# **BUCKINGHAM MFG.**

## Replacement Instructions - Arborist Saddle Suspension Bridge

Warning: Do not use this product if you cannot understand and follow the instructions and warnings that come with it and complete all necessary functions.

Please consult with your physician prior to using this product. Do not use this product under the influence of drugs or alcohol.

NOTE: These instructions are intended for use with replacement Suspension Bridges for Buckingham Arborist Saddles equipped with climbing plates. Use only Buckingham approved replacement Suspension Bridges on Buckingham Arborist Saddles.

Buckingham Mfg. replacement Suspension Bridge Ropes are supplied with one termination knot tied at one end and minimum tail length indicators, as shown below.

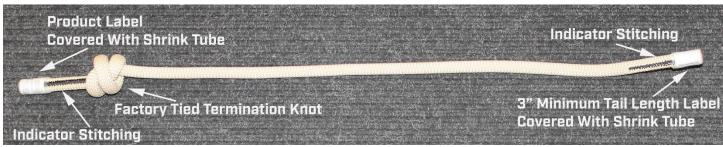
Buckingham uses two types of minimum tail indicators, either:

- 3" stitch patterns at each end of the bridge, with a minimum required tail length label at one end and a product identification label at the other (Fig. 1a & 23a).
- The alternate type is void of the stitch pattern and includes minimum required tail length labels at each end and a product identification label at the other (Fig. 1b, 1c & 23b). Note: dual rope bridges (Fig. 1c & 23c are labeled on a one rope only.

For purpose of clarity, labels and indicator stitches are not shown throughout this document. Additionally, rope color and length may vary from that shown.

Unassembled suspension bridge ropes as supplied are shown in Fig. 1a, 1b and 1C:

Fig. 1a – PN W6-40 & WE7R, Style



Ensure there is a minimum of three inches of tail exiting the termination knot when the knots are completed. The entire stitch indicator must be visible.

Fig. 1b - PN WE6R, WE10R & WE11R Style



Ensure there is a minimum of three inches of tail exiting the termination knot when the knots are completed. Both of the entire labels must be visible.



Ensure there is a minimum of three inches of tail exiting the termination knots when the knots are completed. Both of the entire labels must be visible.

ArboristSaddleBridgeReplacementInst.doc PN230434 Rev. 5/22/24

## Removing the Suspension Bridge:

- Untie the 'Termination Knot(s)' from one end of the Suspension Bridge (Fig. 2a & 2b) or cut the bridge at the center.
- Pull the 'Suspension Bridge' from the climbing plates (Fig. 3).
- 3) Discard the old 'Suspension Bridge'. Note: Retain the "Suspension Bridge Climbing Ring', if included, for reuse.







Fig. 2a

Fig. 2b

Fig. 3

### Attaching the Single Rope Replacement Suspension Bridge:

- Inspect Climbing Plates and Climbing Ring for reuse before replacing the Suspension Bridge. The inspection should include, but not be limited to:
  - Visually and by touch, inspect to ensure there are no cracks, distortion, corrosion, scratches, gouges, sharp edges or rough areas that may abrade the Suspension Bridge or have an adverse effect on the component integrity. Fig. 4
- Ensure there are no twists in the Suspension Bridge Adjustment Straps or Leg Pad Attachment Straps of the saddle attached to the Climbing Plates.
- 3) Insert the free end of the new Suspension Bridge through the center hole of one Climbing Plate from the outside edge and then pull it through until the knot is flush with the plate (Fig. 4).
- Next, insert the free end of the Suspension Bridge through Climbing Ring (Fig. 5).
- 5) Then, insert the free end of the new Suspension Bridge through the center hole of the opposite Climbing Plate from the inside edge and pull it through until you have sufficient slack to tie the Termination Knot.
- 6) Tie the Termination Knot in the Suspension Bridge, by first wrapping the working end towards the long side of the rope (Fig. 6).
- 7) Next, wrap the working end twice to form a round turn around the standing part of rope (Fig. 7).
- 8) Then insert the working end back through the two crossed round turns (Fig. 8).
- 9) Once the Termination Knot is tied, dress and set the knot (Fig. 9).
- 10) Pull the knot tight until all slack is removed from the two turns.
- 11) Finally, inspect the factory tied Termination Knot to ensure it is properly dressed, set and all slack is removed. If unsure, untie the Termination Knot and re-tie as stated above.



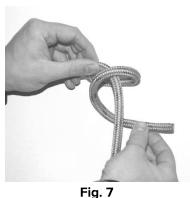






Fig. 5

Fig. 9

## Attaching the Double Rope Replacement Suspension Bridge:

For use on saddles equipped with climbing plates that have the elongated center slot / hole designed to accept the doubled rope suspension bridge.

- 1) Inspect Climbing Plates and Climbing Ring for reuse before replacing the Suspension Bridge. The inspection should include, but not be limited to:
  - Visually and by touch, inspect to ensure there are no cracks, distortion, corrosion, scratches, gouges, sharp edges, or rough areas that may abrade the Suspension Bridge or have an adverse effect on the component integrity.

    Fig. 10
- 2) Ensure there are no twists in the Suspension Bridge Adjustment Straps or Leg Pad Attachment Straps of the saddle attached to the Climbing Plates.
- 3) Insert both free ends of the new Double Rope Suspension Bridge through the center slot / hole of one Climbing Plate from the outside edge and then pull it through until the knot is flush with the plate (Fig. 10).
- 4) Next, insert the free end of the Suspension Bridge through Climbing Ring (Fig. 11).
- 5) Then, insert the free ends of the new Suspension Bridge through the center slot / hole of the opposite Climbing Plate from the inside edge and pull it through until you have sufficient slack to tie the Termination Knots.
- 6) Tie the Termination Knots in the Suspension Bridge, by first wrapping the working end over the opposite side and towards the doubled portion of the rope (Fig. 12).
- 7) Next, wrap the working end twice to form a round turn around the standing part of the opposite side of the rope (Fig. 13).
- 8) Then insert the working end back through the two crossed round turns (Fig. 14).
- 9) Once the Termination Knot is tied, dress and set the knot (Fig. 15).
- 10) Pull the knot tight until all slack is removed from the two turns.
- 11) Repeat steps 6 10 (using Fig. 16 19)
- 12) Finally, inspect the factory tied Termination Knot to ensure it is properly dressed, set and all slack is removed. If unsure, untie the Termination Knot and re-tie as stated above.

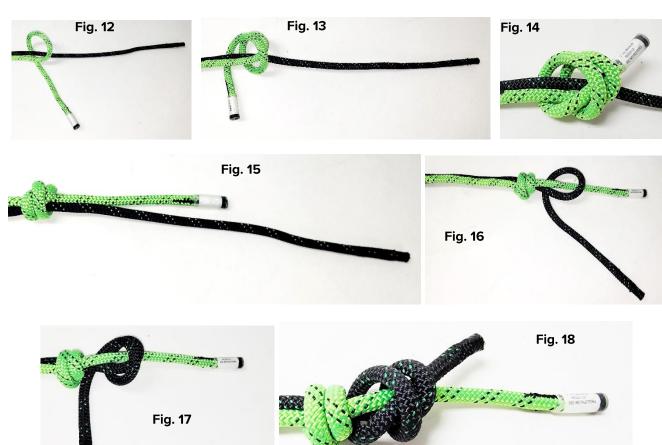


Fig. 11



## Warning:

- Make sure to cross turns and not have them parallel as shown in the incorrectly tied Termination Knot of Fig. 20. Reference Fig. 21 22 to view a correctly tied Termination Knot(s).
- Ensure the Suspension Bridge has the required three-inch minimum tail exiting the Termination Knot(s) to prevent accidental slippage. This can be determined by visually inspecting that the Indicators are completely on the outside of the knot (Fig. 23a, 23b and 23c).







Fig. 20

Fig. 21

Fig. 22

A completed and correctly tied Single Rope Suspension Bridge is shown in Fig. 23a and 23b. A completed and correctly tied Double Rope Suspension Bridge is shown in Fig. 23c.







Fig. 23b



If any evidence of wear or deterioration of your equipment is observed during this change out, immediately cease use, destroy the product and replace it with new equipment. Should any unusual conditions be observed, or you have reasonable doubt about a particular condition, remove the equipment from service and notify your Supervisor, Safety Director or contact Buckingham Mfg. (1-800-937-2825) for clarification.

Failure to carefully and completely inspect your equipment could result in serious injury or death.

#### CLEANING, STORAGE and TRANSPORTATION

Proper maintenance, storage and transportation of your equipment will prolong its useful life and contribute toward its performance. Nylon and polyester should be cleaned and disinfected with water and mild soap and be allowed to air dry thoroughly without using excessive heat. Your equipment should be stored and transported so that it does not come into contact with moisture, ultra violet rays, extreme temperatures, or chemical agents. Warnings pertaining to cleaning, storage and transportation should be strictly adhered to.

#### STATEMENT of OBSOLESCENCE:

Precise "useful life expectancy" or "shelf life" for this product is not specified, as the degree of use, conditions of use, and the degree of care and storage determines useful life. All users maintain responsibility to select proper equipment for the job, be properly trained in its use, and ensure all personnel support equipment passes inspection before each use. Upon evidence of defects, damage or deterioration, all equipment shall be removed from service immediately and tagged or marked as unusable or destroyed. Additionally, all equipment shall be inspected on a regular basis not to exceed one year by a Competent Person, as defined by OSHA/ANSI, to verify that the equipment is safe for use. In the event of any question or concern regarding the condition of such equipment, users shall remove the equipment from service for further inspection. All users must comply with OSHA/ANSI/ASTM standards prior to and in using such equipment. For more information regarding safe and appropriate use of equipment, please contact Buckingham Manufacturing at 1-800-937-2825.

#### **INTERNATIONAL USERS:**

Notwithstanding the above, please know that certain international jurisdictions require manufacturers of equipment to provide customers with a maximum useful lifespan (sometimes referred to as a "Statement of Obsolescence"). To the extent required, Buckingham personal protective equipment manufactured from synthetic fiber materials including but not limited to items such as webbing and/or rope are subject to a maximum useful lifespan of ten (10) years from the date of manufacture. As stated above proper usage, storage, maintenance, and care impacts the useful lifespan of equipment. Extreme circumstances may require that product must be retired after only one use. This statement is made in conformance and compliance with BS EN 365:2004. International users must ensure that product inspections are completed by Competent Persons as defined by international standards including but not limited to British Standard ("BS"). If equipment fails any inspections, it must be immediately withdrawn from service and destroyed. For more information regarding safe and appropriate use of equipment, please contact Buckingham Manufacturing at 1-800-937-2825.

#### **OUR GUARANTEE:**

We guarantee the equipment we manufacture to be free from defects in material and workmanship. We will repair any equipment deemed to be defective which is returned to us by the original purchaser. However, this guarantee is void if any product is changed or altered in any way, or if the product is used in a manner other than for which it is intended. This express guarantee supersedes all other expressed or implied guarantees, obligations or liabilities. There are no implied warranties of merchantability or fitness for a particular purpose and as such, all implied warranties are specifically disclaimed.

#### LIMITATION ON LIABILITY:

In no event will Buckingham or buyer be liable to the other for lost revenues, lost profits or any other indirect, consequential, special or punitive losses or damages, however caused, whether in action for breach of contract, strict liability, tort, or otherwise, even if advised of the possibility of such losses or damages. In no event will Buckingham's liability exceed the total amount paid by the buyer to Buckingham for the product or equipment giving rise to such claim(s).

Please see other terms and conditions relating to this product at https://buckinghammfg.com/terms-conditions/

#### **REGISTRATION:**

Before use of the product, ensure to register and confirm the product at www.buckinghammfg.com/register.

**BUCKINGHAM MFG.** 

BINGHAMTON, NY 1-800-937-2825 e-mail - sales@buckinghammfg.com

Information contained in these written instructions supersedes all other information (written, audio, video etc.) produced by Buckingham Mfg. prior to the revision date of this document.