

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.

24d

PITTSBURGH®

2000 LB. FOLDABLE ENGINE STAND

Item	59200
Weight Capacity	2,000 lb.
Assembled Dimensions	41-1/2" L x 31-1/4" W x 35" H
Face Plate	10" L x 6" W x 13/16" Thick
Wheel Diameter	3" (x4), 2.5" (x1)

Conforms with ASME PASE 2019



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

⚠WARNING

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

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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.

IMPORTANT SAFETY INFORMATION

Assembly Precautions

1. Assemble only according to these instructions. Improper assembly can create hazards.
2. Wear ANSI-approved safety goggles and heavy-duty work gloves during assembly.
3. Keep assembly area clean and well lit.
4. Keep bystanders out of the area during assembly.
5. Do not assemble when tired or when under the influence of drugs or medication.
6. Weight capacity and other product capabilities apply to properly and completely assembled product only.

Use Precautions

Failure to heed these instructions may result in personal injury and/or property damage:

1. Study, understand, and follow all instructions before operating this device.
2. Do not exceed rated capacity.
Be aware of dynamic loading!
Sudden load movement may briefly create excess load causing product failure.
3. Use Stand only on a flat, level, hard and smooth surface capable of supporting the weight of Stand and engine.
4. Lock mounting plate rotating mechanism before applying a load.
5. Assure load is centered and secured to mounting attachments.
6. Only use when Legs are fully extended outward and Eye Pins and R-Pins are in place.
7. Hold Handle while removing the Pin.
8. Wear ANSI-approved safety goggles and heavy-duty work gloves during use.
9. Do not use for aircraft purposes.
10. Inspect before every use; do not use if parts loose or damaged.
11. This product is not a toy. Do not allow children to play with or near this item.
12. Use as intended only.
13. Maintain product labels and nameplates. These carry important safety information. If unreadable or missing, contact Harbor Freight Tools for a replacement.

Assembly Instructions



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

1. Attach 3" Locking Casters (21) on the back of Base (2) using Bolts (20), Lock Washers (19), and Nuts (18). Insert Bolts from the bottom, through Casters first.

Note: Bolts are shipped in product tube.

2. Insert Bushing (23) into Center Wheel (27) and attach to front center of Base (2) using Bolt (22), Washer (25), and Nut (26).

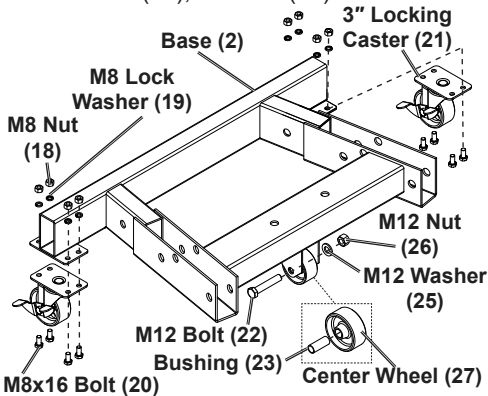


Figure A: Attach Casters to Base

3. Attach Right Leg (1) to Base using Leg Lock Pins (15). Insert Bushing (23) in 3" Front Wheel (24) and install on Right Leg using Bolt (22), Washer (25) and Nut (26). Repeat steps for Left Leg.

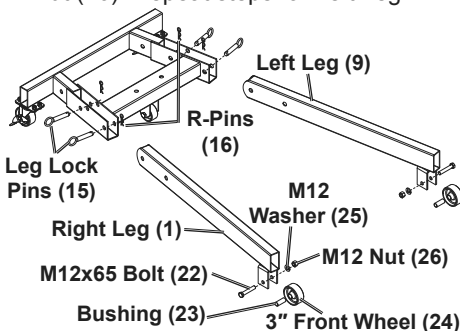


Figure B: Attach Legs

Note: There are five M14 diameter Bolts. The longer M14 bolt, part 13, attaches the top of two Support Straps (3) to both sides of Support Post (4).

4. Attach Support Post (4) to Base using Bolts (14), Washers (28) and Nuts (29).
5. Attach Support Strap (3) to Support Post with Bolt (13) and Washer (28). Then attach other Support Strap on other side of Support Post and secure with Nut (29). Attach bottom of Support Straps to Base using Bolts (17), Washers (28), and Nuts (29).

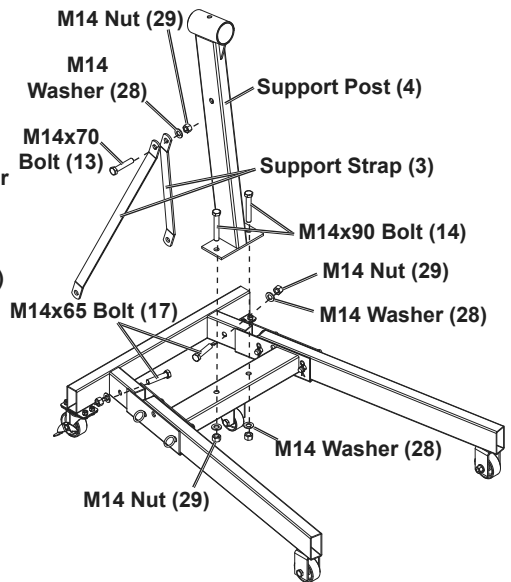


Figure C: Attach Post and Straps

6. Grease Mounting Plate (6) shaft using chassis grease (sold separately).
7. Insert Mounting Plate through the Support Post (4).
8. Slide off a Handle grip (31) from Handle (5). Insert Handle through hole on back of Mounting Plate and replace Handle grip.
9. To lock Mounting Plate rotation, align hole on Plate with hole on top of Support Post and insert Lock Pin (12).

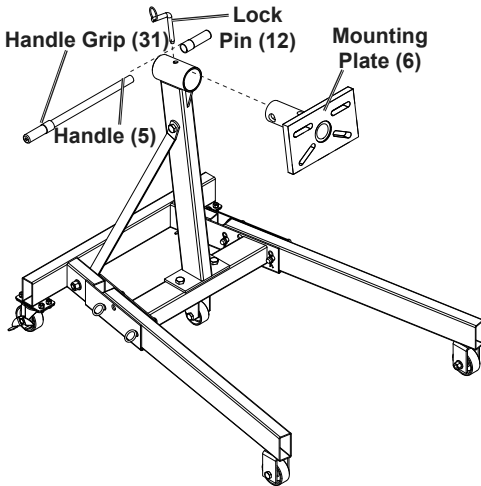


Figure D: Attach Mounting Plate

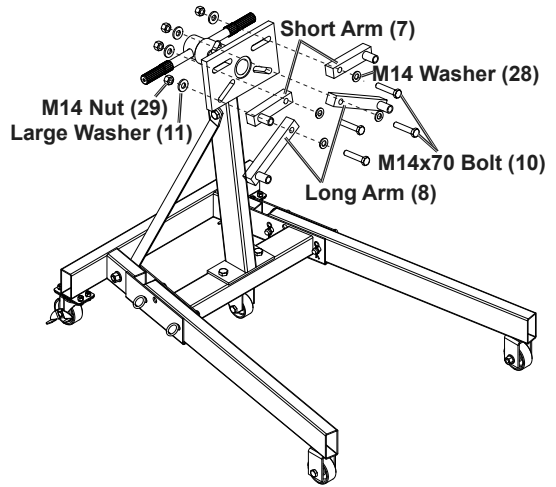


Figure E: Attach Mounting Arms

10. Attach Short Arms (7) to top slots on Mounting Plate with Bolts (10), Washers (28), Big Washers (11) and Nuts (29). Attach Long Arms (8) to bottom slots of Mounting Plate with Bolts (10), Washers (28), Large Washer (11) and Nuts (29).

Operating Instructions



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

Mounting Engine




TO PREVENT SERIOUS INJURY:
Before attaching an engine to the stand, confirm that its weight does not exceed the Stand maximum capacity.

1. Position Stand on a flat, level, hard and smooth surface capable of supporting the weight of Stand and engine. Lock Locking Swivel Casters.
2. Lock both Legs in lowered position with two Leg Lock Pins (15) per Leg secured in place with R-Pins (16).
3. Remove Lock Pin (12) from Support Post (4).
4. Determine the thread type and length of bolts (not included) needed to thread into the engine block. Use grade 8 bolts that are long enough to fit through the Arms and thread as deeply as possible into the engine block.
5. Align Short Arms (7) and Long Arms (8) with four mounting bolt locations on the engine.
6. Place bolts (not included) through the Mounting Plate (6) side and securely tighten them into the engine. The bolt heads must press against back of the Arms: if needed, use flat washers (not included) as spacers.
7. Tighten Bolts (10) and Nuts (29) that hold Mounting Arms to the Mounting Plate (6) securely.
8. Slowly lower the hoist/engine crane (sold separately) until all the engine's weight is held by the stand.
9. Safely release the engine from the hoist/engine crane.
10. Slowly rotate engine to desired angle and insert Lock Pin (12) on top of Support Post (4).

WARNING! TO PREVENT SERIOUS

INJURY: Use all four Arms when attaching an engine to the Stand.

Rotating Engine

 WARNING TO PREVENT SERIOUS INJURY: Be prepared for sudden engine movement before removing Pin. Stay clear of engine.

1. While holding onto Handle (5) and the engine to prevent it from accidental rotation, remove Lock Pin (12).
2. Use assistance to rotate engine to the desired angle and insert Lock Pin (12) into top of Support Post (4).

Removing Engine

1. With assistance, rotate the engine to its initial position.
2. Secure engine properly to the crane. Use crane to support all of the engine's weight directly overhead, but do not start lifting the engine stand.
3. Once the engine is properly supported by the crane, remove the bolts securing the Short Arms (7) and Long Arms (8) to the engine.

Maintenance and Servicing



Procedures not specifically explained in this manual must be performed only by a qualified technician.

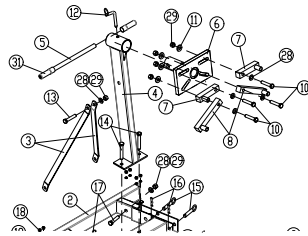
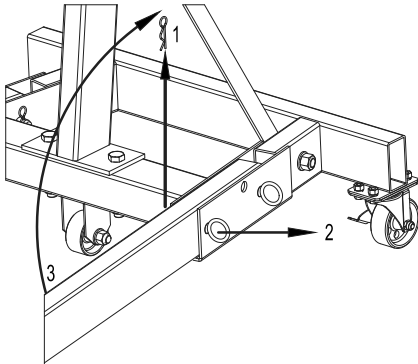
WARNING

TO PREVENT SERIOUS INJURY FROM STAND FAILURE:

Do not use damaged equipment. Make sure the stand is stable. If any unsafe conditions are found, take it to a qualified technician for service or repair.

1. **BEFORE EACH USE**, inspect the general condition of the Stand. Check it for cracks, bends in the metal, signs of unusual wear or any other condition that may affect its safe operation. If any are found, do not use the Stand.
2. Keep Engine Stand clean and free of dirt or grease.
3. Before each use, check that hardware is securely fastened.
4. Check that the Casters are clean, turn and lock properly.
5. **AFTER USE**, clean external surfaces of the stand with a clean, moist cloth.

Folding the Stand for Storage



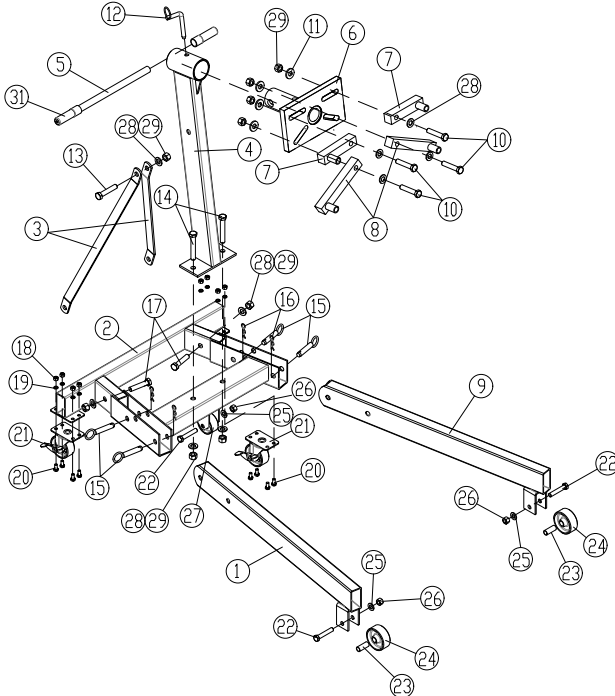
1. Remove forward R-Pin (16).
2. Remove Leg Lock Pin (15).
3. Fold up Leg (9).
4. Insert Leg Lock Pin (15) through upper hole in Base (2) so that it holds Leg in place. Lock it in place with R-Pin.
5. Repeat for other Leg.

WARNING! TO PREVENT SERIOUS INJURY: Do not use the Stand while it is folded. This is only for compact storage.

Parts List and Diagram

Part	Description	Qty
1	Right Leg	1
2	Base	1
3	Support Strap	2
4	Support Post	1
5	Handle	1
6	Mounting Plate	1
7	Short Arm	2
8	Long Arm	2
9	Left Leg	1
10	M14x70 Bolt	4
11	Ø15 Large Washer	4
12	Ø12 Lock Pin	1
13	M14x70 Bolt	1
14	M14x90 Bolt	2
15	Ø15x70 Leg Lock Pin	4

Part	Description	Qty
16	R-Pin	4
17	M14x65 Bolt	2
18	M8 Nut	8
19	M8 Lock Washer	8
20	M8x16 Bolt	8
21	3" Locking Castor	2
22	M12x65 Bolt	3
23	Bushing	3
24	3" Front Wheel	2
25	M12 Washer	3
26	M12 Nut	3
27	Center Wheel 2.5"	1
28	M14 Washer	9
29	M14 Nut	9
31	Handle Grip	2



Record 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. Specify UPC 19317545992 when ordering parts.

PLEASE READ THE FOLLOWING CAREFULLY

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Limited 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.

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