The Paracord Bullwhip

A pictorial “how to” guide to making a 4 foot, 16 plait Bullwhip, Snakewhip and Wooden handled whip.

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Geared to the complete beginner,
This book will show you how to make a 16 plait, 4 foot Bull and Snake whip in my unique way.
The Paracord Bullwhip

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The Paracord whip

Whips of one sort or another have been around for centuries where the predominant material used in their construction was leather. Not so now, before the handling and use of leather left whip making in the domain of those skilled with such materials but the humble nylon Paracord now enables anyone with the will and determination to make their own robust, strong whip at a fraction of the price of a leather one.

If you are such a person, then read on and learn how to make one, or all of the whips shown on these pages.
The Paracord Bullwhip

4 foot Bullwhip

4 foot Wooden handled whip
Tools and Materials

The tools listed contain certain items that I have collected in over a decade of leather and Paracord work, most however are quite common items that you may already have or could adapt from other similar tools as described below. Most, if not all of the materials are readily available from online or high street retailers.

1, Granite slab – the dimensions of mine is 21 x 34 x 1 ¾ inches. The best and cheapest place to obtain these is from places that make gravestones or even a kitchen worktop is just as good.
2, Turned wooden handle – if you have a lathe or know someone that has, then making one from a 1.5 x 1.5 x 13 inch blank of hardwood is described towards the back of this manual.
3, Tape measure, metal, 5m long.
4, Steel rod 2mm diameter, about ½  m long, to help push lead shot into Paracord.
5, Steel rod 5mm diameter, 5 inches long for wooden handle, 3 inches for Snakewhip, 9 inches for bullwhip, plus a 3 ½ inch length of 6mm copper tubing for wooden handled whip. Available from B & Q or Homebase.
6, Hobby vice with clamp to fix onto most tables with a swivel head.
7, A small piece of hardwood flooring, the samples sold in B & Q will do. Used along with the granite to roll the finished 1st, 2nd and 3rd layers.
8, Electrical tape is used on the 1st layer to aid as a bolster. Masking tape.
9, EVO-STIK impact glue 65g tube.
10, Paracord needle, you will need this for any Paracord work and the best is from Tandy leather, called a Perma Lok needle for 3/32 and 1/8th of an inch cord.
11, A Needle – I use a saddler quilting needle with a blunt end but all you need is a long needle (2 ½ inches) with a large eye to take the artificial sinew.
12, Permanent marker, fine point.
13, Junior hacksaw to cut 5mm steel rod.
14, A lighter – I have tried various lighters to help melt and fix ends of Paracord and for me, a cigarette lighter is the best offering the most control.
15, Metal file, to smooth ends of cut steel rod.
16, Hobby knife with snap off blades
17, An Awl, or long fine length of steel that tapers to a point.
18, Lead shot, 2mm diameter, advertised on eBay as diving weights.
19, Leather, cloth or any strong scissors.
20, Pliers, pointed ends
21 & 22, Artificial sinew and Dacron thread, both are essential in whip construction and the best available is from here - http://www.thelongbowshop.com/. Or the Dacron is used for crackers, so any waxed twisted cotton thread should do and the sinew is available on eBay in 10m shanks (probably need about 80m)
23, Wooden dowel to make knots on along with lost head nails 25mm long. An old broomstick would do.
24, Paracord, 4mm diameter. Have used the USA and Chinese cord. Get Chinese from China on eBay and in the USA from 5star cord - http://www.fivestarcord.com/. 300ft for 4ft whip
25, Nylon webbing of 20mm (only for bullwhip) and 35mm widths used for knot foundations.
The Paracord Bullwhip

Paracord measurements for 4 foot whip

measurements for other lengths of whip - divide each length below by 4, then times by the length of whip you need. I.e 1st layer, number 3 strand, for a 6 foot whip would be:
\[
1.2 / 4 = 0.3 \times 6 = 1.8\text{m.}
\]

<table>
<thead>
<tr>
<th>Core</th>
<th>Lead shot</th>
<th>2</th>
<th>6</th>
<th>11 inches</th>
</tr>
</thead>
<tbody>
<tr>
<td>Paracord core</td>
<td>12</td>
<td>19</td>
<td>26</td>
<td>inches</td>
</tr>
</tbody>
</table>

1st layer

\[
\begin{align*}
1 & = 1\text{m} \\
2 & = 1.1\text{m} \\
3 & = 1.2\text{m} \\
4 & = 1.5\text{m} \\
\end{align*}
\]

Sinew to 5 inches

Braid to 2 3/4 ft

2nd layer

\[
\begin{align*}
1 & = 1\text{m} \\
2 & = 1.3\text{m} \\
3 & = 1.4\text{m} \\
4 & = 1.6\text{m} \\
5 & = 1.9\text{m} \\
6 & = 2.3\text{m} \\
\end{align*}
\]

Sinew to 9 inches

3rd layer

\[
\begin{align*}
1 & = 1.1\text{m} \\
2 & = 1.5\text{m} \\
3 & = 1.7\text{m} \\
4 & = 1.9\text{m} \\
5 & = 2.1\text{m} \\
6, 7, 8 & = 2.5\text{m} \\
\end{align*}
\]

Fall & Knots (these lengths stay the same regardless of whip length)

Fall = 1.5m,
14 bight = 2 x 1.8m
12 bight = 2 x 1.5m
Lace Preparation

Many Whip makers cut the cord they need to the lengths needed, i.e. for the 1st layer 8 cord braid, they would cut 8 lengths of cord and then attach each lace to the whip handle by evo-stik and sinew.

I do not do this, for the 1st layer 8 cord braid I cut 4 lengths of lace then half them, which means there are no loose ends one end of the whip enabling a quick and easy start to the braiding of the 1st layer. I do this for the 1st and 2nd layers. Please note that after the 2nd layer, the top of the braid is cut to form a firm rounded base where the 16 cords of the 3rd are individually fixed on, this is further explained in each layers section.

The diagram on the left displays the typical lace lengths I use to ascertain the different lengths of cord needed for a 4 foot whip for any particular braid be it the 1st, 2nd or 3rd layer. So when I say ‘Half’ the lace, I mean one half maybe 1m long and the other half 1.6m as it would be for the 1 to 4 cord in the 2nd layer. Reason for this are to do with the gradual tapering of a whip where at various distances along the whip, cords have to be dropped.

For a 4 foot whip you will need 300 feet of Paracord and to start with I assert what colours and patterns I would like on the finished whip as shown below. Next I unravel 200ft (or all if you wish to use three colours) of it to get rid of all the twist and kinks and re-lay it on the floor to one end of the tape measure that I locked just beyond the 1m mark. Then cut, remove the 7 inner strands and lay out each cord as shown below for the 3rd layer, or the top and therefore visible layer on the finished whip.
At the 2nd drop, you will be going from 11 to 10 cords by dropping the upper left hand cord. Then as illustrated above;

Braid the top left cord, **Number 1**, under 3 and over 2. **Number 2**, under 3 and over 2. **Number 3**, under 3 and over 2. **Number 4**, under 3 and over 2. Carry on with this sequence until the next drop.

At the 3rd drop, you will be going from 10 to 9 cords by dropping the upper right hand cord. Then as illustrated above;

Braid the top right cord, **Number 1**, under 3 and over 2. **Number 2**, under 2 and over 2. **Number 3**, under 3 and over 2. **Number 4**, under 2 and over 2. Carry on with this sequence until the next drop.

At the 4th drop, you will be going from 9 to 8 cords by dropping the upper left hand cord. Then as illustrated above;

Braid the top left cord, **Number 1**, under 2 and over 2. **Number 2**, under 2 and over 2. **Number 3**, under 2 and over 2. **Number 4**, under 2 and over 2. Carry on with this sequence until the next drop.
At the 5th drop, you will be going from 8 to 7 cords by dropping the upper right hand cord. Then as illustrated above; Note the distance to the end of the cord under the braiding.

Braid the top right cord, **Number 1**, under 2 and over 2. **Number 2**, under 2 and over 1. **Number 3**, under 2 and over 2. **Number 4**, under 2 and over 1. Carry on with this sequence until the next drop.

At the 6th drop, you will be going from 7 to 6 cords by dropping the upper left hand cord. Then as illustrated above;

Braid the top left cord, **Number 1**, under 2 and over 1. **Number 2**, under 2 and over 1. **Number 3**, under 2 and over 1. **Number 4**, under 2 and over 1. Carry on with this sequence until the next drop.

At the 7th drop, you will be going from 6 to 5 cords by dropping the upper right hand cord. Then as illustrated above; Note the distance to the end of the cord under the braiding.

Braid the top left cord, **Number 1**, under 2 and over 1. **Number 2**, under 1 and over 1. **Number 3**, under 2 and over 1. **Number 4**, under 1 and over 1. Carry on with this sequence until the next drop.
Before starting the knot, you will need to prepare the dowel. Apply masking tape around it at the distance shown above, then use a marker pen to indicate seven points evenly spaced around the dowel. It is safer to mark the nail points this way first before trying to hammer in the nails. Then write the numbers on the masking tape as this will aid in making the knot. Ensure that you mark each corresponding number to the left on the top row. 

**Remember** that the two rows of nails do not run parallel to one another as shown by the black lines.

For simplicity, instead of writing the words **Under** and **Over** for the instructions, I will abbreviate them to **U** and **O** which will hopefully avoid any confusion, plus all instruction will correspond to the photo above them going from left to right.

A typical line of instructions is abbreviated below;

**Up**........ **4 to 1**....... – **O3, U1, O1, U1**

**Up** - indicates the direction you will thread the cord. In this case from the bottom to the top. 

**4 to 1** – indicates the nail number you will be braiding from and to. In this case, number 4 on the bottom row to number 1 on the top row going around the dowel in a left to right direction. 

When it comes to braiding the interweave knot this number will correspond to the middle point between that number and the one proceeding it.

**O3, U1, O1, U1** – This is the braiding instruction, if added together, it tells you how many cords you will go across, in this case 6. Starting from nail number 4, you go Over 3 cords, then Under 1, Over 1 and Under the last cord before you get to nail number 1. As the knot progresses, these instructions will become longer. All you need do is keep counting the cords you cross plus as the knot progresses you will see its pattern emerge.

One last thing, the cord will twist as you braid the knot, you need it to lay flat. It is better to un-twist it as you go at this stage as trying to un-twist it on the whip is a nightmare. As the **O** and **U** increase, thread each at a time, and take you time.
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Starting with the 7 bight, 9 parts Foundation knot;

**Up** 1 to 5 - no U or O. **Down** 5 to 3 - O 1. **Up** 3 to 7 – O1. **Down** 7 to 5 - O2.  
**Up** 5 to 2 - O2. **Down** 2 to 7 - O3. **Up** 7 to 4 - O3. **Down** 4 to 2 - O4, U1.

**Down** 4 to 2 - O4, U1. **Up** 2 to 6 - O4, U 1. **Down** 6 to 4 - O3, U1, O1, U1.  
**Up** 4 to 1 - O3, U1, O1, U1.
**The Paracord Bullwhip**

**Down** 1 to 6 - O2, U1, O1, U1, O1, U1. **Up** 6 to 3 – O2, U1, O1, U1, O1, U1.

**Down** 3 to 1 - O1, U1, O1, U1, O1, U1, O1, U1. To finish go **Up** 1 to 5 O1, U1.

---

Starting with the 7 bight, 9 part, interweave knot to make the 14 bight, 18 part pineapple knot. Showing the circular movements on a flat photo is difficult so from now on two photos will help to display the full run from top to bottom or vice versa:

Start by threading the cord between nail numbers 1 and 7 on the bottom row.

**Up** 1 to 5 - U1, O1, U1, O1, U1, O1, U1, O1, U1.

**Down** 5 to 3 - U1, O1, U1, O1, U1, O1, U2, O1 U1.

**Up** 3 to 7 - U1, O1, U1, O1 U1, O1, U2, O1, U1.

**Down** 7 to 5 - U1, O1, U1, O1, U2, O1, U2, O1, U1.
**Constrictor Knot**

The Constrictor knot is a very useful and simple knot to quickly secure anything together and if I didn’t know any different, could have been made for whip making.

Starting on the left photo from top to bottom, and then the right photo from top to bottom –

1. Cut a length of sinew (about 1m) and drape over the braid.
2. Fold 1 over 2 and 2 under 1.
3. Thread number 2 through the loop leaving it hanging above number 1.
4. Thread number 1 over number 2 and then through the two loops.
5. Tighten knot. When you come to do this for the dropping of cord during the 3rd layer, you will tighten as said but also pull each of the cords your dropping and tighten the sinew again.
6. Cut sinew as near to braid as possible allowing enough for securing.
Cord Breaks

Cord breaks with Paracord are very unusual, in fact the only time I have broken a cord is when I left the lighter too near to a cord while trying to burn the sinew during a dropping of cords. One good reason why you should watch what you are doing while doing the same thing.

The remedy is similar to how I fix broken leather lace, but just like with leather it does leave a bulge along the braid and may affect the whips performance.

But if it happens this fix should mean it’s not the end of the world and you will still have a useable whip.

Starting on the left photo from top to bottom, and then the right photo from top to bottom –

1 and 2, melted ends are cut level and treated as for threading into a Paracord needle.

3, make holes near both ends with the awl.

4 and 5, using either the pliers or a needle if you have a long enough piece of cord to do so, thread the short cord from the braid into the hole of the broken off length.

6, thread a needle onto the end of the longer cord and thread through the short cords hole.

7 and 8, pull the two cords and join together.

8, cut off the ends as close to the fix as possible and burn ends of Paracord and flatten join.
Holding and Pulling cords while braiding.

One of the reason why most people find making a whip difficult, is due to the fact that you must do all the braiding while trying to keep all of the cords tight to an even degree on both sides. It is not easy, but is the only way to get a straight braid as shown along the whip thong on the right.

The photo on the left show the sequence I use for each cord, how I position my hands and use my fingers to try to keep hold of the cords without letting them go. This sequence in actual terms of time takes less than a second but it may help to do it in slow motion first while braiding cord from both side to help create that even amount of force needed for the even pattern in the right photo.

From top to bottom

1. X is the cord I will braid and which I have just pulled tight (as shown below).

2. I have transferred X over to the lower fingers of my right hand keeping it tight between them, releasing my left hand to re-grip the left cords.

3. The right hand cords have been bunched up within my right palm and bottom fingers as I finish the braid and transfer X back to my left hand.

4. The hands and fingers are back to their starting position just before the next cord to be braided is tighten (this cord being top right)

5 and 6 below (5 show front view, 6 a rear view), To tighten the cord to be braided, you will have to let go of all the other cords on that side. Wrap the cord to be tightened under your three bottom fingers and over your index finger, holding it against it with your thumb and pull sharp and quick while grasping the other side's cords along with the braid to support it.