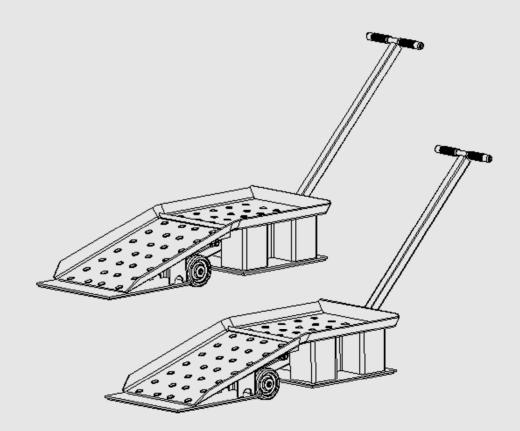


MAHLE CTR-20



Operation Manual Portable truck ramps



EVERY PERSON WHO OPERATES THIS EQUIPMENT NEEDS TO KNOW AND UNDERSTAND ALL OF THE INFORMATION IN THIS MANUAL – FAILURE TO DO SO COULD RESULT IN SERIOUS INJURY OR DEATH.

> READ THIS MANUAL CAREFULLY AND RETAIN FOR YOUR RECORDS

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1. Safety Regulations

1.1 Warnings

- ▲ Failure to follow all of these safety instructions can lead to severe injury or death from a sudden loss of the load. Contact the manufacturer at the numbers or address printed on the back cover of this manual if you have any questions.
- ▲ Anyone who operates this equipment must read and understand all the instructions and warnings provided with this product before being allowed to use it. All operators must be careful, competent, trained, and qualified in the safe operation of the ramps. The owner (or other responsible individual) must ensure that any operator observes the proper safety procedures for using this ramps at all times. If the operator does not read well or is not fluent in English, the owner / manager must read and review the instructions and warnings in the manual with the operator in the operator's native language to be sure that the operator will use the ramps properly.
- ▲ The owner / manager must keep this manual for future reference, and make sure the warning labels on the product are legible and intact at all times. Replacement labels and manuals are available from the manufacturer. Call the manufacturer using the contact information on the back cover of this manual if you have any questions.
- ▲ <u>Make sure the load does not exceed the maximum</u> <u>capacity of the ramps.</u> Maximum capacity for the ramps as a pair is 40,000 lbs. / 18,150 kg. Do not exceed rated capacity.
- ▲ <u>NEVER modify the product in any way</u>. No alterations shall be made to this product.
- ▲ <u>Always use ramps on a hard level surface, capable</u> of sustaining the load. Use on other than hard level surfaces can result in load instability and possible loss of load.
- ▲ These ramps have been designed solely for driving <u>a vehicle upon them only</u>, and must always be used as a matched pair to support one end of a vehicle.
- Δ <u>Center load between the sides of the ramp</u>.

- ▲ <u>NEVER use ramps to support both ends or one</u> <u>side of a vehicle</u>. This can result in load instability and possible loss of load.
- ▲ For use with maximum allowable tire tread width up to 15". When using these ramps on duals care must be taken to insure that the tire not on the ramp clears the ramp.
- ▲ **Do not use other lifting equipment in conjunction** with the ramps.
- ▲ <u>Do not disconnect</u> brakes, engine, transmission components, drive train, drive shaft, universal joints, or wheels while the vehicle is on the ramps.
- ▲ Be sure the wheels to be driven on the ramps are positioned straight forward in alignment with ramps, and center the two ramps against the tires.
- ▲ Another person, standing clear from the vehicle path, should observe and guide the vehicle operator ascending and descending the ramps.
- ▲ <u>Never accelerate or apply brakes suddenly</u>. Proceed slowly and cautiously. Once the vehicle reaches the top of the ramps, apply brakes only to prevent over travel.
- ▲ Place the vehicle in neutral. Release brakes; the vehicle should not move. Set emergency brake. Place the vehicle in park or in reverse gear for manual transmission. Chock wheels on the ground.
- ▲ Be sure that both tires are properly positioned on the ramp's support platform. Using caution in positioning your body clear of danger, shake vehicle sideways and endways to be sure that vehicle and ramps are stable. Check that ramps have not become damaged or bent during loading.
- ▲ Both rubber pads on each ramp should be in place to help reduce the possibility of the ramp moving or slipping during loading of the vehicle onto the ramp. If found to be damaged in any way, remove the ramps from service immediately.
- ▲ <u>Failure to understand and obey this warning may</u> result in personal injury or death.

2. Foreword

2.1 From the manufacturer

Thank you for your purchase. To complement the offering of A/C, fluid and nitrogen service equipment, MAHLE Service Solutions has partnered with Gray Manufacturing to provide the highest quality hydraulic and pneumatic equipment available for the professional service technician. This equipment adheres to high standards promised in the MAHLE guarantee including the assurance of innovation and reliability that comes with the Gray Manufacturing name. Please contact MAHLE Service Solutions' customer service at (800) tech.mss@us.mahle.com 468-2321 or with any comments or questions.

3. Symbols Use

3.1 Signal words

Signal words call attention to a safety message or messages, or a property damage message or messages, and designate a degree or level of hazard seriousness. Signal words used in this manual include:

Keyword	Probability of occurrence	Severity of danger if instructions not observed
DANGER	Immediate impending danger	Death or severe injury.
WARNING	Possible impending danger	Death or severe injury
CAUTION	Possible dangerous situation	Minor injury
NOTICE	Possible damage to property	Possible property damage

4. Responsibilities

4.1 Receiving inspection

Before attempting to operate this equipment, thoroughly read and understand this manual. Completely remove all tape and packaging. Inspect the equipment immediately upon delivery. If shipping damage is evident, inform the delivering carrier immediately and contact the manufacturer using the contact information on the back cover of this manual.

4.2 Owner and/or operator responsibilities

The owner and / or user must have an understanding of the manufacturer's operating instructions and warnings before using the ramps. Personnel involved in the use and operation of equipment shall be careful, competent, trained, and qualified in the safe operation of the equipment and its proper use when servicing motor vehicles and their components. Warning information should be emphasized and understood.

The owner / manager must make this manual available to all personnel using the ramps at your direction. They must read and understand the contents of this manual. If the operator is not fluent in English, the manufacturer's instructions and warnings shall be read to and discussed with the operator in the operator's native language by the purchaser / owner, making sure that the operator comprehends its contents and observes the proper procedures for use of these ramps.

Owner and / or user must study and maintain for future reference the manufacturer's instructions. Owner and / or user are responsible for keeping all warning labels and instruction manuals legible and intact. Replacement labels and literature are available from the manufacturer.

5. Specifications

5.1 CTR-20

Model CTR-20	US units	Metric units
Maximum capacity (per ramp)	20,000 lb	9,075 kg
Maximum capacity (pair)	40,000 lb	18,150 kg
Height	9.25 in	23.5 cm
Width	18.5 in	47.0 cm
Length	50.25 in	127.6 cm
Approximate weight (pair)	340 lb	154.5 kg

6. Product Description

6.1 Component identification

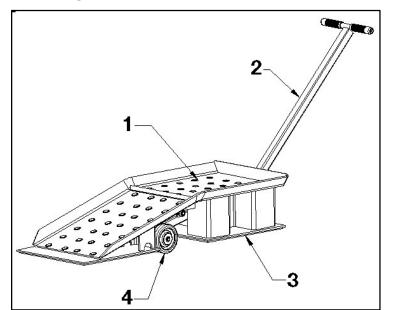


Fig. 1: CTR-20 side view

- 1 Support platform
- 2 Handle
- 3 Rubber pads
- 4 Wheels

7. Operation

▲ Do not disconnect brakes, engine, transmission components, drive train, drive shaft, universal joints, or wheels while the vehicle is on the ramps. Failure to heed this warning may result in personal and / or property damage.

7.1 Driving onto ramps

- 1. The ramps should be centered in front of each tire.
- 2. The handle should be lowered and pushed inside the bottom of the ramp prior to driving the vehicle upon the ramp.
- ▲ Be sure the wheels to be driven on to the ramps are positioned straightforward in alignment with the center of the ramps.
- 3. Another person, standing clear from the vehicle path, should observe and guide the vehicle operator when ascending and descending the ramps.
- ▲ Never accelerate or apply the brakes suddenly. Proceed slowly and cautiously.
- 4. Once the vehicle reaches the top of the ramps, apply the brakes only to prevent over travel.

7.2 Prepare the vehicle

- 1. Place the vehicle in neutral.
- 2. Release the brakes; the vehicle should not move.
- 3. Set the emergency brake.
- 4. Place the vehicle in park or in reverse gear for manual transmissions.
- 5. Chock the wheels on the ground.
- \triangle Be sure that both tires are properly positioned on the ramp's support platform.
- ▲ Using caution in positioning your body clear of danger, shake the vehicle sideways and endways to be sure the vehicle and the ramps are stable.
- 6. Check that the ramps have not become damaged or bent during loading.

8. Maintenance and Inspection

A WARNING - The owner must inspect, or appoint a knowledgeable person to inspect the ramps for signs of corrosion and / or excessive wear. Visual inspection should be made before each use of ramps, checking abnormal conditions. Regular for inspections should be made weekly for daily use and monthly for intermittent use. Each ramp must be inspected immediately if subjected to an abnormal load or shock. Any ramp which appears to be damaged in any way, is found to be badly worn, or operates abnormally shall be removed from service until necessary repairs are made. Contact the manufacturer using the contact information printed on the back cover of this manual.

8.1 Structural inspection

Equipment must be removed from service and inspected for damage immediately if subjected to an abnormal shock or load. Failure to heed this warning may result in personal injury and / or property damage.

- ▲ To prevent serious injury or death from a falling vehicle, all inspection and maintenance procedures must be performed **after** the ramp has been removed from service. Position the ramps so you have clear access to all sides for inspection and service.
- Inspect the ramps for any damage and deformation prior to use. Visually inspect the welds.
- ▲ If any irregularities or problems are detected during an inspection, the ramp must be removed from service immediately and repaired. Contact the manufacturer using the contact information on the back cover of this manual.

8.2 Maintenance instructions

- ▲ WARNING All inspection and maintenance procedures must be performed after the ramps have been removed from service. Failure to do this may result in personal injury and/or property damage.
- All warning and capacity labels should be readable and complete. Wash external surfaces of ramp, labels, and decals with a mild soap solution. Contact the manufacturer for replacement labels as needed.
- Lubricate all rotating and sliding portions of the ramps monthly.

9. Maintenance Chart

Action	Date	Details	Person responsible
Receiving inspection			

10. Notes



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