



PREPARING TO STAND

Number 48 — June, 2011

“In this age, just prior to the second coming of Christ in the clouds of heaven, God calls for men who will prepare a people to stand in the great day of the Lord.” SW 3-21-1905

A FORMATIVE EXPERIENCE

by Jim Buller

Several years ago, before we had learned many of the things that we know now, a group of a little over twenty of us set out to go for a late summer Sabbath afternoon hike. There were several families represented, with children of all ages. Most of us had been on hikes before, so we planned to explore a new trail. The maps showed a side trail coming out to the road, a few miles down from the main trail-head, so we thought we'd leave a car at this point on our way up, hike from the trailhead down to this car, then shuttle back for the rest of the cars after the hike.

As it frequently happens, we got away later than we had intended. Arriving at the trail head, we discovered there had been a small forest fire in the area. But after a little scouting around, we were able to pick up the trail, and start out on our hike. A short distance down the trail, however, we realized that it had not been maintained for several years. There were small trees, up to about an 1½ inches / 3 centimeters in diameter, growing up in it! Still, it wasn't *too* difficult to make out the path, and we accepted the challenge of finding our way along the old trail.

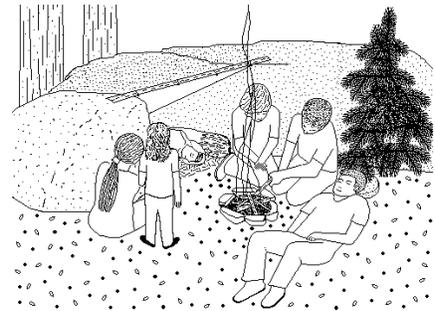
But, about the time we had gone half-way, we realized it was getting close to sundown. Between our late start, and the roughness of the trail, the afternoon had simply been used up. With only about an hour and a half of light left, we stopped to pray, and discuss our options. Going back the way we had come would be mostly up hill, and we had spent a good share of the afternoon just coming down to where we were. There was no way we could get back to the cars before night fall. As old and rough as the trail was, to keep hiking after dark would be foolish, for we would surely lose the path in the darkness.

To keep going on down the trail wasn't necessarily a good option either. Since this was a new trail for all of us, we didn't know what lay ahead. There was also a good possibility that we would lose the path, or miss our side trail at night —or worse yet, someone might get hurt stumbling around in the dark. However, the map showed our trail joining and then following along a small creek a short distance ahead from where we were, so there was a possibility the trail might get better —but then it could also get worse.

We decided the best thing to do would be to go ahead at least as far as the creek. If the trail was safe and easy to follow, we could hike on out. If not, we should just spend the night as best we could, and hike out in the morning when we could see better. Being late summer, it probably wouldn't get too cold, and along the creek, at least we would be able to have water and maybe find some edible plants. Although we hadn't brought much with us besides what we were wearing, we could make a fire, which was comforting, as most of us were in short sleeves.

Since it was close to sundown, we had worship, and the Lord gave us two verses. The first was Romans 8:28. "And we know that in all things God works for the good of those who love him, who have been called according to his purpose." (NIV) What we drew from this verse was that even though it seemed like we were in a bad situation, God *would* bring good out of it for us. The second verse was 1 Corinthians 10:13. "No temptation has seized you except what is common to man. And God is faithful; He will not let you be tempted beyond what you can bear. But when you are tempted, He will also provide a way out so that you can stand up under it." (NIV) This verse was a promise that He would not let anything happen that we could not handle with His help.

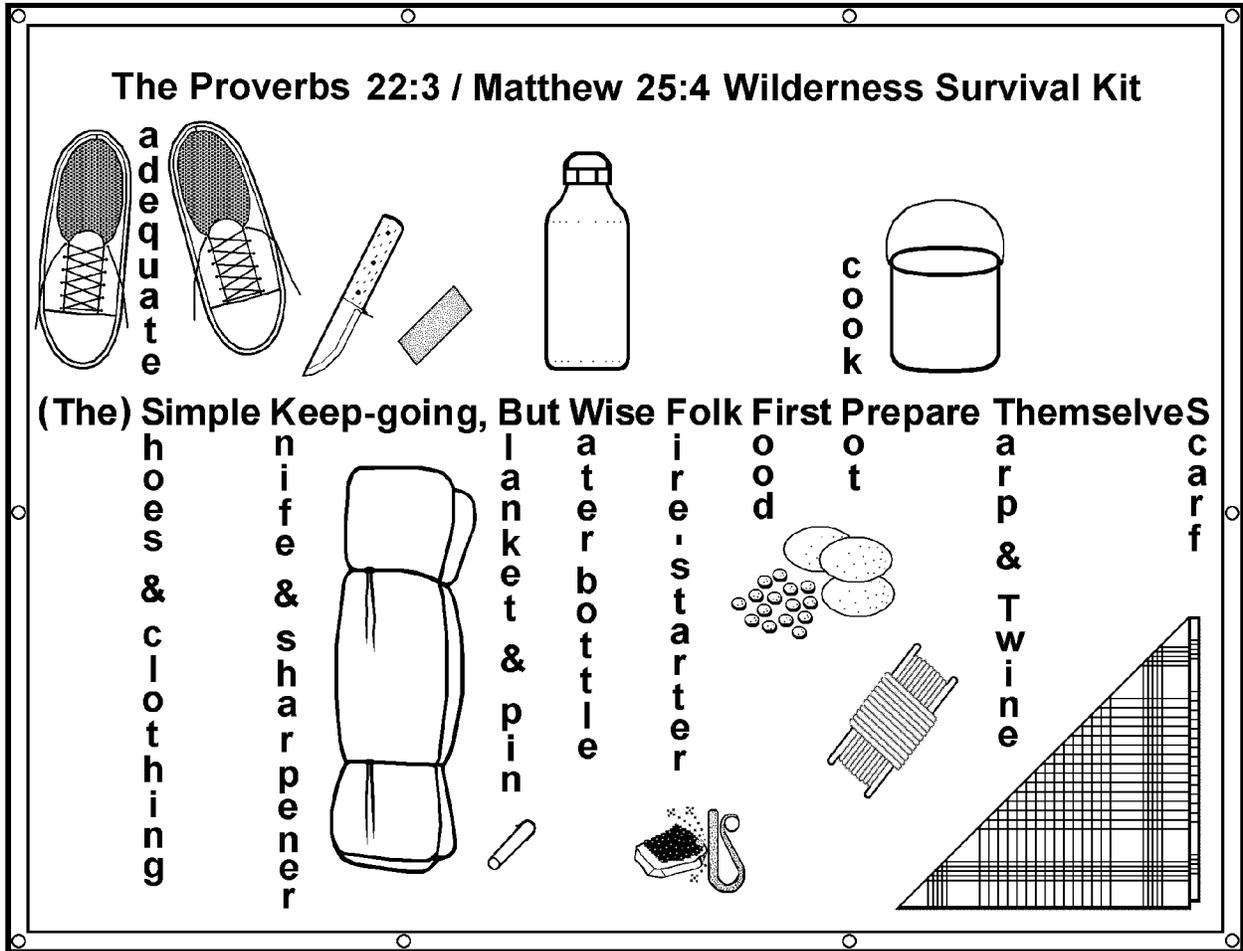
With this assurance we hiked down to the creek, and did some quick scouting around. Although the trail was slightly easier to follow, it wound down and around among the creek-side boulders, with small drop-offs here and there. We decided it would still not be safe to go on once it got dark. So, we looked around for a good spot, and did what we could to make "camp" for the night. One of us had brought a small tarp. With it we made a lean-to between a couple of boulders. Adding the little debris we were able to gather for bedding, and building a fire at its front made a cozy shelter. In it we would place as many of the young children as could fit. The rest of us would just bed down around the fire as best as we could for the night.



There weren't many wild edibles in the immediate area. Besides, the little bit of daylight we had left had been spent scouting around, and setting up our "camp." A few of us however, had brought a little extra food. This we rationed out to the children, saving the softest things for the baby one of the families had along.

The disposable diapers they had brought with them obviously wouldn't last till we got out the next day, so we had to be creative. Several of us had brought bandannas which we loaned to the family for that purpose as they can be washed out easily, dry quickly, and could be used over again until we got back to the cars.

The next day we made it out—tired, but happy for the experience. One of the things we remember most was the way everyone pulled together and shared whatever they had with whoever needed it most, reminiscent of Acts 2:44 and the early church. Although most of us had gotten cold that night, nothing had happened that we weren't able to deal with. God had kept His promises, and we were better off for the experience. All in all, we felt fortunate to have had a taste of the way things might be like in the last days.



SHARPENING
by Christopher Fischer

Sharpening. All edged tools need to be kept sharp to be effective and efficient. The wisest man in history said, "If the iron be blunt, and he do not whet the edge, then must he put to more strength: but wisdom is profitable to direct." Ecclesiastes 10:10. Only those who are accustomed to working with razor-sharp tools on a daily basis can understand how much sharpness is worth.

Files —for heavy metal removal. These are necessary for sharpening axes, machetes, and saws, and can be used on most knives that are made of simple high-carbon steel (medium- to high-grade stainless is too tough and wear-resistant). For straight-edged implements, an 8-12 inch Mill Bastard file is best. (See illustration for stroking and safety.) For many saws, a Knife-edge file, 3-corner file, or Cantsaw file is needed. For chainsaws, a round file of the right diameter is needed. Hard metals require finer teeth, softer materials can be cut faster with coarser file teeth.

Stones —for finer work, and harder metal. Lubrication, with oil or water, is required. **Silicon Carbide** is the coarsest, and often comes in a round or rectangular

form with 2 grits, coarse and medium, bonded together. These will sharpen medium-grade stainless, as well as hard carbon steel. Good for finer work on axes and machetes, and major work on knives. These coarse stones must be soaked before using. **Aluminum Oxide** stone is too soft and coarse for my liking, but it makes good sandpaper. “India Stones” are some of the best from these two materials. **Arkansas stone** (a natural rock, Novaculite) is finer, the grit usually being graded in terms of “soft” to “hard”—softer being coarser. The hard Arkansas will put a razor edge on all but the very hardest, toughest steels.

Ceramic—this is the king of sharpeners for perfecting a fine edge. Except for diamonds, it is the hardest material known to man. It is most available in rod form, called a “crock stick.” I prefer flat stones, but they are hard to find inexpensively for some reason. You don’t have to lubricate the crock stick—just wash it off when it gets loaded up with metal. All other materials listed above require lubrication. They can be used with water (or spittle), but oil is best. Automatic Transmission Fluid, cold pressed extra virgin olive oil (other vegetable oils will go rancid in the stone), or a mix of heavier petroleum oil with kerosene will work. Oil facilitates faster cutting, and protects from rust rather than causing it. Once a stone is soaked with oil, water tends to roll off it, instead of spreading out and cleaning the stone.

Diamonds—This type of sharpener is the ultimate in hardness, durability, and versatility. It can be used to sharpen anything, including the hardest, toughest steels, cobalt alloys (e.g. Talonite, Stellite, etc.), titanium, and carbide tools. Available in about 6 grits from 220 to 1200, you have a very workable range of choice here. In my experience, diamonds do not produce quite as fine an edge as hard Arkansas and ceramic, but they have the advantages being more aggressive and of not requiring lubrication. Eze-Lap and DMT make excellent diamond sharpeners. Eze-Lap is cheaper and has the entire surface area coated. DMT is lighter weight. For survival purposes, diamond sharpeners are the way to go—I think.

Improvised/Natural Sharpeners—For millenia, natural stone has been used for sharpening. This can include anything from sandstone to quartz to granite to basalt, and concrete. Sandpaper can be glued or tacked to a flat surface and used as a stone. For fine sharpening, you can roll the window of a vehicle part way down, and stroke your knife on the rounded edge of the glass, just as with a ceramic stick. Some people use the bottom of a clay or ceramic pot or cup. *Whatever your situation, you can find something that will be useful for grinding a blade.* Just look for something the correct shape, something that is smooth enough, and approximately the right grit for your application. When you find a natural stone that works especially well, save it.

Sharpening Technique

Angle—This is a crucial element. If your angle is too steep, cutting is very difficult. If the angle is too thin, the edge will chip or deform under normal use. Angles of as thin as 8 degrees from the center of the blade can be functional on high-quality kitchen and wood-carving knives, and angles of 45 degrees are often needed on chisels intended for cutting steel and stone. Most knives and axes do well between 10 and 25 degrees. Remember that it is easier to increase the angle at the very edge, grinding out minor chipping or rolling, than to grind a steep angle thinner out in the

field. By folding a sheet of paper as if you are making a paper airplane, you will get a simple angle-guide. The first fold will be 45 degrees, the second 22 ½, the third fold 11 ¼ degrees, and so on.

Convex edge geometry —If you are sharpening freehand (without a jig to hold the stone and blade at an exact angle), you will get a convex edge. This type of edge gradually becomes steeper as it nears the edge. This is actually desirable, as it removes stress from the edge, while also reducing friction on the side of the blade. For example, an area a few thousandths-inch wide at the edge (nearly invisible), sharpened at 15 degrees, when the main bevel is at 10 degrees, can improve edge retention as well as being very easy to touch up on a crock stick. At the same time, the increase in pressure required for cutting is almost indiscernible.

After setting the angle, the next step is to **detect when you have reached the edge**. When the stone begins grinding on the edge itself, a burr (also known as a feather-edge or wire-edge) will turn up on the opposite side of the blade. If you are using a coarse stone, the burr may be visible, but the best way to detect it is by feel, sliding the finger-tip down the side of the blade, off the edge.

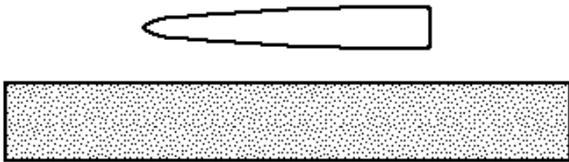
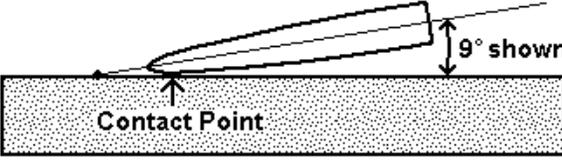
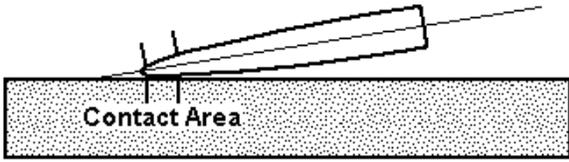
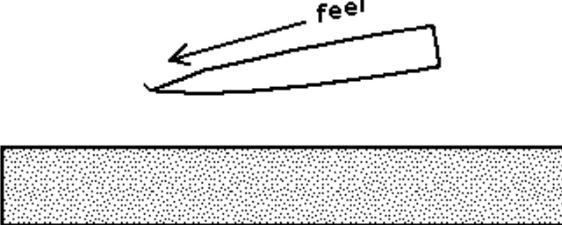
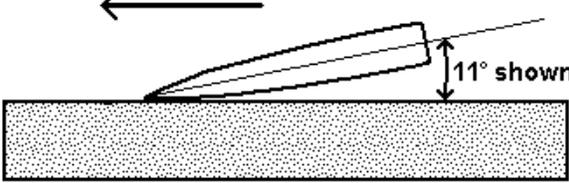
Burr Removal —The final step in the sharpening process is burr removal. This is often overlooked, causing people to wonder why their knife is duller after sharpening than before. Depending on the quality of steel, the burr may come off easily on a fine stone, or it may have to be worked off on a leather strop. On the stone, a forward, slicing stroke is most effective. On the leather, a backward, dragging stroke is used. The fibers of the leather are particularly good at reaching up into the micro-serrations left by the stone, polishing the edge. It may help to put a little clay on the leather, to act as a fine abrasive.

Saw Sharpening —I would highly recommend *The Crosscut Saw Manual* from the US Forest Service. The crosscut saw is required for firefighting in federally-designated wilderness areas, where chainsaws are banned. The crosscut saw is large, so it is easy to see what is happening, and learn the principles. If you learn to do what is in that manual, you will be able to sharpen most wood-cutting saws.

Also excellent is *The Art of Saw Filing* by H. W. Holly. This is a very old book that you can download from www.traditionalwoodworker.com, or find using a search engine. It does a good job of explaining how saws work, and how to modify them to suit your purposes best. It includes circular saws, rip saws, and more.

Scissors and Shears —These are easy to sharpen. Grind only one surface on each blade. Do not sharpen the inside face where the blades pass each other, since this needs to remain perfectly flat. Maintain the original angles, and watch until a burr is formed for the entire length of the edge. Try to grind the length of the blades evenly, so no dips are formed. The key to finishing the job properly, is to **hold the blades apart while closing, then pinch them together firmly while opening**. This wipes the burr off without damaging the edge. The process can be repeated two or three times, and then a leather strop can be used to finish removing the burr. Using this technique, anyone can put a good edge on bypass-type pruning shears, dressmaker's shears, hair-cutting scissors, sheep shears, paper scissors, tin snips, etc.

Basics of Sharpening

<p>1. The Dull Blade</p> <ul style="list-style-type: none"> —edge is thick, rounded, bent, chipped, deformed —angle is inappropriate 	<p>2. Setting the Angle</p> <ul style="list-style-type: none"> —thick enough for intended task —thin enough for efficient cutting (knives—8°-25°; masonry chisels—45° scissors and shears—45°-85°) 
<p>3. Partly Done</p> <ul style="list-style-type: none"> —angle established —edge untouched —coarse abrasive 	<p>4. The Burr</p> <ul style="list-style-type: none"> —formed when the contact area reaches the edge —becomes finer as smoother abrasives and lighter pressure are used 
<p>5. Removing Burr</p> <ul style="list-style-type: none"> —use finest abrasive, gradually reducing pressure from light to <u>very</u> light —increase angle slightly —use a forward, slicing stroke, alternating, one stroke per side 	<p>6. Stropping On Leather</p> <ul style="list-style-type: none"> —especially useful on springy, resilient steels —aids in removing tenacious, fine burrs 