

Users' Manual



Model 108-D Stretcher

Disclaimer

This manual contains general instructions for the use, operation and care of this product. The instructions are not all-inclusive. Safe and proper use of this product is solely at the discretion of the user. Safety information is included as a service to the user. All other safety measures taken by the user should be within and under consideration of applicable regulations. It is recommended that training on the proper use of this product be provided before using this product in an actual situation.

Retain this manual for future reference. Include it with the product in the event of transfer to new users. Additional free copies are available upon request from Customer Relations.

Proprietary Notice

The information disclosed in this manual is the property of Ferno-Washington, Inc., Wilmington, Ohio, USA. Ferno-Washington, Inc. reserves all patent rights, proprietary design rights, manufacturing rights, reproduction use rights, and sales use rights thereto, and to any article disclosed therein except to the extent those rights are expressly granted to others or where not applicable to vendor proprietary parts.

© Copyright Ferno-Washington, Inc. All Rights Reserved.

Ferno-Washington, Inc. 70 Weil Way Wilmington, OH 45177-9371 U.S.A.

Telephone (U.S.A. and Canada)	1.800.733.3766
Telephone (Worldwide)	+1.937.382.1451
Fax (United States)	1.937.382.1191
Fax (Outside U.S.A.)	+1.937.382.6569
Internet	www.ferno.com

TABLE OF CONTENTS

Section Page	Section Page
1 - Safety Information4	4.5 Using the Stretcher With a Patient10
1.1 Warning4	4.6 Attaching the Stretcher to an Ambulance Cot 10
1.2 Important4	4.7 Using Additional Help11
1.3 Bloodborne Disease Notice4	5 - Maintenance 12-13
2 - Operator Skills and Training4	5.1 Maintenance Schedule
2.1 Skills4	5.2 Decontaminating the Stretcher 12
2.2 Training4	5.3 Disinfecting & Cleaning
3 - About the Stretcher 5-6	the Stretcher and Restraints
3.1 Stretcher Description5	5.4 Inspecting the Stretcher
3.2 General Specifications5	5.5 Lubricating the Stretcher
3.3 Stretcher Components6	6 - Repair Parts and Service 13
4 - Using the Stretcher 7-11	7 - Limited Warranty 14
4.1 Before Placing the Stretcher in Service7	8 - Ferno Customer Relations 14
4.2 General Guidelines for Use7	Training Record15
4.3 Unfolding the Stretcher for Use8	Maintenance Record 15
4.4 Folding the Stretcher for Storage9	

ILLUSTRATIONS AND DIAGRAMS

Components 6	Figure 6 - Folding the Stretcher
Figure 1 - Unfolding the Stretcher	Figure 7 - Securing the Patient
Figure 2 - Opening the Stretcher	Using Additional Help11
Figure 3 - Engaging the Spreader Bars	Maintenance Table
Figure 4 - Disengaging the Spreader Bars	Serial Number Location
Figure 5 - Closing the Stretcher 9	

1 - SAFETY INFORMATION

1.1 Warning

The following warnings appear in this manual.

A WARNING

Untrained operators can cause injury or be injured. Permit only trained personnel to operate the stretcher.

Improper use of the stretcher can cause injury. Use the stretcher only for the purpose described in this manual.

An unattended patient can be injured. Stay with the patient at all times.

An unrestrained patient can fall off the stretcher and be injured. Use restraints to secure the patient on the stretcher.

Improper attachment to a cot can cause injury. Follow the attachment instructions in the 35-L users' manual. Always check to make sure the stretcher is securely attached to the cot.

Helpers can cause injury or be injured. Maintain control of the stretcher and direct all helpers.

Improper maintenance can cause injury. Maintain the stretcher only as described in this manual.

A WARNING

Improper parts and service can cause injury. Use only Ferno parts and Ferno-approved service on the stretcher.

Modifying the stretcher can cause injury and damage. Use the stretcher only as designed by Ferno.

1.2 Important

Boxes like this emphasize important information.

Important

The hinges can catch and tear the mesh bed surface. When folding the stretcher, adjust the bed surface to ensure it will not catch on the hinges.

1.3 Bloodborne Disease Notice

To reduce the risk of exposure to bloodborne diseases such as HIV-1 and hepatitis when using the stretcher, follow the disinfecting and cleaning instructions in this manual.

2 - OPERATOR SKILLS AND TRAINING

2.1 Skills

Operators using the stretcher need:

- a working knowledge of emergency patient-handling procedures.
- ☐ the ability to assist the patient.
- ☐ a complete understanding of the procedures described in this manual.

2.2 Training

Trainees need to:

☐ follow a training program designed by their training officer.

- □ read this manual. For additional free users' manuals, contact Ferno Customer Relations (page 14).
- practice with the stretcher before using it in regular service.
- □ be tested on their understanding of the stretcher.
- □ record their training information. A form is provided on page 15.

A WARNING

Untrained operators can cause injury or be injured. Permit only trained personnel to operate the stretcher.

3 - ABOUT THE STRETCHER

3.1 Stretcher Description

The Ferno® Model 108-D Stretcher (referred to as the stretcher in this manual) is an emergency patient-handling device designed to transport a patient.

The stretcher is primarily carried by hand but can also be attached to a Ferno® Model 35-L Litter Carrier for wheeled transport or transport in an ambulance.

The stretcher is for professional use by two trained operators. Additional helpers may be necessary when transporting heavy patients. Stretcher features include:

OVERALL FEATURES

- Folds lengthwise and crosswise for compact storage
- Spreader bars and legs

POLES

- Heavy-duty aluminum poles
- 4 Handle grips

BED SURFACE

- Bed surface is constructed with polypropylene mesh material and is:
 - Fire-retardant and meets California State Fire Marshal standards
 - Chemical resistant
 - UV-stabilized to resist deterioration from exposure to sunlight

RESTRAINTS

• Two polypropylene restraints with quick-release buckles sewn onto bed surface

A WARNING

Improper use of the stretcher can cause injury. Use the stretcher only for the purpose described in this manual.

3.2 General Specifications

In use	90" x 22" x 6" (229 x 55 x 15 cm)
Storage	45" x 9" x 4" (114 x 23 x 11 cm)
Load Limit	350 lb (159 kg)
Weight	13 lb (6 kg)

General specifications are rounded to the nearest whole number. Metric conversions are calculated before rounding the English measurements. For more information, contact Ferno Customer Relations (page 14) or your Ferno distributor.

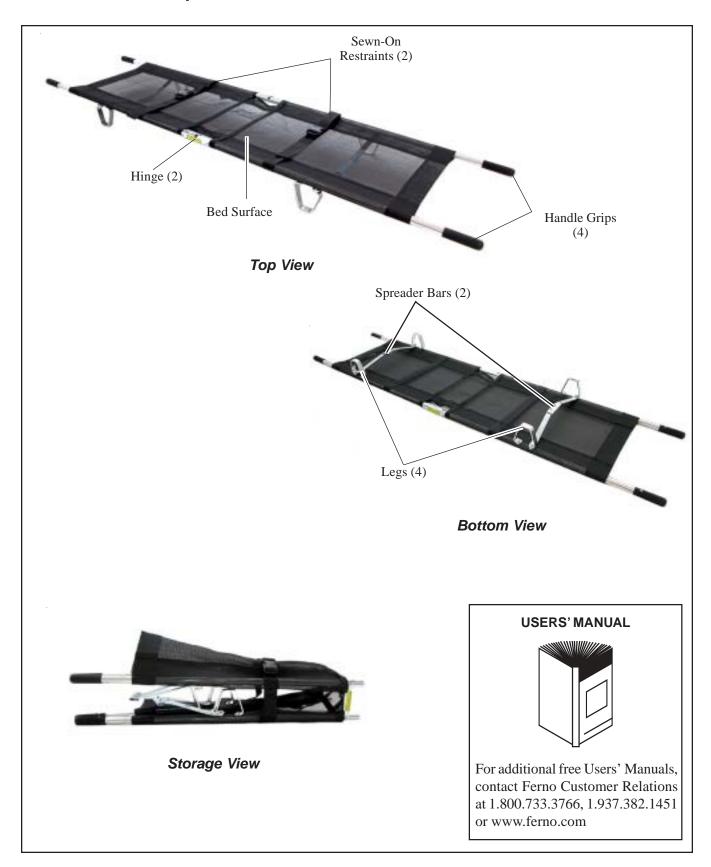
Ferno reserves the right to change specifications without notice.

LOAD LIMIT



Inspect the stretcher if the load limit has been exceeded (*See Inspect-ing the Stretcher*, page 13).

3.3 Stretcher Components



4 - USING THE STRETCHER

4.1 Before Placing the Stretcher in Service

- Q Personnel who will work with the stretcher need to read this manual.
- Q Confirm that the stretcher operates properly. Follow the instructions in *Inspecting the Stretcher*, page 13.

4.2 General Guidelines for Use

- Using the stretcher requires a minimum of two trained operators.
- Operators may need help when working with heavy patients. For information about placement and direction of helpers, see *Using Additional Help*, page 11.
- Follow standard emergency patient-handling procedures when operating the stretcher.
- Stay with the patient at all times.
- Always use patient restraints.

A WARNING

An unattended patient can be injured. Stay with the patient at all times.

A WARNING

An unrestrained patient can fall off the stretcher and be injured. Use restraints to secure the patient on the stretcher.

4.3 Unfolding the Stretcher for Use

To prepare the stretcher for use:

- 1. Stand the stretcher upright, with the handles on the floor or ground and with the stretcher legs facing the sides.
- 2. Unbuckle the restraints.
- 3. Unfold the stretcher by grasping the pairs of poles and pulling them away from each other (Figure 1).
- 4. Lay the stretcher with its bottom surface facing up (so the legs are visible).
- 5. Open the stretcher by grasping both sides of the stretcher and pulling the poles apart (Figure 2).
- 6. Use your foot to push each pair of spreader bars toward the center of the stretcher (Figure 3) until the spreader bars lock in the engaged position.



Figure 1 - Unfolding the Stretcher



Figure 2 - Opening the Stretcher

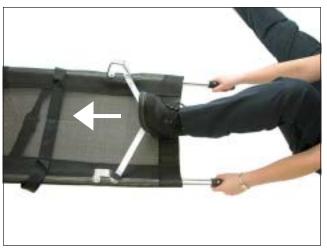


Figure 3 - Engaging the Spreader Bars

4.4 Folding the Stretcher for Storage

To fold the stretcher for storage:

- 1. Lay the stretcher with its bottom surface facing up.
- 2. Disengage the spreader bars by using your foot to push the spreader bars away from the center of the stretcher (Figure 4).
- 3. Close the stretcher by pulling the poles together (Figure 5).

Note: The stretcher hinges can catch and tear the mesh bed surface. Before folding the stretcher, check and make sure the mesh surface will not be caught when the stretcher is folded.

Important

The hinges can catch and tear the mesh bed surface. When folding the stretcher, adjust the bed surface to ensure it will not catch on the hinges.

- 4. Lift the stretcher at its center and fold the pairs of poles until the handle grips meet (Figure 6).
- 5. Wrap the restraints around the stretcher and fasten them to secure the stretcher in the storage position.

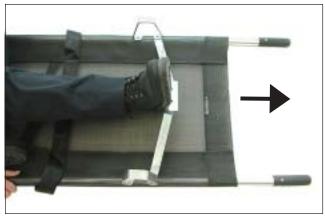


Figure 4 - Disengaging the Spreader Bars



Figure 5 - Closing the Stretcher

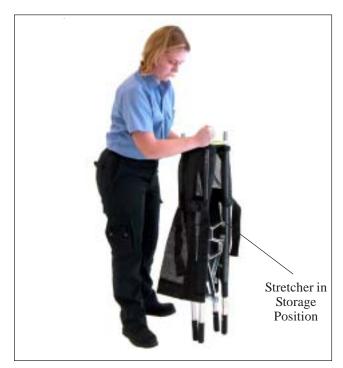


Figure 6 - Folding the Stretcher

4.5 Using the Stretcher With a Patient

Unfold and open the stretcher, following the instructions on page 8. Then:

- 1. Position the stretcher as close to the patient as possible.
- 2. Unfasten the two patient restraints and position the straps so they will not interfere with transferring the patient onto the stretcher.
- 3. Transfer the patient onto the stretcher according to approved medical procedures and following your local protocols.
- 4. Fasten and adjust the patient restraints (Figure 7).
- 5. Use additional help as needed to lift and carry heavy patients (See *Using Additional Help*, page 11). Additional restraints may be desired for some situations or patients. Follow your protocols for using and attaching additional restraints.



Figure 7 - Securing the Patient

4.6 Attaching the Stretcher to an Ambulance Cot

The stretcher can be attached to a Ferno® Model 35-L Litter Carrier.

See the Model 35-L users' manual for instructions on attaching the stretcher to the carrier.

A WARNING

Improper attachment to a cot can cause injury. Follow the attachment instructions in the 35-L users' manual. Always check to make sure the stretcher is securely attached to the cot.

4.7 Using Additional Help

Using the stretcher requires two operators. They may need additional help when working with heavy patients.

Operators should maintain control of the stretcher and direct all helpers. The diagram shows suggested placement for operators and helpers.

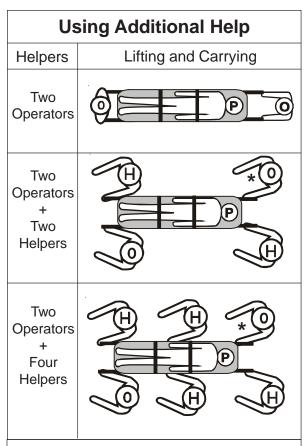
A WARNING

Helpers can cause injury or be injured. Maintain control of the stretcher and direct all helpers.

LOAD LIMIT



Inspect the stretcher if the load limit has been exceeded (*See Inspect-ing the Stretcher*, page 13).



* Note: When a squad of four or more operators is present, the senior medical person stands at the head end on the patient's right side and issues lifting and carrying commands.

5 - MAINTENANCE

5.1 Maintenance Schedule

The stretcher requires regular maintenance. Set up and follow a maintenance schedule. A form is provided on page 15. The following table represents minimum maintenance.

	Each Use	As Needed	Each Month
Decontaminating (this page)		•	
Disinfecting (this page)	•		
Cleaning (this page)		•	
Inspecting (page 13)		•	•
Lubricating (page 13)		•	

When using maintenance products, follow the manufacturers' directions and read the manufacturers' material safety data sheets.

In the U.S.A., contact Ferno Customer Relations to order Ferno disinfectants and cleaners (page 14).

A WARNING

Improper maintenance can cause injury. Maintain the stretcher only as described in this manual.

5.2 Decontaminating the Stretcher

The stretcher is suitable for power-washing. When decontaminating the stretcher, follow the instructions for decontamination equipment and cleaners, and read the manufacturers' material safety data sheets. Contain and dispose of contaminants according to government guidelines.

Lubricate the stretcher (See *Lubricating the Stretcher*, page 13) after decontaminating it.

Important

Using abrasive cleaning compounds or applicators on the stretcher frame can cause damage. Use only nonabrasive materials to clean the stretcher.

5.3 Disinfecting and Cleaning the Stretcher and Restraints

DISINFECTING THE STRETCHER

Wipe all surfaces with disinfectant. Follow disinfectant manufacturer's directions. Ferno recommends inspecting the stretcher for damage as you disinfect it.

CLEANING THE STRETCHER

Clean all surfaces of the stretcher with warm water and a mild detergent. Use a stiff-bristled brush (but not a metal-bristle brush) to remove stains if necessary. Rinse the stretcher with warm water. Dry the stretcher with a towel or allow it to air dry.

PLASTIC BUCKLE RESTRAINTS

The plastic buckle restraints are permanently attached to the stretcher. Clean and disinfect the restraints following the instructions above. If additional restraints are used with the stretcher, clean and disinfect them according to the restraint manufacturer's instructions.

5.4 Inspecting the Stretcher

Have your equipment maintenance personnel follow the instructions in *Using the Stretcher*, pages 7-11, and check the following:

- ☐ Are all components present?
- ☐ Are all drive screws and stainless steel rivets securely in place?
- ☐ Do all moving parts operate smoothly and properly?
- ☐ Do the stretcher hinges require lubricant?
- \Box Is the stretcher free of excessive wear?

- ☐ Is restraint webbing in good condition with no cuts or frayed edges?
- ☐ Are restraint buckles free of visible damage and do they operate properly?

If inspection shows damage or excessive wear, remove the stretcher from service until repair is made (see *Repair Parts and Service*, below).

5.5 Lubricating the Stretcher

As needed, apply lubricant to the stretcher hinges and center of spreader bars using a lubricant like WRL-191 or WD-40.

6 - REPAIR PARTS AND SERVICE

6.1 Parts and Service - U.S.A. and Canada

To order parts or for professional stretcher repair, contact EMSAR®: the only agent authorized by Ferno to manage, service, and repair Ferno products. EMSAR factory-trained technicians use Ferno-approved parts and repair procedures. EMSAR has a franchise location serving you. For details, phone, fax, or visit EMSAR's web site.

800.73EMSAR (Phone) 937.383.1051 (Fax) www.EMSAR.com (Internet)

6.2 Parts and Service - Outside U.S.A. and Canada

To order Ferno parts and for professional stretcher repair, contact your Ferno distributor. Your distributor is the only agent authorized by Ferno to manage, service, and repair Ferno products.

6.3 Parts List

Description	Part #
Black mesh (decon) bed surface	031-3944
Handle grips (set of 4)	090-0210
384-D storage case (90", org)	031-1610
Black end caps (set/4)	



A WARNING

Improper parts and service can cause injury. Use only Ferno parts and Ferno-approved service on the stretcher.

WARNING

Modifying the stretcher can cause injury and damage. Use the stretcher only as designed by Ferno.

7 - LIMITED WARRANTY

Limited Warranty Summary

Ferno-Washington, Inc. (Ferno), warrants the products we manufacture to be free from defects in material and workmanship for one year except as follows:

- (A) External finishes (gelcoat, decals, paint, etc.) are warranted for 90 days.
- (B) Soft goods (webbing, vinyl, fabric, foam, etc.) are warranted for 90 days.

This limited warranty applies when you use and care for the product properly. If the product is not used and cared for properly, the warranty is void. The warranty period begins the day the product is shipped from Ferno or the day you receive it if you have proof of the delivery date. Shipping charges are not covered by the limited warranty. We are not liable for shipping damages or damages sustained through using the product.

Limited Warranty Obligation

If a product or part is proven to be defective, Ferno will repair or replace it. At our option, we will refund the product's purchase price. The purchaser accepts these terms in lieu of all damages.

This is a summary of the limited warranty. The actual terms and conditions of the limited warranty, and the limitations of liability and disclaimers, are available upon request by calling 1.800.733.3766 or 1.937.382.1451.

8 - FERNO CUSTOMER RELATIONS

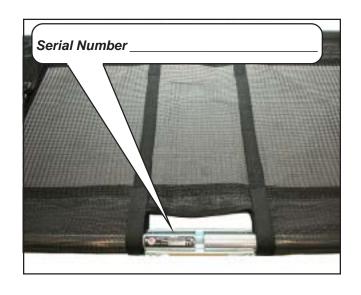
Customer service and product support are important aspects of each Ferno product.

In the U.S.A. and Canada, for assistance with the stretcher please contact Ferno Customer Relations:

Telephone	1.800.733.3766
Telephone	
Fax	
Internet	www.ferno.com

Outside the U.S.A. and Canada, for assistance with the stretcher please contact your Ferno distributor, or Ferno Customer Relations below:

Telephone (Worldwide)	+1.937.382.1451
Fax (Outside U.S.A.)	+1.937.382.6569
Internet	www.ferno.com



Please have the serial number of your Ferno stretcher available when calling Ferno Customer Relations, and include it in all written communications.

TRAINING RECORD

Date	Name	Training Method

MAINTENANCE RECORD

Date	Maintenance Performed	Ву