



# Byzantine Chain

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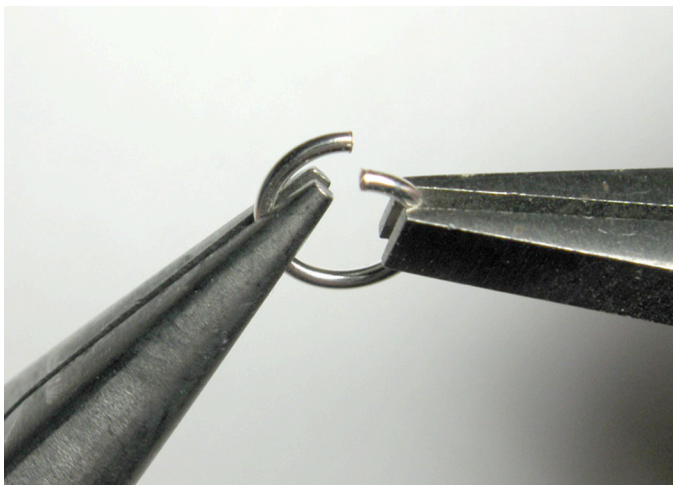
Welcome to your Step-by-Step instructions from the Bead Man. These instructions, and many more, are available from [thebeadman.com](http://thebeadman.com), as well as, a wide selection of jump rings, findings and tools.

## Step One: Open/Close

Jump Rings can not be pulled apart without losing shape or pushed together to close. Jump Rings close by moving the ends back and forth cross wise.



Grasp the jump ring at the 3 o'clock and 9 o'clock position.



Hold one plier steady and use the other plier to bend the ring away from you then back.

Repeat several times applying a slight inward pressure until the ends of the rings meet flush.

## Step Two: Work Hardening

Repetitively bending metal while harden the wire. The process of opening and closing jump rings will make them stronger. Two or three bends will improve the durability of your chains.

## Step Three: Quality Pliers

Pliers are extensions of your hands. The better quality the steel used to produce them, the less marking (dents and scratches) left by the plier. Pliers should fit comfortably in your hand and require very little pressure to hold on to a jump ring.



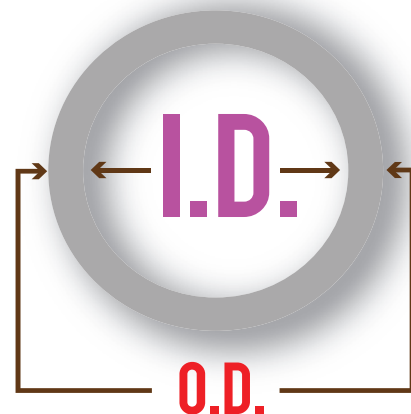
## GAUGE

The jump ring measurements used in this document are based on the A.W.G. American Wire Gauge. The table below provides a conversion for those using alternate gauge standards.

AWG	mm	SWG
12	2.0	14
14	1.6	16
16	1.3	18
18	1.0	19
19	0.9	20
20	0.8	21
22	0.6	23
24	0.5	25
26	0.4	27

## Inside Diameter

Knowing the difference between inside diameter and outside diameter is very important when creating chain mail jewelry.





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## JUMP RINGS

14ga 5.0mm ID or greater  
16ga 4.5mm ID or greater  
18ga 3.5mm ID or greater  
20ga 3.0mm ID or greater  
22ga 2.5mm ID or greater

## STEP 1: The Starter A

Close 2 jump rings, (pair A). Attach a small piece of wire to the end pair to create a handle. [For faster chain making, open jump rings and organize in piles of six rings.]

Size Selection: The following sizes can be used for Byzantine.

- 14ga 5.0mm ID (Extra Large)
- 16ga 4.5mm ID (Large)
- 18ga 4.0mm ID (First time making chains)
- 18ga 3.5mm ID (Standard)
- 20ga 3.0mm ID (Fine)
- 22ga 2.5mm ID (Micro Chain)



## STEP 2: The Starter B

Attach 2 new jump rings to pair A.



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## STEP 3: The Starter C

Attach 2 new jump rings to pair B.



## STEP 4: The Grip

Hold the starter by the wire and let the jump rings hang. Use your thumb and finger so that you pinch Pair A & B. This isolation technique will make it easier to build your chain. If you move your hand, only pair C should move back and forth.



## STEP 5: The Flip

Turn your hand so that you are pointing the starter at the ceiling. (C is now on top). Flip pair C open like the petals of a flower.



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## STEP 6: The Separation

over (step 4: the grip) and focus on pinching pair A/B to keep the rings from moving too much.



## STEP 7: The Push

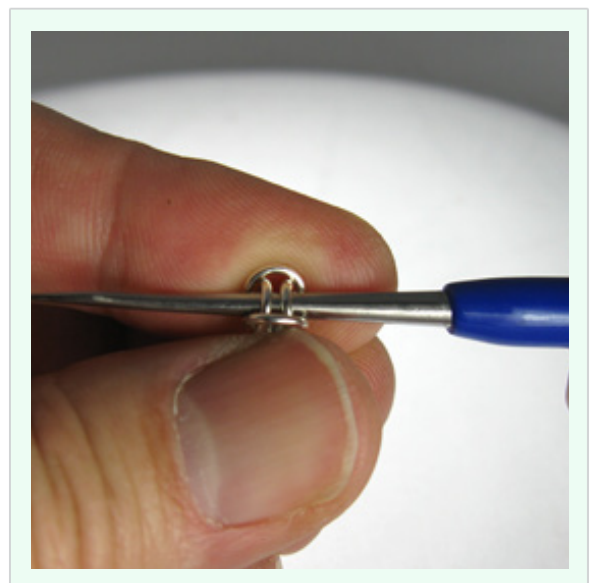
Push the awl into the chain. The link should appear like the photo. You have used all 6 rings and the pattern now repeats.

Are your six rings open and ready?



## STEP 8: The Push

Should look like this..



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## STEP 9: The Hold

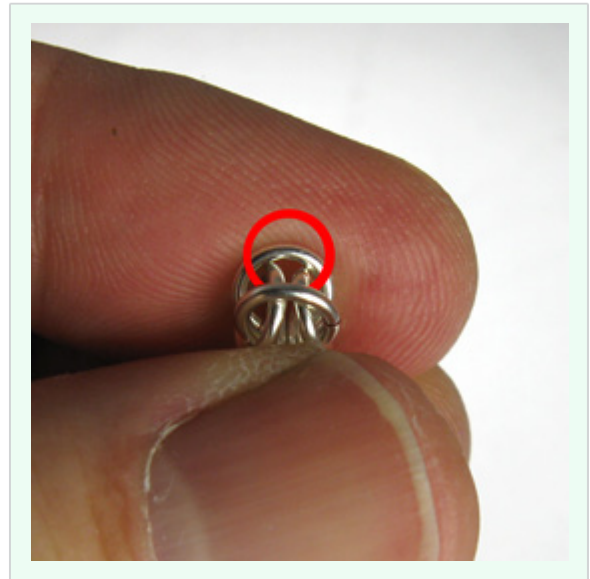
Grasp the chain firmly. Prepare to remove the awl.



## STEP 10: The Hold

As you remove the Awl, maintain a firm pressure. This will keep the chain from collapsing while you pick up and add your next set of jump rings.

The Red shows the placement of the next ring.



## STEP 11: Insert New A

Insert a jump ring (new Pair A) onto the spot that was occupied by the awl. This may feel awkward at first, but you will quickly become proficient. I use a sweeping motion like setting a hook.



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## STEP 12: Insert New A

Don't put down the chain just yet. Reinsert the awl to hold your spot open. Whenever I need to put down my chain I always put the awl back in.



## STEP 13: Close A and Add Another

Close the jump ring with a second plier. Work it back and forth with a slight inward pressure so there is no opening on the ring.

Don't put down the chain just yet. Reinsert the awl to hold your spot open. Whenever I need to put down my chain I always put the awl back in.

Pick up another jump ring and place it next to the first.



## STEP 14: The New A

The pair of jump rings that you inserted in step 13 is now the new pair A (step 1)



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## STEP 15: The New B

Add two new jump rings to pair A.



## STEP 16: The New C

Add two new rings to pair B.

REPEAT: Steps 4 - 16 and Repeat until desired length.



## STEP 17: Add a Clasp

After the last flip, use a single jump ring to attach the clasp of your choice.

