

Turning Penguin and Chick Ornaments



INTRODUCTION

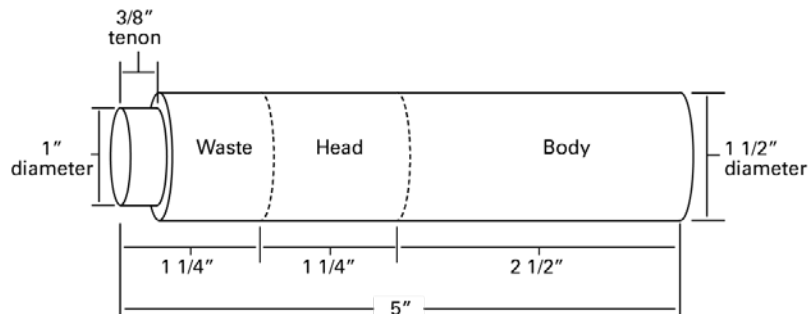
I was looking for a way to use turning, power carving and painting to make a Christmas Ornament. Penguins have become popularized by television, movies and children's books. I believe I can incorporate all three of my skills and design a turned penguin ornament.

Design Consideration

Since this is an ornament it needs to be light in weight. The shape and size and markings of the head give each ornament its different look. The contrasting white and black colors make visibility on a Christmas tree work well. There are at least 17 different species of penguins in nature. There is a lot of poetic license when it comes to recognizing a penguin. The ornament in this handout is my penguin ornament design.

Turning the Penguin Body

1. First, place a 1 ½ "x 1 ½ "x 6" blank between centers and turn it to a cylinder. Then turn a tenon on one end for chucking (figure 1).



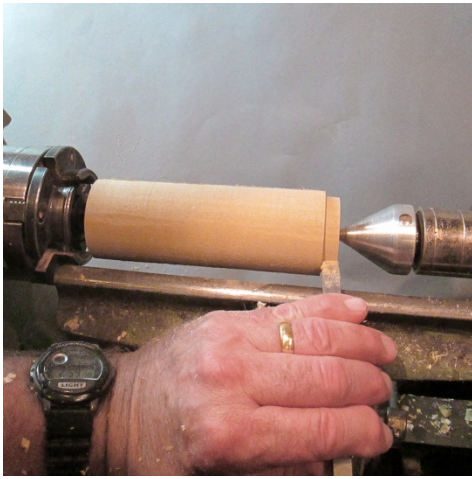
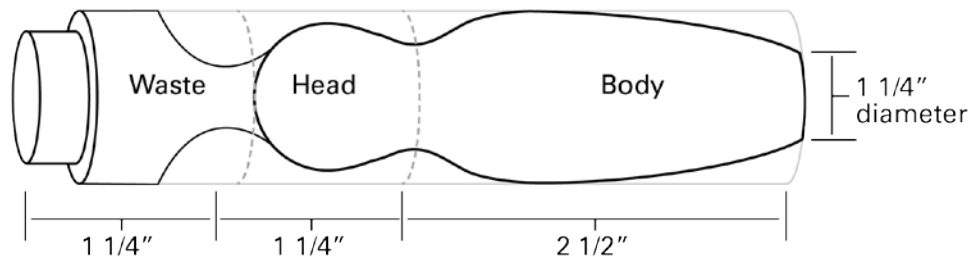


figure 1



figure 2

2. The next step is to chuck up the cylinder and turn a 2 ½ " long flattened oval. To do this use a 3/8" spindle gouge. This will be the penguin's body. The flat end of the oval should be at the tail stock end. The diameter of this flattened end should be 1 ¼" (figure 2).



3. Next turn a shallow cove at the other end of the 2 ½" oval and another smaller oval. This second oval will be 1 ¼ " in length. Now there is a large oval, a cove and a small oval.
4. **Leave the small oval attached to the blank** (figure 3).



figure 3

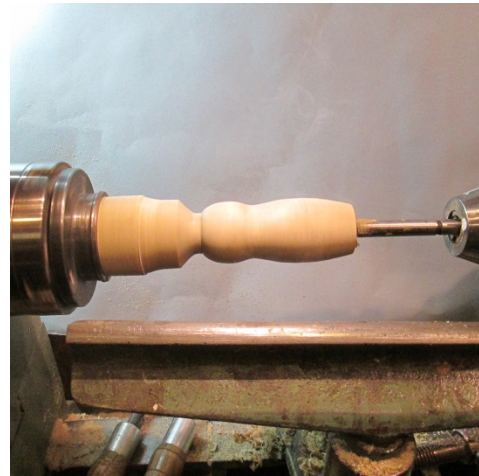
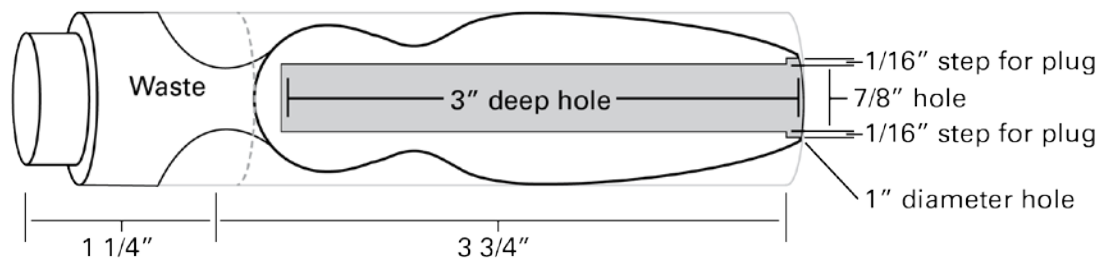


figure 4

Hollowing the Penguin Body

1. Hollow the body with the large oval from the tailstock end.



To establish the depth for hollowing, place a drill chuck in the tailstock and drill a 7/8" hole with a Fostner bit into the oval to a depth approximately 3" from the bottom of the oval (figure 4). After drilling, hollow the large oval. I like to use the toe of a 1/4" round skew with the tool rest just above center and placed as close as possible without hitting the edge of the oval. I usually leave the wall thickness about 1/8". It is okay to be thicker at the opening when hollowing as this is an ornament and you want it to hang down (figure 5).



figure 5

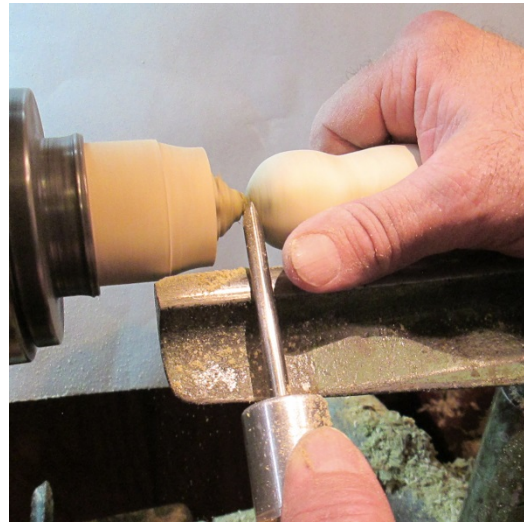


figure 6

2. Next hollow the small oval. The small oval will be the penguin's head.

Plugging the Bottom of the Penguin:

In order to plug the hole in the bottom of the penguin two things will need to be done; one, there needs to be a lip for the plug to sit on, and there needs to be a plug to fit the hole.

1. First turn a small step on the edge of the hole about $\frac{1}{8}$ " deep and $\frac{1}{16}$ " wide. This $\frac{1}{16}$ " step will serve as a lip for the plug to sit on (figure 5).
2. Now sand the exterior of the ornament to 220 grit.
3. Once finished sanding, part the penguin's body off from the blank maintaining the curve of the oval head.
4. Hand sand the top of the penguin's head where it was parted off (figure 6).

5. Next, turn a thin plug to fit the hole in the bottom of the penguin's body approximately 1" in diameter by 1/8" thick (figure 7).

Plug

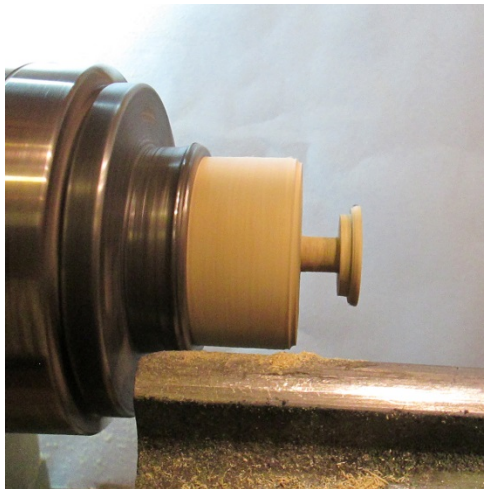
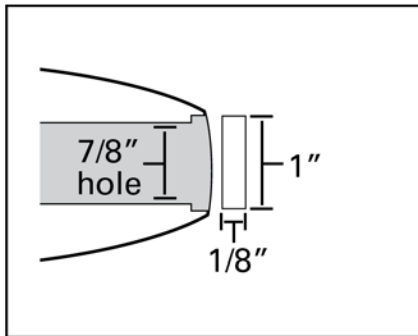


figure 7



figure 8

6. Turn the lathe off and check to see if the plug will fit the hole at the bottom of the penguin. Once the plug fits to satisfaction, part it off and glue it in place with CA glue (figure 8).

7. Now there is a penguin body that is 3 ¾" tall (figure 9).



Figure 9

Turning the beak

1. After the plug dries, drill a 1/8 " hole about one fourth of the way up from the bottom of the small oval for the penguin's beak. (See Paint Scheme on page 8.)
2. Place a 1/2" square 3" long piece of Chakta vega or Yellow Heart between centers and turn a cylinder with a tenon on one end (figure 10).
3. Now turn a small tenon about 1/8" in diameter and 1/4" long (figure 11).
4. Next, turn a cone about 1/2" long by 1/2" diameter at the base/tenon end (figure 12).



figure 10

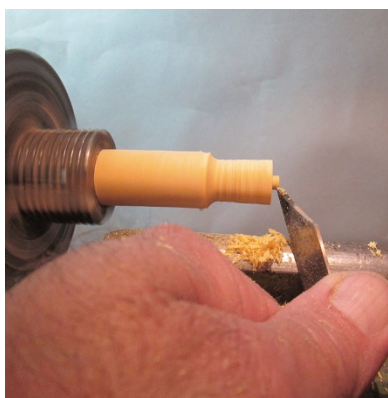


figure 11

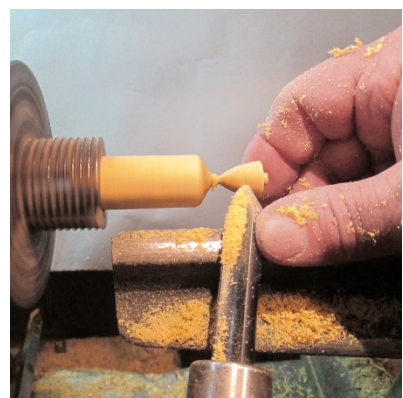
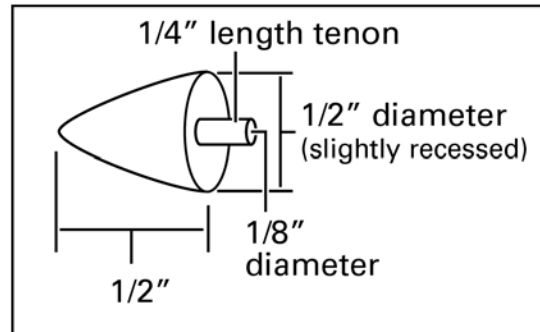


figure 12

Beak



*This cone will be the penguin's beak. At the base of the cone I undercut to give the beak a close fit on the penguin's curved face. Before parting the beak off, check the fit on the penguin's drilled hole. If the beak tenon fits the 1/8" hole on the penguin's head, part it off from the blank (figure 13). I like to finish the beak with a quick spray of lacquer. Once the lacquered beak is dry set it aside. **The beak should not be glued into place until the body has been painted.***



figure 13

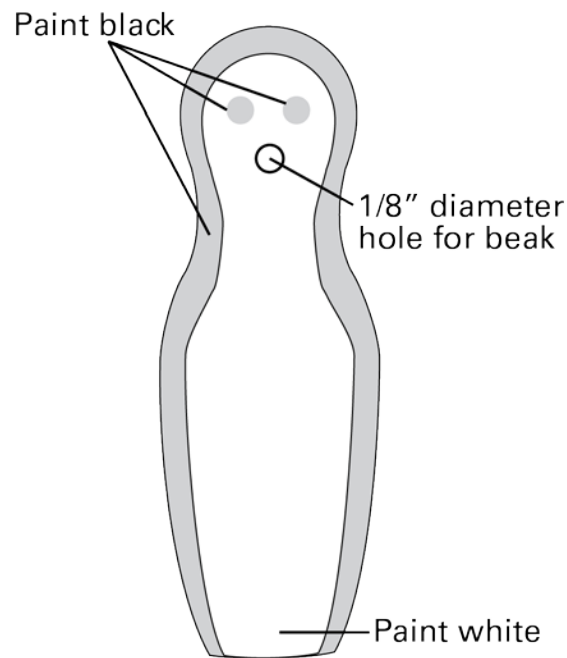
Painting the Penguin

1. Next draw a line defining the black part of the penguin's body.

This is done by drawing a line that divides the penguin's body into one third and two thirds vertical sections. Start the line at the base or foot area and draw up the body along the cove shaped neck and up and over the face back down to the feet. Try and draw the lines evenly apart on either side of the penguin's body. *It is a good idea to practice this on some scrap.*

I like to wood burn the body line which makes it easier to paint.

2. Then, paint the entire penguin with white gesso. *At this point you may decide to carve the flippers or wings. I carve the wings by penciling in the shape of the wings and using these lines for my carving. Once the carving is done gesso the carved areas.*
3. After the gesso has dried, paint the black part of the body with acrylic paints.
4. Glue the beak into place with CA glue.



Paint Scheme

Painting the Penguin's Eyes

1. Now is the best time to place the eyes on the penguin.

Hold the penguin body in your hand. Using a hard lead pencil draw two small circles about 1/4" above the beak and about 1/2" apart. These circle marks will be where you place the eyes.

If the eyes are not where you want them erase them and draw the small circles where you want them.

A fabric texturing pen will give the eyes a shiny appearance. I like to use the smallest tip black fabric texturing pen for the eyes. It is a good idea to practice painting small eyes before attempting to paint the penguin.

Once the eyes have dried the penguin ornament is complete.

Turning a Penguin Chick Ornament

If you would like to turn a chick for your penguin ornament the steps are essentially the same as the adult using a smaller blank and dimensions. The blank will be 1"x1" X4" of hardwood. You will need to use small blank of Ebony or turn a piece of hardwood that will be painted black to make the chick's beak.

Turning the Penguin Chick Body

1. First, place a 1"x 1"x 4" blank between centers and turn it to a cylinder. Then from the tailstock end of the blank measure and mark 1" and 1 3/4". Next turn a tenon on one end for chucking (figure 1).

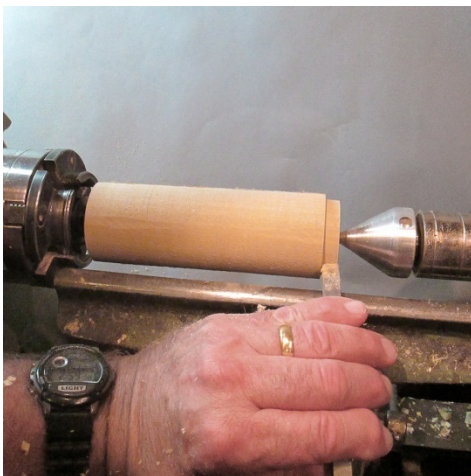
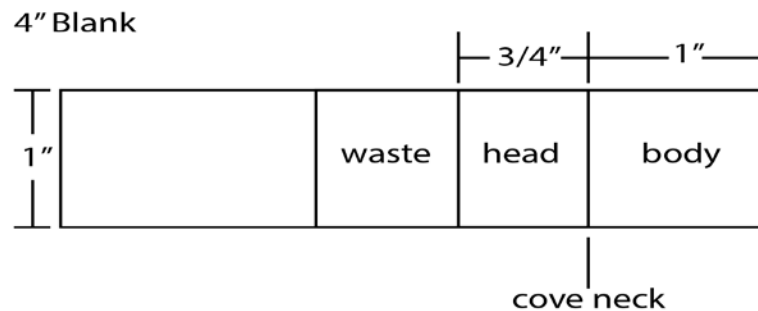
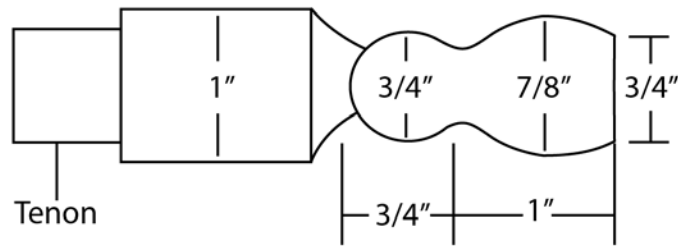


figure 1



figure 2

The next step is to chuck up the cylinder and turn a 1" long oval. To do this use a 3/8" spindle gouge. This will be the penguin chick's body (figure 2). The flat end of the oval should be at the tail stock end. The diameter of this flattened end should be 3/4".



5. Next turn a shallow cove at the other end of the 1" oval and another smaller oval. This second oval will be 3/4" in length and 3/4" in diameter. Now there is a large oval, a cove and a small oval (see above drawing).

6. Leave the small oval attached to the blank (figure 3).



figure 3

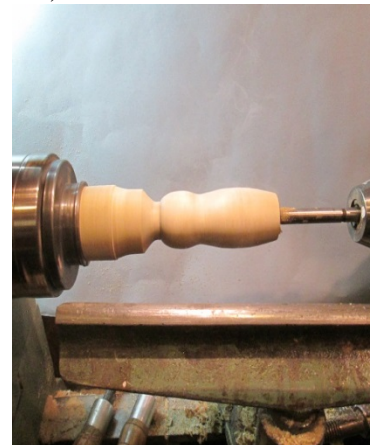


figure 4

Hollowing the Penguin Chick Body

1. Hollow the body, the large oval, from the tailstock end. To accomplish this place a drill chuck in the tailstock and drill a 1/2" hole with a Forstner bit into the oval to a depth approximately 3/4" from the bottom. (figures 4).

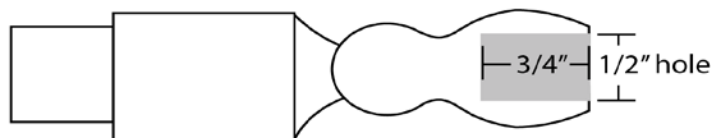




figure 5

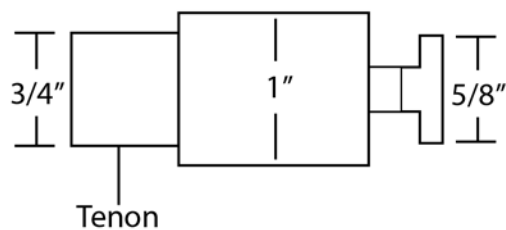


figure 6

Plugging the Bottom of the Penguin Chick:

In order to plug the hole in the bottom of the penguin two things will need to be done; one, there needs to be a lip for the plug to sit on, and there needs to be a plug to fit the hole.

1. First turn a small step on the edge of the hole about 1/8 " deep and 1/16 " wide. This 1/16" step will serve as a lip for the plug to sit on (figure 5).
2. Now sand the exterior of the chick ornament to 220 grit.
3. Once finished sanding, part the penguin chick's body off from the blank maintaining the curve of the oval head.
4. Hand sand the top of the chick's head where it was parted off (figure 6).
5. Next, turn a thin plug to fit the hole in the bottom of the penguin's body approximately 5/8" in diameter by 1/8" thick (figure 7).



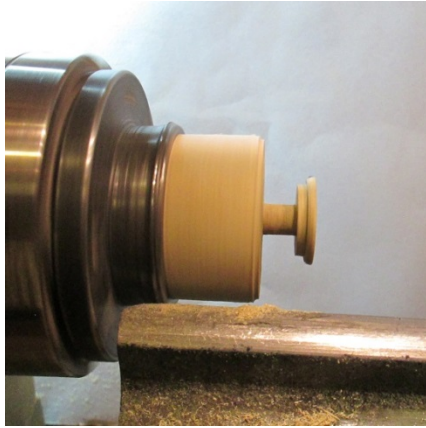


figure 7



figure 8

6. Turn the lathe off and check to see if the plug will fit the hole at the bottom of the penguin chick. Once the plug fits to satisfaction, part it off and glue it in place with CA glue (figure 8).
7. Now you have a penguin chick body that is 1 3/4" tall.

Turning the beak for the chick

The beak can be turned from a piece of hardwood and then painted black or a small Ebony blank can be used. The beak is very small in diameter and length.

1. After the plug dries, drill a 1/8 " hole about one fourth of the way up from the bottom of the small oval for the penguin's beak. (See Paint Scheme on page 14 .)
2. Place a 1/4" square 2 1/2 " long piece of ebony or any other hard wood between centers and turn a cylinder. *The photos and drawings of the chick's beak are of a Yellowheart blank for visual effect .*
3. Now turn a small tenon about 1/8" in diameter and 1/4" long (figure 9).
4. Next, turn a cone about 1/8" long by 1/8" diameter at the base/tenon end (figure 10).



figure 9



figure 10

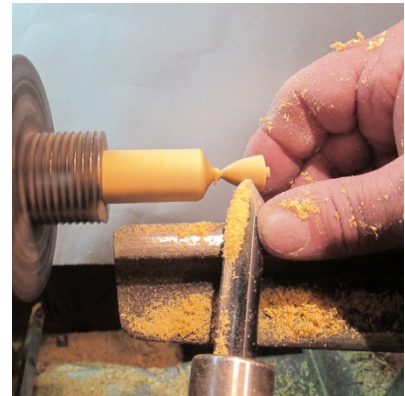
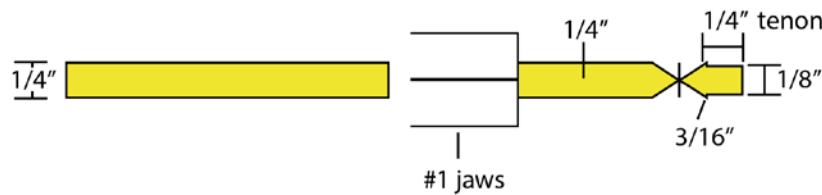


figure 11

Chick's Beak

Beak blank

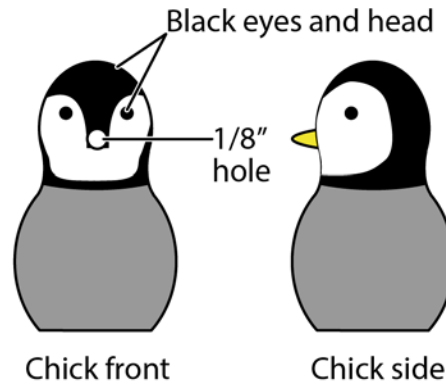
Turned Beak



*This cone will be the penguin chick's beak. At the base of the cone I undercut to give the beak a close fit on the penguin's curved face. Before parting the beak off, check the fit on the penguin's drilled hole. If the beak tenon fits the 1/8" hole on the penguin chick's head, part it off from the blank (figure 11). I like to finish the beak with a quick spray of lacquer. Once the lacquered beak is dry set it aside. **The beak should not be glued into place until the body has been painted.***



Penguin Chick Painting Scheme



Wood needed for a Penguin ornament:

- 1- 1 1/2" X 1 1/2" X 6" piece of wood scrap (maple, poplar etc.)
- 1-1/2" X 1/2" X 3" piece of Argentine Osage Orange or Chakte viga
- 1-1/4" X 1/4" X 3" piece of Ebony, Blackwood or hardwood that will be painted black
- 1-1" X 1" X 4" piece of wood scrap (maple, poplar etc.)

Tools needed for turning:

- Roughing gouge
- 3/8" or 1/2" spindle gouge
- Parting tool
- 1/4" Round skew or set of 1/4" hollowing tools
- Skew or 3/8" beading parting tool
- Chuck with #1 and #2 jaws
- Sandpaper up to 320 grit
- Calipers
- Drill chuck
- 1/8" drill bit
- 7/8" Forstner drill bit
- 1/2" Forstner drill bit
- Ruler

Things needed for decorating:

- Pencil
- Small water base Paint brushes
- White gesso
- Acrylic paints
- Clear Gloss acrylic finish (Minwax Polycrylic or other brand)
- Thin CA glue

Gallery of Penguin Ornaments:

