

## Changes to draft revision (July 2004) of National Tree Climbing Guide

(red = additions; blue = deletions; green = notes)

1. page ii; acknowledgements; **Burnham Chamberlain, Clackamas River Ranger District, Mt. Hood National Forest**
2. page iii; Page numbers on contents page must be changed to correspond with text page numbers.
3. page 2; formatting error (gap) in text of “Belay” definition.
4. page 4; space needed between definitions of Tree-Crotch Lanyard and Tree Steps.
5. page 5; formatting error (gap) in first sentence (“Your preparations shall.....”).
6. page 5; 2.1-1C; “...**such as the Sky Genie system with tree crotch lanyard**”.
7. page 6; 3.3.1, 3<sup>rd</sup> bullet; “Air temperature is low enough to create an unsafe condition **in your judgment.**”
8. page 8; “Root Problems”; “**(which may indicate that the tree is unstable)**”
9. page 12; #7 “Water absorption”; “A rope that is wet is **never usually not** as strong....”
10. page 12; #9 “Aging”; ...**Because A Rope’s strength decreases over time. ropes older than 4 to 5 years should not be used.**
11. page 17, Figure 3g; Blake’s hitch fully tied **with a** (bowline knot on **a** snap catch).
12. page 17; 3.2.4 Specialty Knots. (note: **there is only 1 knot listed in section**)
13. page 24; 4A; Swiss tree gripper should be Swiss Tree Gripper (**proprietary name**)
14. page 26, 4<sup>th</sup> paragraph; the sentence “Several types of steel and aluminum carabiners meet this requirement”, is listed twice; delete one of them.
15. page 26 ; the following text is missing and should be added after paragraph 6 (A carabiner with a large gate opening....); “**Carabiners can be used for years if they are not damaged by a serious blow or long fall (hairline fractures can develop in aluminum carabiners after a fall). Inspect all carabiners frequently.**”
16. page 27; 4.1.4 Helmets;”.....requirements of the UIAA( Union Internationale des Associations d’Alpinisme). **or ANSI (American National Standards Institute) Standard Z89.1, Type II.** These helmets have been tested.....three-point chinstrap be worn at all times when climbing. **Helmets meeting ANSI (American National Standards Institute) Standard Z89.1, Type II, which are equipped with a 3-point harness are also acceptable.** Standard hardhats are not authorized for tree climbing.
17. page 27; 4.1.5; “To use a sling:”.....see Figure 4h.” (note: **should be** Figure 4e).
18. page 28; 4.2.2 and Figure 4c; “**Four-Inch Tie-In ....**”, should be “**4-Inch Tie-in ..**”.
19. page 29; NOTE under figure 4e; delete existing text and replace with the following: “**A girth hitch will reduce sling strength. For climbing applications where a sling provides an artificial foot-hold, and for climbing redirects where potential fall factors are low, the use of a girth hitch is acceptable. Use the basket hitch for life support anchors and protection points in ground-belayed and self-belayed climbing applications where the climber may be above the highest installed protection point.**”

## Changes to draft revision (July 2004) of National Tree Climbing Guide (page 2)

20. page 31-Figure 4f. Replace this figure with Figure 4g from original Guide, and change safety sling positions on carabiners so they show end-loading, and not side-loading, of the carabiners. (similar to carabiner and sling in figure 4c)
21. page 33-E; Last sentence, “4.2.3.3 Climber’s Responsibilities and Procedures” should be heading of next section and not last sentence in E.
22. page 34; 4.2.3.5; voice signal “Belay on” in “Climber” column, should be moved over to “Belayer” column.
23. page 34; 4.3.1; “..in trees lacking steeply angled branches and having branches..”
24. page 35; 4.3.2 (3); “a suitable rappel system such as the Sky Genie, Rescue Figure-8, rappel rack.....”
25. page 36; 4.5.2.1-3.a; “Minimum “C” sawyer certification”. As a minimum, certified as a “C” advanced sawyer.
26. page 37; 4.5.3-2f; “Leg protection-....Specification 6170-4f.”
27. page 38, 72, 78, 84 and 88; blank pages with headings are unnecessary (appears as though there is missing text); they could be kept but without headings, or with Notes as a heading??
28. page 46; 5.3.4- 2A; “ Construct a safety sling from flexible rope or webbing having a minimum 4,400-pound breaking strength to form a finished product with at least a 5,400-pound minimum breaking strength (see section 8.5)
29. page 29; 5.5 ; “...mechanical ascenders should be rated with a 5,400 5,000-pound minimum breaking strength.....”
30. page 51; 5.5.4-2E: “.....such as a rappel rack or a rescue-eight 8 descender.”
31. page 52; (F); (last sentence) “ ...because the split tail is inexpensive and easy...”
32. page 53, Figure 5l; use illustration, and text within the illustration, from the 2<sup>nd</sup> edition of The Tree Climber’s Companion (which is what is noted); actual illustration used is from the first edition.
33. page 58; A(3)and B(7); “Attach a carabiner to the figure-eight descender loop”
34. page 60;1J; “Wear sturdy gloves, such as heavy duty leather gloves”
35. page 61; 6.2.3,1J; “The amount of breaking force depends on the angle of the rope amount of downward tension applied to the rope coming out of the Sky Genie, and the amount of contact between the rope and the climbers body”
36. page 62-65, (all of) Section 6.3 Figure-8 Descenders: Revised text submitted (on CD) should be used.as submitted This text refers to rescue-8 style descenders with side-mounted ears and top-mounted ears and this nomenclature must be included to distinguish between these distinctly different descenders. Also, all references to figure-eight descenders in the text and for illustrations, should be changed to figure-8 descenders. (Including:3 references on page 32 #2, Belay-plate belay);
37. page 63; Figure 6c; “Recreational-style descenders are NOT acceptable for rescue applications”
38. page 70; 6.5.3-3A(4); “Use locking carabiners to secure the figure-eight descender loop to.....”

**Changes to draft revision (July 2004) of National Tree Climbing Guide (page 3)**

39. page 71; B(1); “Use rope that has a minimum 4,400-pound breaking strength to form a finished product with at least a 5,400-pound breaking strength (see Section 8.4) to form the continuous loop (figure 6p)
40. page 71; #6; “**To stop, let go of the knot.** If the knot fails to function properly and you are unable to stop, pull on the short section of rope from the bottom top wraps of the Prusik knot.
41. page 79; 8.4 Ropes “...Smaller diameter rope with a 4,400-pound minimum breaking strength of less than 5,400-pound breaking strength may be used for auxillary cordage to construct slings and Prusik loops if the finished product meets or exceeds 5,400-pounds breaking strength; however the margin of safety will be lower than if stronger rope was used due to less resistance to friction wear.
42. page 79; 8.3; **Change section to read as follows:** “Helmets used for tree climbing shall be UIAA (Union Internationale des Associations d’Alpinisme) approved. These helmets have been tested for side impact and puncture resistance, shock absorption, and the ability to remain on the head during impact. Helmets certified for search and rescue operations, or those certified as meeting ANSI Standard Z89.1 Type II which are equipped with a 3-point harness, are also acceptable. The most desirable of these helmets have an adjustable suspension system and shock-absorbing foam padding.”
43. page 79 Section 8.6; .....breaking strength of 5,000-pounds, meeting or exceeding ANSI standards.”

Submitted by Jerry Berdeen, Dorena Genetic Resource Center, 10/18/2004