Step 1: CHOOSE A DIPPING CONTAINER

The dipping container will be the area where the actual dipping will take place. Dipping container material should be plastic, glass or metal. A square or rectangular container is the most desired configuration to use. The Dipping container should be large enough and deep enough to completely submerge the part being processed.

Container should be of a size that when you lay your desired part to be processed into the center of the container:

1. You should have at least two to three inches of space between the side of the part and the sides of the container. 
2. The container should also be deep enough that when you pro cess your desired part it will be totally submerged below the water line.
3. Your container can never be too deep, but it can be to shallow.

The film is a water soluble product. Do not get any moisture or water in the area of the film. If the film comes in contact with water it will not process normally.

1. The film has a label stating this side up. When the film is placed in the water you should be able to read the label.
2. Determine the size of film you will need to process your part.
3. You need to have enough film so that once it liquefies it will cover the desired area to be processed.
4. Cut the size of film you will need to process your desired part.
5. The film should have at least one inch of room to expand from the edge of the film to the side of the dipping container.
6. You do not want to cut the film too small. If the film has three to four inches to expand before reaching the side of the container it will stretch and you will lose the definition of the image.

Step 2: MATERIAL OF PART

Determine the substrate your part is made of.

Read Carefully: Only parts that will not be harmed by being submerged in water can be processed.

Absolutely no parts containing electronics can be processed.

1. No soft woods such as MDF or plywood, which will absorb water and expand can be processed.
2. Hard woods such as hard walnut and hard oak can be processed.
3. Metals such as steel, aluminum and stainless can be processed. (however, you will need to provide an etching primer and urethane primer paint to process metal parts)
4. Plastics such as ABS, Polypropylene, Styrene, PVC and Acrylics can be processed. Any part that you can adhere primer or base color to can be processed with this method.

Step 3: PREPPING THE PART

When using any of the aerosol products provided in the kit always use the respirator provided in the kit. Only use aerosol products in a well ventilated area.

1. Make sure any area of the part you do not wish to paint or print an image on is protected. You can use masking tape or masking paper to mask off any areas you do NOT want you print on.
2. Clean part completely with cleaning agent or by washing the part with detergent type cleaner.
3. Shake the can vigorously to create a good mix.
4. Cut the size of film you will need to process your part.
5. The film should have at least one inch of room to expand from the edge of the film to the side of the dipping container.

Step 4: SETTING UP THE DIPPING CONTAINER

You have already determined the size of your dipping container within the procedures on step #1.

1. Add water as hot as your tap will allow. 90-95 degrees is best.
2. Use a temperature or temperature probe to determine the desired heat range.
3. Heat enough water so that once you have poured the heated water into your dipping container the water level sets approximately 1” from the top. You need this gap between water and the top of the container so once you submerge the part water and film do not spill over the sides.

Depending on your choice of container this will determine the length of time you have prior to processing. A metal or glass container will hold the heat range longer than plastic. No matter what your desired container is made of any material should give you at least twenty to thirty minutes to process your part. This is more than an adequate time frame for most parts to be processed.

Step 5: FILM PREPARATION

The film is a water soluble product. Do not get any moisture or water in the area of the film. If the film comes in contact with water it will not process normally.

1. The film has a label stating this side up. When the film is placed in the water you should be able to read the label.
2. Determine the size of film you will need to process your part.
3. You need to have enough film so that once it liquefies it will cover the desired area to be processed.
4. Cut the size of film you will need to process your desired part.
5. The film should have at least one inch of room to expand from the edge of the film to the side of the dipping container.
6. You do not want to cut the film too small. If the film has three to four inches to expand before reaching the side of the container it will stretch and you will lose the definition of the image.

Step 6: ACTIVATOR

Activator is a solvent and resin base product which enables the ink to make a successful transfer.

1. When using the activator, make sure you are in a well ventilated area and always use your respirator provided in the kit.
2. When (directed) to use the activator the procedure will be as follows.
3. Shake the can vigorously to create a good mix.
4. The aerosol must be level over the film and about ten to twelve inches above the film.
5. When directed to spray the activator you will start from on side of the film. Spray even patterns from right to left. Then spray pattern back to front creating a cross hatch pattern. One light pass in each direction is sufficient.
6. You do not want a heavy amount of spray. You do not have to saturate the film just make sure you have covered the film with activator.

Step 7: PROCESSING

For this stage you will need a method to determine when sixty seconds has elapsed.

Now you should heat your water and place it into your dipping container.

1. Unroll your film from the tube exposing the amount you wish to use. The film will be tagged this side up. Depending on your environment you may want to use 10” masking tape and apply a border around the film. This will help stabilize the film. If you use a tape frame or border you will need to cut a few lines completely through the tape on all four sides so the film can expand once it is placed in the water.
2. Once the film size is determined and cut hold the film from the two furthest corners.

3. Bring both corners together so the film now resembles a sling. Lay the film in the center of your dipping container and easily lay both corners down together.
4. Let the film hydrate in the water for sixty seconds.
5. After sixty seconds spray your activator as directed in stage 6.
6. Wait fifteen to twenty seconds as the film is activated and turns into liquid ink.
7. Do not get into a hurry the film may take longer to liquefy prior to dipping. This all depend on how the activator was applied. The film will only expand to the size of the container then stop. When the film is fully activated it should have a nice glossy appearance.
8. Begin to process your part by starting at one end keeping the part at a thirty to forty percent angle.
9. Once you start to process your part keep slow even pressure submerging your part into the water.
10. Attempt to keep the same angle until the complete part is submersed below the water line. You are attempting to enter the water in a way so as to NOT trap air bubbles under the part.
11. You want to dip a part with a smooth even motion. Pushing your part down and towards the ink. We suggest doing a couple of test parts prior to processing your true desired part.
12. Do not touch or rub any area of the part that has been processed.
13. The part must be rinsed off under running water. Cold water will work but warm or hot water will remove the residue quicker.
14. The part must be completely free of any PVA residue left from the printing process. Failure to do this will cause the finishing top coat not to adhere to the part.
15. After rinsing let the part air dry. If any shiny areas are visible this is a good indication that PVA residue is still present. Simply rinse the part again until it has a dull appearance.

Step 8: RINSING

Hot or warm water is the quickest method to rinse with. After you have processed your part you will need to remove the PVA residue from the part.

1. Do not touch or rub any area of the part that has been processed.
2. The part needs to be rinsed under running water. Cold water will work but warm or hot water will remove the residue quicker.
3. The part must be completely free of any PVA residue left from the printing process. Failure to do this will cause the finishing top coat not to adhere to the part.
4. After rinsing let the part air dry. If any shiny areas are visible this is a good indication that PVA residue is still present. Simply rinse the part again until it has a dull appearance.

Step 9: TOP COAT

When using any of the aerosol products provided in the kit always use the respirator provided in the kit. Only use aerosol products in a well ventilated area.

1. Apply the aerosol top coat in even passes over the part.
2. Let each coat set up for at least one to two hours in normal room temperature before applying another coat.
3. Apply coats until desired appearance is achieved.
4. It is always better to apply several light coats as opposed to a single heavy coating.
5. Once the top coat has dried you are ready to use your part. Please note must top coat finished require 10-14 days to reach their full properties. You will want to take it easy on the part till this time.