery charger to flash. When battery pack cools down, red light will glow continuously indicating fast charging mode, 1 hour charge time. Once the battery pack cools down, it will recharge battery pack in fast charging mode as normal.

NOTE: This situation only occurs when continuous use of your tool causes the batteries to become hot. **It does not occur under normal circumstances.** Refer to "**CHARGING BATTERY PACK**" for normal recharging of batteries. If the charger does not charge your battery pack under normal circumstances, return **both** the battery pack and charger to your nearest Ryobi Authorized Service Center for electrical check.

LED FUNCTION OF CHARGER

LED WILL BE LIGHTED TO INDICATE STATUS OF CHARGER AND BATTERY PACK:

- Red LED Lighted = Fast Charging Mode.
- Green LED Lighted = Fully Charged Or In Slow Charging Mode To Maintain Battery Pack Charge.
- Red LED Flashing = Hot or Deeply Discharged Battery Pack. Also Defective Battery Pack After 1 hour.
- Yellow LED Lighted and Red LED Flashing = Defective Battery Pack.

MAINTENANCE



WARNING:

When servicing, use only identical replacement parts. Use of any other part may create a hazard or cause product damage.



WARNING:

Do not at any time let brake fluids, gasoline, petroleum-based products, penetrating oils, etc. come in contact with plastic parts. They contain chemicals that can damage, weaken or destroy plastic.

DO NOT abuse power tools. Abusive practices can damage tool as well as workpiece.



WARNING:

Do not attempt to modify this tool or create accessories not recommended for use with this tool. Any such alteration or modification is misuse and could result in a hazardous condition leading to possible serious personal injury.

RYOBI® OPERATOR'S MANUAL **1400677 Battery Charger**

- **SERVICE**

Now that you have purchased your charger, should a need ever exist for repair parts or service, simply contact your nearest Ryobi Authorized Service Center. Be sure to provide all pertinent facts when you call or visit.

- **PART NO.**

The part number of this charger will be found on a plate attached to the bottom of the housing.

- NAME OF ITEM BATTERY CHARGER
- PART NUMBER 1400677
- SERIAL NUMBER _____

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