

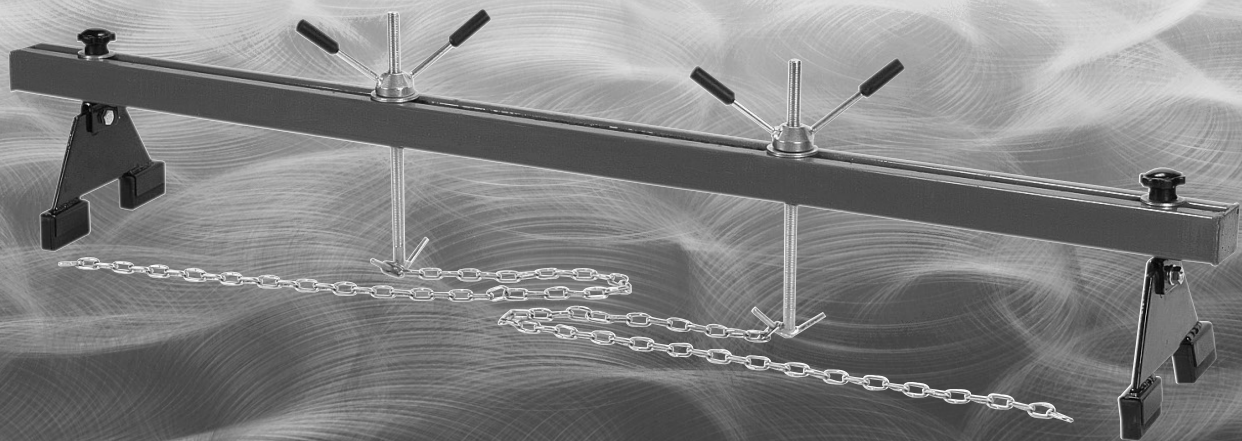
Owner's Manual & Safety Instructions

Save This Manual Keep this manual for the safety warnings and precautions, assembly, operating, inspection, maintenance and cleaning procedures. Write the product's serial number in the back of the manual near the assembly diagram (or month and year of purchase if product has no number). Keep this manual and the receipt in a safe and dry place for future reference.

PITTSBURGH[®] **AUTOMOTIVE**

ITEM 96524

1000 Lb. Capacity Engine Support Bar



Visit our website at: <http://www.harborfreight.com>

REV 131

Email our technical support at: productsupport@harborfreight.com

When unpacking, make sure that the product is intact and undamaged. If any parts are missing or broken, please call 1-888-866-5797 as soon as possible.

Copyright© 2007 by Harbor Freight Tools®. All rights reserved.

No portion of this manual or any artwork contained herein may be reproduced in any shape or form without the express written consent of Harbor Freight Tools. Diagrams within this manual may not be drawn proportionally. Due to continuing improvements, actual product may differ slightly from the product described herein. Tools required for assembly and service may not be included.

⚠ WARNING

**Read this material before using this product.
Failure to do so can result in serious injury.
SAVE THIS MANUAL.**

SAVE THIS MANUAL

Keep this manual for the safety warnings and precautions, assembly, operating, inspection, maintenance and cleaning procedures. Write the product's serial number in the back of the manual near the assembly diagram (or month and year of purchase if product has no number). Keep this manual and the receipt in a safe and dry place for future reference.

IMPORTANT SAFETY INFORMATION

In this manual, on the labeling, and all other information provided with this product:



This is the safety alert symbol. It is used to alert you to potential personal injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death.

DANGER

DANGER indicates a hazardous situation which, if not avoided, will result in death or serious injury.

WARNING

WARNING indicates a hazardous situation which, if not avoided, could result in death or serious injury.

CAUTION

CAUTION, used with the safety alert symbol, indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.

NOTICE

NOTICE is used to address practices not related to personal injury.

CAUTION

CAUTION, without the safety alert symbol, is used to address practices not related to personal injury.

GENERAL SAFETY RULES



WARNING! Read all instructions

Failure to follow all instructions listed below may result in electric shock, fire, and/or serious injury. The term “tool” in all of the warnings listed below refers to your Engine Support.

SAVE THESE INSTRUCTIONS

1. **Work area safety**
 - a. Keep work area clean and well lit. *Cluttered or dark areas invite accidents.*
 - b. **Keep children and bystanders away while using the Engine Support.** *Distractions can cause you to lose control.*
2. **Personal safety**
 - a. Stay alert, watch what you are doing and use common sense when operating the Engine Support. Do not use it while you are tired or under the influence of drugs, alcohol or medication. *A moment of inattention while operating tools may result in serious personal injury.*
 - b. **Use safety equipment. Always wear eye protection. Safety equipment such as dust mask, non-skid safety shoes, hard hat, hearing protection, and work gloves used for appropriate conditions will reduce personal injuries.**
 - c. Do not overreach. Keep proper footing and balance at all times. *This enables better control of the tool in unexpected situations.*
 - d. Dress properly. Do not wear loose clothing or jewelry. Keep your hair, clothing and gloves away from moving parts. *Loose clothes, jewelry or long hair can be caught in moving parts.*
3. **Tool use and care**
 - a. Do not force the Engine Support. Do not try to lift more than 1,000 Pounds with it. Use the correct tool for your application. *The Engine Support will do the job better and safer at or below the weight for which it is rated.*
 - b. **Store idle tools out of the reach of children and do not allow persons unfamiliar with the tool or these instructions to operate it. Tools are dangerous in the hands of untrained users.**
 - c. Maintain the Engine Support. Check for misalignment or binding of moving parts, breakage of parts and any other condition that may affect the tools operation. If damaged, have the tool repaired before use. *Many accidents are caused by poorly maintained tools.*
 - d. Use the Engine Support in accordance with these instructions and in the manner intended for the particular type of tool, taking into account the working conditions and the work to be performed. *Use of the tool for operations different from those intended could result in a hazardous situation.*

SPECIFIC SAFETY RULES

1. Maintain labels and nameplates on the tool. They carry important safety information. If unreadable or missing, contact Harbor Freight Tools for a replacement.
2. This product is not a toy. Keep it out of reach of children.
3. Use the Engine Support for short-term lifting projects only. The Engine Support is not constructed to endure extended term use.
4. Never exceed the maximum weight limit of 1,000 Pounds.
5. **Never work on an engine that is supported only by the Engine Support.** Do not take any action that will jar, jostle or move the engine. Moving the engine in any way creates a safety hazard and may cause the engine to fall resulting in serious personal injury or property damage.
6. Never work underneath an engine while it is supported only by the Engine Support.
7. Be aware of dynamic loading! Suddenly swinging or dropping load may briefly create excess load causing product failure.
8. The warnings, precautions, and instructions discussed in this instruction manual cannot cover all possible conditions and situations that may occur. It must be understood by the operator that common sense and caution are factors which cannot be built into this product, but must be supplied by the operator.



SAVE THESE INSTRUCTIONS.

SPECIFICATIONS

Maximum Capacity	1,000 Pounds
Overall Dimensions	59" x 9-1/2" x 12-1/4"
Weight	31.4 lbs.

UNPACKING

When unpacking, check to make sure that the item is intact and undamaged. If any parts are missing or broken, please call Harbor Freight Tools at the number shown on the cover of this manual as soon as possible.

SET UP INSTRUCTIONS



Read the **ENTIRE IMPORTANT SAFETY INFORMATION** sections at the beginning of this manual including all text under subheadings therein before set up or use of this product.

Note: For additional information regarding the parts listed in the following pages, refer to the Assembly Diagram near the end of this manual.

Assembly

1. Using provided Nuts (2) and Bolts (4), attach Standing Blocks (3) to Standing Brackets (1) for both sides of the Engine Support. Tighten the Nuts (2).
2. Mount both Standing Brackets to Beam (5) with Wing Screws (7) and Washers (6). Tighten the Wing Screws (7).
3. Insert the Support Screws (11) upwards through the Beam, add Large Washers (9) and screw onto Handles (10).

Function

The Engine Support is designed only to support the engine so that parts or mechanisms underneath the engine, which normally have limited access, can be reached.

OPERATING INSTRUCTIONS



Read the **ENTIRE IMPORTANT SAFETY INFORMATION** sections at the beginning of this manual including all text under subheadings therein before use of this product.

General operating instructions

1. Read the owner's manual of the engine to be lifted to determine its lifting points.
2. Never try to move a running or hot engine. Allow sufficient time for the engine to cool down entirely before beginning any operations.
3. Park the car on a flat surface, apply the parking brakes and check the wheels.
4. Loosen Wing Screws (7) and spread Standing Bracket (1), and locate rubber cushions of the Standing Brackets over the lips adjacent to the fenders of the car. Tighten the Wing Screws (7). Center the engine support bar assembly over the engine.
5. Attach the Chains (12) to the engine at the appropriate lifting points, then loop the Chains securely to the flange on the bottom of the Support Screws (11).

6. Turn the Handles (10) clockwise until the Chains are taut and the engine is held securely.
7. Loosen engine mounts. Turn the Handles (10) at 1/4" clockwise turns until the entire engine's weight is supported by the chains. Additionally loosen/disconnect the engine mounts.
8. Never work on the engine while it is supported only by the Engine Support. Moving the engine while it is suspended only by the Engine Support can cause the Engine Support to fail or shift, resulting in serious personal injury and/or property damage.
9. To prevent accidents, lower and reconnect the engine when finished working. The Engine Support is not intended to be used as a long-term suspension device. Clean, then store the tool indoors out of children's reach.

MAINTENANCE AND SERVICING

Damaged equipment can fail, causing serious personal injury. Do not use damaged equipment. If abnormal noise or vibration occurs, have the problem corrected before further use.

Cleaning, maintenance, and lubrication

1. **BEFORE EACH USE**, inspect the general condition of the tool. Check for loose screws, misalignment or binding of moving parts, cracked or broken parts and any other condition that may affect its safe operation.
2. **AFTER USE**, clean external surfaces of the tool with clean, moist cloth.

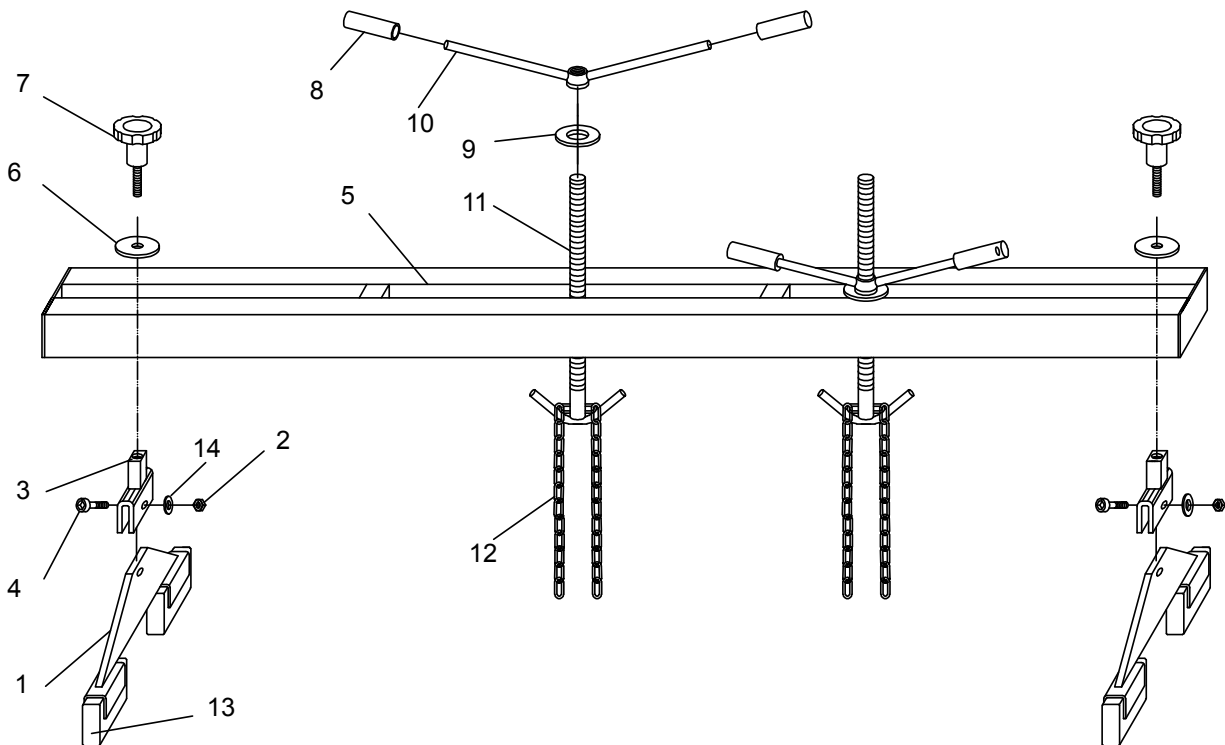
PLEASE READ THE FOLLOWING CAREFULLY

THE MANUFACTURER AND/OR DISTRIBUTOR HAS PROVIDED THE PARTS LIST AND ASSEMBLY DIAGRAM IN THIS MANUAL AS A REFERENCE TOOL ONLY. NEITHER THE MANUFACTURER OR DISTRIBUTOR MAKES ANY REPRESENTATION OR WARRANTY OF ANY KIND TO THE BUYER THAT HE OR SHE IS QUALIFIED TO MAKE ANY REPAIRS TO THE PRODUCT, OR THAT HE OR SHE IS QUALIFIED TO REPLACE ANY PARTS OF THE PRODUCT. IN FACT, THE MANUFACTURER AND/OR DISTRIBUTOR EXPRESSLY STATES THAT ALL REPAIRS AND PARTS REPLACEMENTS SHOULD BE UNDERTAKEN BY CERTIFIED AND LICENSED TECHNICIANS, AND NOT BY THE BUYER. THE BUYER ASSUMES ALL RISK AND LIABILITY ARISING OUT OF HIS OR HER REPAIRS TO THE ORIGINAL PRODUCT OR REPLACEMENT PARTS THERETO, OR ARISING OUT OF HIS OR HER INSTALLATION OF REPLACEMENT PARTS THERETO.

PARTS LIST

Part	Description	Qty	Part	Description	Qty
1	Standing Bracket	2	8	Rubber Grip	4
2	Nut M10	2	9	Large Washer	2
3	Standing Block	2	10	Handle	2
4	Bolt M10x30	2	11	Support Screw	2
5	Beam	1	12	Chain	2
6	Small Washer	2	13	Rubber Cushion	4
7	Wing Screw	2	14	Washer 10	2

ASSEMBLY DIAGRAM



Record Product's Serial Number Here: _____

Note: If product has no serial number, record month and year of purchase instead.

Note: Some parts are listed and shown for illustration purposes only, and are not available individually as replacement parts.

90 Day Warranty

Harbor Freight Tools Co. makes every effort to assure that its products meet high quality and durability standards, and warrants to the original purchaser that this product is free from defects in materials and workmanship for the period of 90 days from the date of purchase. This warranty does not apply to damage due directly or indirectly, to misuse, abuse, negligence or accidents, repairs or alterations outside our facilities, criminal activity, improper installation, normal wear and tear, or to lack of maintenance. We shall in no event be liable for death, injuries to persons or property, or for incidental, contingent, special or consequential damages arising from the use of our product. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation of exclusion may not apply to you. THIS WARRANTY IS EXPRESSLY IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING THE WARRANTIES OF MERCHANTABILITY AND FITNESS.

To take advantage of this warranty, the product or part must be returned to us with transportation charges prepaid. Proof of purchase date and an explanation of the complaint must accompany the merchandise. If our inspection verifies the defect, we will either repair or replace the product at our election or we may elect to refund the purchase price if we cannot readily and quickly provide you with a replacement. We will return repaired products at our expense, but if we determine there is no defect, or that the defect resulted from causes not within the scope of our warranty, then you must bear the cost of returning the product.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

3491 Mission Oaks Blvd. • PO Box 6009 • Camarillo, CA 93011 • 1-888-866-5797