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> Grills House ZH3005Y-SC 2-Burner Gas and Charcoal Combo Grill Instruction Manual

## Grills House ZH3005Y-SC

# Grills House 2-Burner Gas and Charcoal Combo Grill

MODEL: ZH3005Y-SC

## Introduction

This manual provides essential instructions for the safe assembly, operation, and maintenance of your Grills House ZH3005Y-SC 2-Burner Gas and Charcoal Combo Grill. This versatile outdoor cooking appliance combines the convenience of gas grilling with the authentic flavor of charcoal, featuring an integrated offset smoker and a side burner. The grill offers a total cooking area of 1020 sq. in., including a 666 sq. in. primary cooking area (333 sq. in. gas, 333 sq. in. charcoal), a 157 sq. in. warming rack, and a 197 sq. in. offset smoker area. It is powered by 2 stainless steel main burners (12,000 BTU each) and a 10,000 BTU side burner, delivering a total of 34,000 BTU.



Image: The Grills House ZH3005Y-SC combo grill in use, showcasing its gas, charcoal, side burner, and offset smoker sections with various foods cooking.

## Important Safety Information

Read all instructions carefully before assembly and use. Failure to follow these instructions could result in fire, explosion, or burn hazards, which could cause property damage, personal injury, or death.

- **Outdoor Use Only:** This grill is for outdoor use only. Do not operate indoors or in an enclosed area.
- **Clearance:** Maintain a minimum distance of 36 inches (91 cm) from the back and sides of the grill to any combustible materials.
- **Propane Gas Safety:**
  - Use only a 20 lb (9.1 kg) propane cylinder (LP gas) with a Type 1 connection.
  - Always check for gas leaks before each use.
  - Do not store a spare LP cylinder under or near the grill.
  - Turn off the gas supply at the cylinder after each use.
- **Charcoal Safety:**
  - Use only charcoal briquettes or lump charcoal. Do not use lighter fluid in the gas section.

- Allow charcoal to cool completely before disposing of ashes.
- **Hot Surfaces:** The grill will be hot during and after use. Use heat-resistant gloves and avoid direct contact with hot surfaces.
- **Children and Pets:** Keep children and pets away from the grill at all times.

## Components Overview

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Familiarize yourself with the main components of your Grills House combo grill:

- **Gas Grill Section:** Equipped with two main burners and cooking grates for direct heat grilling.
- **Charcoal Grill Section:** Features a height-adjustable charcoal pan and cooking grates for charcoal grilling.
- **Offset Smoker:** Attached chamber for smoking, also usable as an additional charcoal grill. Includes a side door for fuel management.
- **Side Burner:** A 10,000 BTU burner located on the left side for cooking side dishes or sauces.
- **Warming Racks:** Located above the main cooking grates in both gas and charcoal sections.
- **Control Knobs:** For regulating gas flow to the main burners and side burner.
- **Piezo Ignition System:** For easy lighting of gas burners.
- **Temperature Gauges:** Integrated into the lids for monitoring internal temperatures.
- **Storage Shelf:** A lower shelf for propane tank and accessories.



Image: Visual representation of the grill's four cooking zones: gas, charcoal, side burner, and offset smoker.

## Setup and Assembly

Assembly requires careful attention to detail. It is recommended to have two people for certain steps. Refer to the included assembly diagram for specific part identification and fastening instructions.

1. **Unpacking:** Carefully remove all components from the packaging. Verify all parts are present against the parts list in your assembly guide.
2. **Base Assembly:** Assemble the main cart structure, ensuring all bolts are securely tightened.
3. **Grill Body Attachment:** Attach the gas and charcoal grill bodies to the assembled base.
4. **Offset Smoker Installation:** Securely attach the offset smoker to the main grill body.
5. **Side Burner Assembly:** Install the side burner unit and connect its gas line according to the diagram.
6. **Internal Components:** Place cooking grates, warming racks, and charcoal pans into their respective sections.  
**Important:** Ensure any protective plastic film is removed from components like the small racks before use.

- Propane Tank Connection:** Connect the gas regulator hose to a 20 lb LP gas cylinder. Ensure a tight seal and check for leaks using a soapy water solution.
- Initial Burn-Off:** Before cooking food, operate the gas grill on high for 15 minutes to burn off any manufacturing residues. For the charcoal section, burn a small amount of charcoal for 30 minutes.



Image: Technical diagram illustrating the overall dimensions and specific cooking area measurements of the grill.

## Operating Instructions

### Gas Grill Operation

- Open the grill lid.
- Ensure all burner control knobs are in the "OFF" position.
- Open the valve on the LP gas cylinder.

4. Push and turn one main burner control knob to the "HIGH" position. Immediately press the igniter button several times until the burner lights.
5. If the burner does not light within 5 seconds, turn the knob to "OFF", wait 5 minutes, and repeat the lighting procedure.
6. Once lit, adjust the flame intensity using the control knobs.
7. To turn off, turn all control knobs to "OFF" and close the LP gas cylinder valve.

### **Charcoal Grill Operation**

1. Open the charcoal grill lid.
2. Place charcoal briquettes or lump charcoal onto the charcoal pan. Do not exceed the maximum capacity of 3.3 lb.
3. Ignite the charcoal using a charcoal chimney starter or appropriate solid fire starters. Do not use lighter fluid.
4. Once the charcoal is covered with a light gray ash, spread it evenly.
5. Adjust the heat by using the 3-level height-adjustable charcoal pan. Lower the pan for less intense heat, raise it for more direct heat.
6. Utilize the air vents on the grill body to control airflow and temperature.



**10,000 BTU**

side burner

perfect for cooking side dishes

Image: Detail of the charcoal grill's adjustable pan, demonstrating its three height settings for heat regulation.

### Offset Smoker Operation

1. Open the offset smoker lid.
2. Place charcoal and/or wood chips into the smoker chamber. Do not exceed the maximum charcoal capacity of 1.5 lb.
3. Ignite the fuel. The side door allows for easy addition of charcoal or wood chips during smoking.
4. Close the smoker lid and the main charcoal grill lid to allow smoke and heat to circulate.
5. Monitor temperature using the integrated gauge and adjust airflow via the vents for optimal smoke circulation and temperature control.



Image: The offset smoker section, highlighting the convenient side door for adding fuel during operation.

### Side Burner Operation

1. Open the side burner lid.
2. Ensure the LP gas cylinder valve is open.
3. Push and turn the side burner control knob to the "HIGH" position. Immediately press the igniter button until the burner lights.
4. Adjust the flame as needed.
5. To turn off, turn the control knob to "OFF" and close the LP gas cylinder valve.

# 4-IN-1 COOKING VERSATILITY

take care of all your culinary needs



Image: The 10,000 BTU side burner in operation, suitable for preparing sauces or side dishes.

## Maintenance and Care

Regular cleaning and maintenance will extend the life of your grill and ensure optimal performance.

- **Cleaning Cooking Grates:** After each use, once the grill has cooled, brush off food residue from the cooking grates. For stubborn residue, wash with warm soapy water and rinse thoroughly.
- **Grease Management System:** Regularly check and empty the grease tray to prevent flare-ups and maintain cleanliness.
- **Charcoal Pan Cleaning:** The removable charcoal pan and perforated charcoal pan should be cleaned after each charcoal grilling session. Allow ashes to cool completely before removal.
- **Exterior Cleaning:** Wipe down exterior surfaces with a damp cloth and mild detergent. Avoid abrasive cleaners.
- **Storage:** Store the grill in a dry, protected area when not in use. If storing outdoors, use a weather-resistant grill cover. Disconnect the LP gas cylinder if storing for extended periods.

**No matter which cooking style you choose,  
post-meal cleanup is just a breeze!**



Image: Visual guide to the grill's easy-to-clean features, including the grease management system and removable charcoal pans.

## Troubleshooting

Problem	Possible Cause	Solution
Gas burner does not light.	No gas flow, clogged burner ports, faulty igniter.	Check LP cylinder valve. Ensure regulator is properly connected. Clean burner ports. Check igniter electrode for spark.
Uneven heat on gas grill.	Clogged burner ports, low gas pressure.	Clean burner ports. Check for kinks in gas hose. Ensure LP cylinder is not low.
Charcoal not heating evenly.	Uneven charcoal distribution, insufficient airflow.	Distribute charcoal evenly. Adjust air vents to increase airflow.
Excessive smoke from gas grill.	Grease buildup, food drippings.	Clean grease tray and cooking grates. Reduce heat if necessary.

If you encounter issues not listed here or if solutions do not resolve the problem, contact Grills House customer support.

## Specifications

**Brand:**

Grills House

**Model Name:**

ZH3005Y-SC

**Power Source:**

Dual Fuel (Gas, Charcoal)

**Color:**

Black

**Outer Material:**

Alloy Steel

**Item Weight:**

87 Pounds

**Product Dimensions (D x W x H):**

23.35" x 67.72" x 46.22"

**Total Cooking Area:**

1020 sq. in.

**Primary Cooking Area:**

666 sq. in. (333 sq. in. gas, 333 sq. in. charcoal)

**Warming Rack Area:**

157 sq. in.

**Offset Smoker Area:**

197 sq. in.

**Total BTU:**

34,000 BTU (2 x 12,000 BTU main burners + 10,000 BTU side burner)

**UPC:**

810001893149



Image: Infographic detailing the grill's total cooking area capacity, capable of holding up to 36 burgers, 61 chicken drumsticks, 32 steaks, 3 racks of ribs, or 105 sausages.

## Warranty and Support

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For warranty information, technical support, or replacement parts, please contact Grills House customer service. Refer to your purchase documentation or the official Grills House website for contact details.

When contacting support, please have your model number (ZH3005Y-SC) and proof of purchase readily available.

