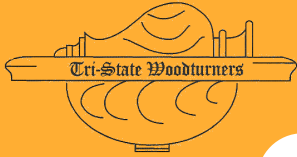


TRI-STATE WOODTURNERS



Meeting Location:

8361A Dayton Pike

Soddy Daisy TN

(Horsin' Around fac.)

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Cuts and Scrapes

WWW.TRISTATEWOODTURNERS.COM

AUGUST 2018 NEWSLETTER

Brian Horais

Aug. Demonstrator

Brian Horais, a woodturner for 8 years, lives in Knoxville, Tennessee. His focus is on turning non-round multi-axis works of art. He is the Past President of the East Tennessee Woodworkers Guild (juried member), a member of the Smoky Mountain Woodturners, the American Association of Woodturners (AAW) and a juried artist at the Appalachian Arts and Craft Center. Several of his twisted segmented works were jury-selected for the East Tennessee Master Woodworkers Show in November 2013, 2015 and 2017 and for the "Arts in the Airport Exhibition" at the Knoxville McGhee Tyson airport in 2016, 2017 and 2018. He published an article in American Woodturner in December 2017 entitled "Twisted Segmented Turning" and recently completed teaching a class at the Tennessee Tech Appalachian Center for Craft entitled "Turning Spirals on a Lathe".

His website is located at: www.horais.com

This Sat. at 1:00 Brian will present "Twisted Turning Demonstration."

Many turners develop their skills by turning round shapes (bowls, vases, etc.) but then find themselves looking for

new challenges. I suggest that they should try off-axis turning, specifically a 3-point off axis method that produces eye-catching, twisted spiral shapes on a lathe.

This demonstration introduces wood turners/woodworkers to the world of off-axis (also known as multi-axis) wood turning. The three-point off-axis turning method is used to create pleasing spiral twisted shapes on a lathe as shown in the examples in the attachment. The process for develop-

Tri-State Woodturners an
official chapter of AAW



ing the twist is described and demonstrated and then techniques for embellishing the spiral shapes with carving are also demonstrated. A discussion of methods to integrate segmented designs with twisted shapes is also provided.

Background information can be found on www.horais.com on the 'Links' page.

July Meeting with Myra Orton



Myra did two all day hands-on workshops the day before and the day after the regular TSW meeting which were well attended and appreciated a lot by the attendees. She filled the regular meeting with a huge amount of information on ways to embellish and enhance turnings through color, pyrography and carving. She needed at least a couple more hours to develop all the materials she had to show. The pictures below reveal the beauty of her work and some of the materials she demonstrated during the meeting.



Pearl-Ex Pigments are made from powdered mica. Since they are not metals, they will never rust or tarnish and are completely non-toxic. They may be mixed into virtually any viscous, transparent medium and applied to any surface. They may also be applied dry with a brush or finger and then sealed with any varnish or fixative. The colors range from whites and precious metals to duo and interference colors. Various particle sizes produce looks from a satin finish to a highly metallic sheen. They are particularly fabulous over black or dark backgrounds. Also available in larger sizes.





President's Corner

Jim Dvorak is doing an excellent job coordinating the Beads of Courage effort. He and Les took our last load of boxes to the hospital and the kids absolutely love them. The hospital has no more boxes left. So let's correct that. Thank you.

Last month I decided due to space and time not to do the Presidents Challenge and show and tell. I want you to bring back all the fine work you did last month and the new work for this month. Also support the wood auction with quality wood and buying tickets.

Remember the August's president's challenge is a plate. The more you participate the more likely you'll win a special prize at the end of the year. And we'll have a drawing at the meeting for challenge participants to win a Woodcraft gift certificate. I'd like to thank all that participate in the challenges.

Remember when you drop your things off for the Presidents Challenge or Show and Tell, fill out a provided form that will have your name, type of wood and finish on the piece. This will help during the Show and Tell segment as well as John as he does our newsletter.

Doug knocked last month's demo out of the park! Myra Orton did a great job. I even got an opportunity to fill an opening on Sunday for the workshop and felt it was worth every penny. Thank Doug for all the coordinating, phone calls and networking he has to do to fill these slots with quality demonstrators.

Finally a word about safety. Crafts Supply gives us these tips. Open up the link and watch the video. It has good procedures for the new and experienced.

<https://www.youtube.com/watch?v=pRMI-Exyf6g>

TSW CLUB OFFICERS

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2018 Club Challenge			
January	Spindle— 10 submitted	July	Utilitarian- 8 submitted
February	Wall Art - 11 submitted	August	Plate
March	Scoop—submitted	September	Celtic Knot
April	Beads of Courage—6 sub	October	Snowman
May	Goblet— 9 submitted	November	Inside Out
June	Natural Edge- 7 submitted	December	Silent Auction Item

The following sponsors give generously to Tri-State Woodturners and we want to encourage members to support them generously



5824 Brainerd Rd., Chatt. TN 373411 + (423) 710-8001



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THE WOODTURNERS CATALOG

www.woodturnerscatalog.com +(800)551-8876

Treasurer's Report

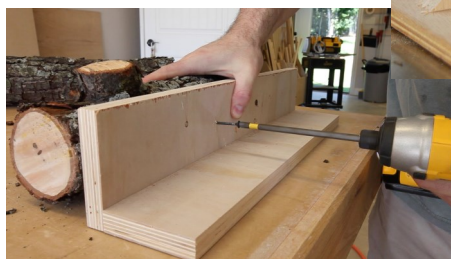


The Web

Income:	653.00
Workshop	600.00
Snacks	13.00
Dues	40.00
Expenses:	2,5050.00
Ed Langham Memorial	100.00
Demonstrator	1,800.00
Lodging	250.00
Facilities rental	140.00
Snacks	50.00
Quarterly rent	210.00
Ending Balance	3,457.04

Recently an email arrived with a picture of a mangled hand due to cutting a round log on a bandsaw unsupported. The man had to have six stitches and learned a valuable lesson—Never cut round things on a bandsaw without them being supported.

Several club members have since posted suggestions for making an appropriate jig. If you need suggestions



to make a jig, google "jig for cutting logs on bandsaw" and you can pick up some ideas.



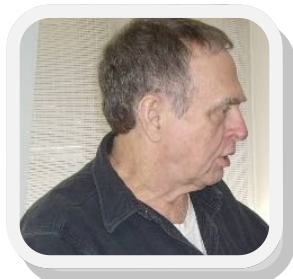
TURNING SOUTHERN STYLE

SEPT. 21–23, 2018

DALTON, GA

Distance is no excuse for not attending this Symposium as it's only 30 miles from Chattanooga. In one week-end you can gain a wealth of information on turning. This symposium is just around the corner. If you have not yet registered, now would be a good time to do so. Go to <https://www.gawoodturner.org/symposium/>

Free personalized help in Turning



Ed Lewis has been turning for 42 years and has graciously offered to open his shop on Saturday mornings to help newbies. This is as good as it comes. Ed is not only skilled as a turner but an excellent teacher. Many TSW have gained valuable lessons from him over the years to where they are now very proficient. Call Ed at (423) 344-7295 or talk with him at the TSW meeting Sat. This is an official function of TSW.

NEW MEMBER MENTOR: Are you new to wood turning or at least have an interest in it? TSW club is providing opportunity for you to learn from an expert turner who has provided instruction and guidance to many in the club and others. Ed Lewis opens his workshop on Saturdays and would love to help you. Contact him at (423) 344-7295. There is no fee for this instruction from an excellent turner & teacher.

If you are like many other turners you may want a meaningful way for your artistry to be useful and helpful to others. Beads-of-Courage is certainly a good way fit for that desire. The children going through very difficult treatment will be encouraged so much from the gift of a Beads-of-Courage box. This is our major project this year as a club and you are encouraged to get involved if you have not already done so by making a box to be donated.

Jim Dvorak who is coordinating this effort with Erlanger says, "Les and I delivered nine boxes to Erlanger Children's Hospital last week. A family that received one of our first batch of boxes told us how much they appreciated the box and the workmanship that went into it. The child loved his box and wanted another one."

The following is a message from Maggie, the Beads of Courage Coordinator, concerning the boxes issued the day we delivered them." "Such a hit today!!! Everyone loves them so much!"

Jim says, "We have to build more boxes. If each club member built just one box, we would be close to providing a box to each of the 84 patients in this particular department."



Note from Jan Langham

**Next TSW Meeting
Sat. Aug. 18 2018**

There will be items available at the TSW meeting, Sat. from Ed Langham's shop, for a donation if you are interested.

Being a member of AAW provides opportunity to receive weekly tips and videos regarding wood turning that you can trust. This is another benefit of joining AAW. If you are a member you can vote on the next board of directors by logging on to their web site. A bio of candidates is in the American Woodturner.

*Dear Woodturners,
Not only do you create invaluable works of art for posterity ... but you give lavishly to honor the work of others - like Ed Langham. Thank you for donating to this work as a missionary in Brazil. That's a lasting treasure as well.
Jan and Family.*

Interview with TSW Member

The Rev. Dr. John Dekle is the TSW member being interviewed this month. OK, confession, as editor of the newsletter I'm interviewing myself. I thought I would answer the same set of questions I've been using to interview others in the club.



My life has been involved in Christian ministry. I pastored a small church in WA state and in the four years I was there it tripled in size, we bought property and built a couple buildings. (Not hard to triple when you start with 29.) The next move was to work with Child Evangelism Fellowship for the next 39 years, with 35 of them in Hawaii where I also taught in a seminary for 25 years.

Working with wood and DIY projects have always been a way of life. In 1997 I bought a Delta lathe with no idea how to use it. Shortly thereafter a friend showed me how to glue up a segmented bowl and I started turning with that. Not until 2008 did I learn of an AAW club in Honolulu which I joined and from which I learned so much. The local turning club and always trying to do the Club Challenge have been some of my greatest influences in turning.

Since I began with segmented turning I appreciated all the time and effort involved to create these items, so the Indian Blanket vessel with 600 pieces in the



feature band stands out as pretty special for me. I think my wife's favorite is her vase

of bent flowers.

I enjoy turning different things so I don't think I have a favorite item. I like making small items as they can be completed quickly but larger items bring a certain satisfaction as well. It is challenging to be creative when turning pens and I look forward to experimenting with new designs to produce unique one-of-a-kind pens



I agree

that life is too short to turn punky wood. Although the smell is somewhat obnoxious I really like turning Milo,



which is an exotic Hawaiian wood with a beautiful deep dark brown color.

A Jet 1642 is my primary lathe. Thought has been given to upgrading to a larger lathe but I am

able to do most everything I want to create on this one. My first quality gouge was a Sorby 5/8" fingernail gouge, which has been sharpened to the limit. While Sorby tools have served me well, I have become pretty partial to Thompson tools and find I use them a lot of the time now. Besides a regular bowl gouge I tend to use a roughing gouge for turning pens and the Thompson detail gouge for fine details. I have no aversion to using a skew and find it very helpful in many situations. When working on hollow vessels my Jamison hollowing system is very advantageous.

(continued next page)

Being retired affords me time to turn much more often than when I was working full-time. Sometimes I may turn 5-6 days in a week and other weeks I may not get to the lathe all week. I do take Sunday off from turning and rarely turn in the evening. If I am at all tired I try to stay away from power tools. I do not have any aversion to selling items but I do not want to hassle with taxes etc. so pretty much just give away turned items. Turning is a hobby and I don't want it to become a business where there is pressure to produce items all the time.

I use a variety of finishes and keep experimenting with new things. For pens it's always CA, Boiled linseed oil, Beall buff and renaissance wax. I have used Walnut oil especially on things that will be used with food. I recently tried, for the first time, wipe-on poly and was quite impressed with the finish.

I would describe my shop (I prefer to think of myself more as a craftsman than an artist) as organized and conveniently laid out. My tools are stored in rolling tool chests on the left of my lathe, sand paper and other supplies between these tools and my drill press. To the right is my grinder with two CBN wheels and large band saw. A small table sits close to the lathe to put tools on and shelves in front of the lathe keeps supplies close at hand (they do get covered with shavings). The switch for my dust collector is on the shelf as well.

My workshop is in half of my extra large garage and other tools and benches are strategically situated. While there are MANY jigs hanging on the walls one item I use constantly is my "go to stick". It's the handle of a golf club with a rubber tip that helps me reach things that fall behind the lathe.



For a newbie I suggest you work with a mentor to learn correct methods from the beginning. Don't try to collect a lot of wood. Hey, it grows on trees". Be selective and turn what you have before

gathering a lot more that will crack and become fire wood. Learn to sharpen tools and work at turning with sharp tools. They will improve the finished product. Maybe one other thing, try new things. The Club Challenges are designed to push us a little, to stretch us, and in so doing we develop new skills by expanding our horizons. For more experienced turners I suggest you do the challenges but let it be a challenge. If the challenge is to turn a bowl don't do one like you've done before—try something unique.



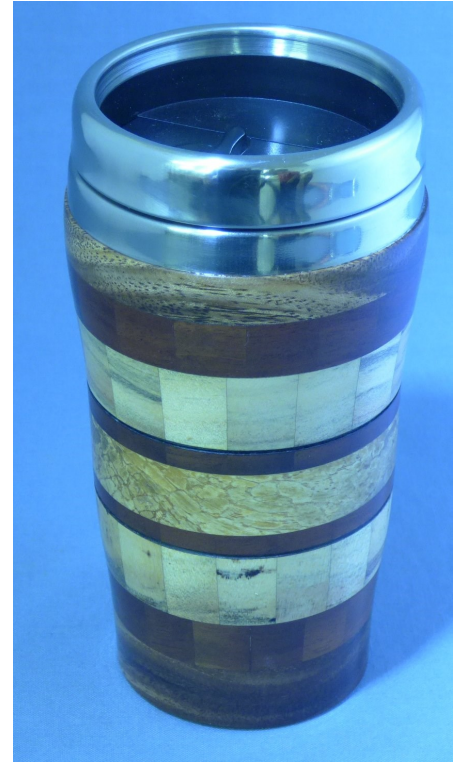
Club Challenge for July - Utilitarian

Bev deYampert—Walnut →
wood burned toothpick holder

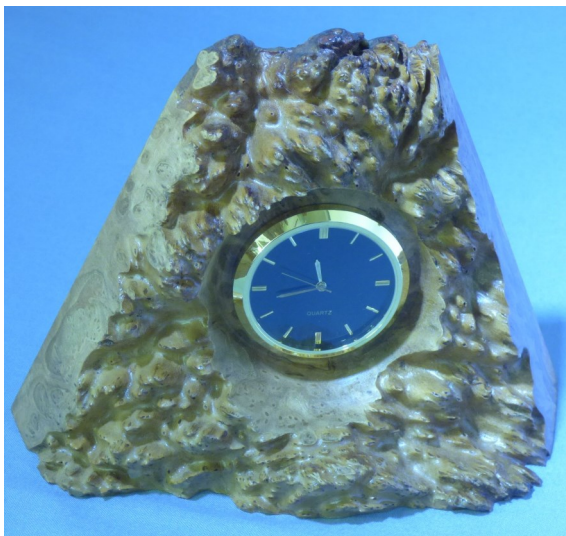
Charles Jennings - Curly Red
Oak & Maple combo salt/
pepper & Eucalyptus Burl
mantle clock ↓ ↓



John Dekle—Hawaiian
Segmented Mug , 99
pieces Hawaiian wood ↓



Charles Jennings— 4
ice cream paddles (3
Tulipwood,1 Rose-
wood & 1 Tulipwood
pizza cutter ↓ ↓

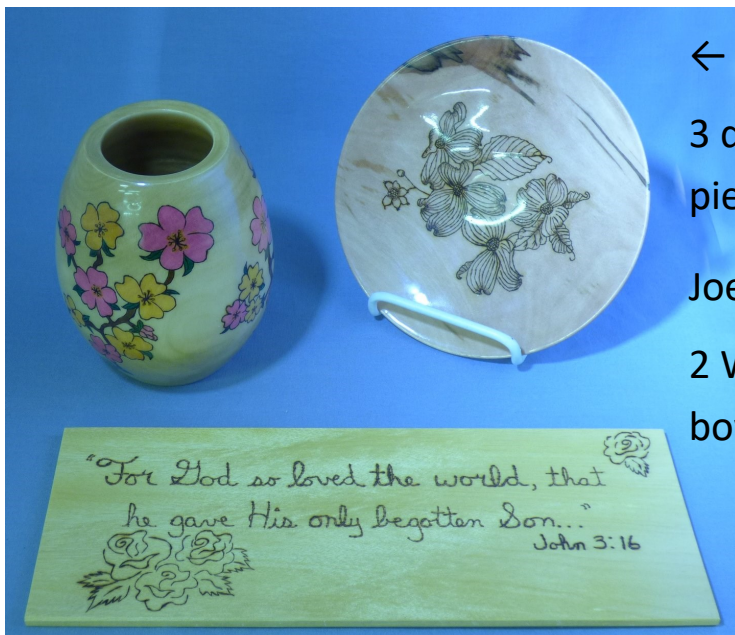
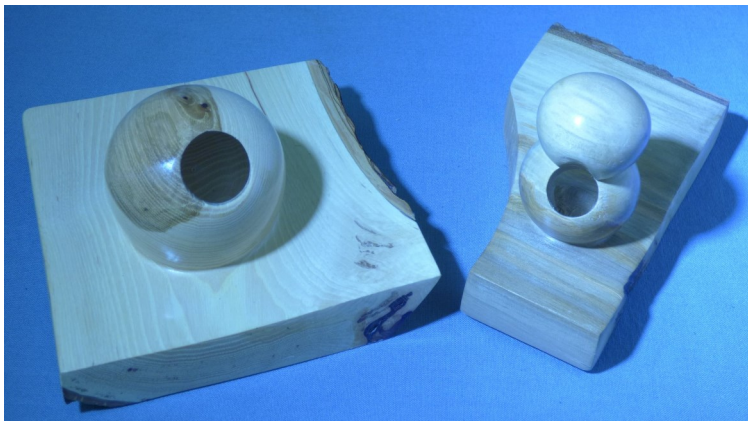


Club Challenge for July - Utilitarian



↑ Jerry Bowman Sycamore tissue box & Maple Ulu ↑

Don Moore— Maple ↓ emerging Pencil holders + Jim Dvorak—Pear ↓ ladles & baster



← Jean Price

3 dogwood pieces burnt

Joe Price

2 Walnut bowls →



Show, Tell & Learn - Instant Gallery



3 Beads of Courage boxes
Made by Don Moore from
Pine and Ambrosia Maple

John Dekle made this
Cedar handled magnifying

Notice: If you did not bring your Club Challenge last month bring it to the meeting August 18 and let John know it was for last month's challenge.



Show, Tell & Learn - Instant Gallery

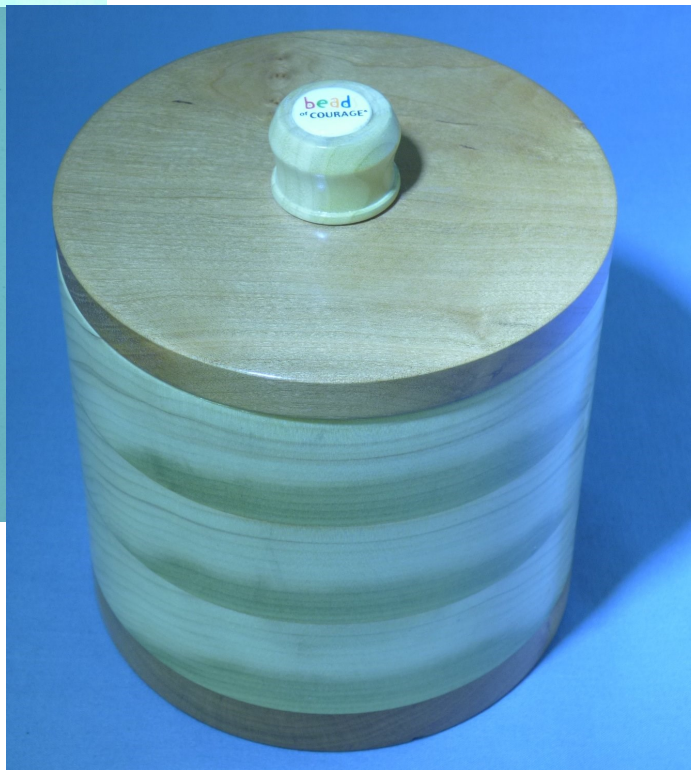


2 Beads of Courage boxes made of Walnut wood created ← ← by Jerry Bowman

Would you
Make one
& encourage a
Kid?



20 more pens for the troops ↑ made by Jim Dvorak and another Beads of Courage box made from Poplar & Cherry →



Multi-Axis Turning - Horais

Turning Spirals on a Lathe

Brian Horais, Knoxville TN

Introduction: Many turners develop their skills by turning round shapes (bowls, vases, etc.) but then find themselves looking for new challenges. I suggest that they should try off-axis turning, specifically a 3-point off axis turning method that produces eye-catching, twisted spiral shapes on a lathe. Several twisted spiral examples are shown below.

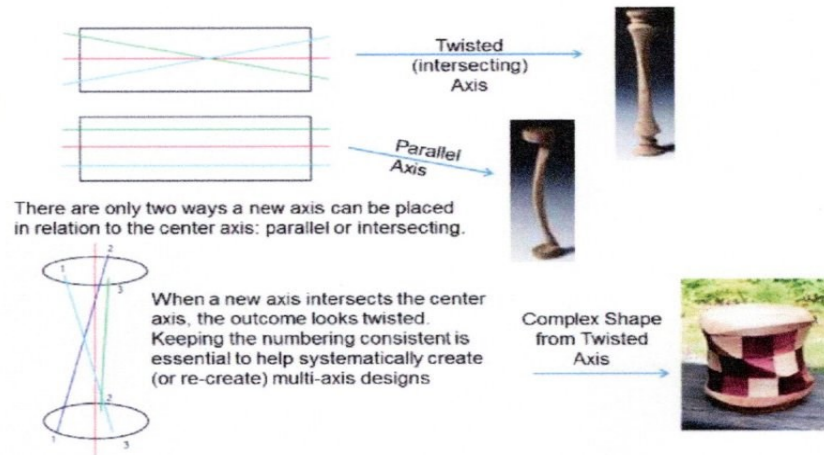


Examples of Twisted Turnings Using the 3-Point Off-Axis Method

This handout introduces wood turners/woodworkers to the world of off-axis (also known as multi-axis) wood turning. Demonstrations shown in this tutorial use a 3 inch by 3-inch block of wood approximately 7 inches long. The wood is turned to a cylindrical shape and tenons are added on each end. The ends of the cylinder are then marked with three offset points numbered for easy reference and the offset turning sequence is followed as described below.

Design considerations: The 3-axis offset turning technique offers a unique capability to impart a twist to your designs. This can be tailored to twisted objects, such as peppermills, or adapted to tapered vases. It can also be combined with cylindrical shapes and carved surfaces to generate a wide variety of new shapes that will have your viewers saying 'how was that done?' This method uses three intersecting axes to produce a unique twisted shape, as shown in the figure below.

Multi-Axis Turning - Horais



Wood/Materials: Developing the skills needed to generate pleasing off-axis twisted shapes takes some practice to become comfortable with 'turning air', described later in the tutorial. Although the technique works well with a variety of woods (maple, walnut, dogwood, mesquite), it is best to begin your practice with less expensive wood such as pine or poplar.

Tools:

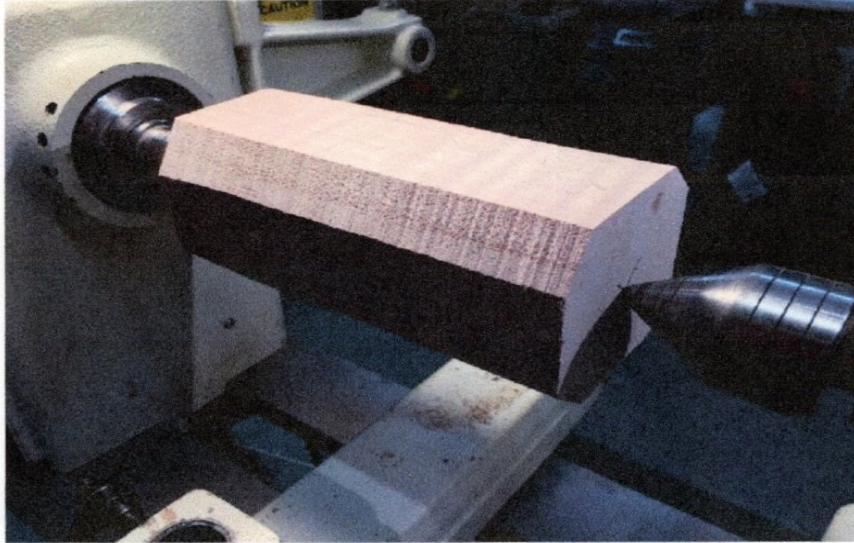
- The principal carving tool is a roughing gouge, preferably at least 1-inch wide.
- Marking the end points can be accomplished with a center punch.
- An angle measuring device will be needed to mark the 120-degree separation of the pivots. Finishing can be done with sandpaper of choice – the author recommends Abranet mesh and a flexible sanding sponge to accommodate the curved surfaces.
- You will also need a 5/8 inch, 4-blade drive end.

Steps:

Step One – turning the cylinder

Choose your favorite block of wood. It should be approximately 7 inches long and over three inches in diameter. You can trim the edges as shown below before turning a cylindrical shape.

Multi-Axis Turning - Horais



The basic Turning Block, with Edges Trimmed on the Bandsaw

The wood I am using here is maple, a nice wood for a finished product. When beginning you should practice with pine or poplar to refine your technique. Once you have turned a cylinder (approx. 3 inches in diameter), turn a tenon on each end (approx. 2.5 inches in diameter) just wide enough to be able to hold the block with a 4-jaw clamp throughout various stages of the fabrication process. Your block of wood should look like this with the tenons (image here of spalted black gum).



Turned 3-inch Cylinder with 2 ½ inch Diameter End Tenons

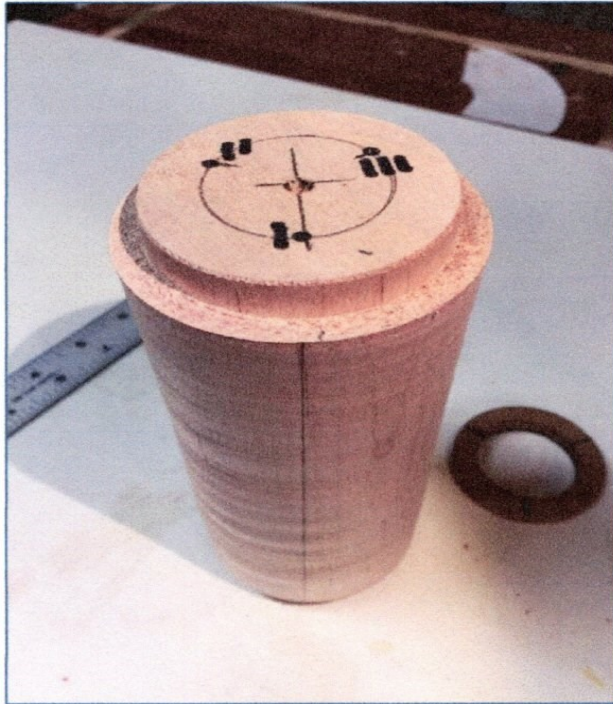
Step Two – Preparing the Offset Points

The three off-axis points are measured and marked on one end of the cylinder with a center punch and then numbered to make sure the proper sequence is used. The marked end of the cylinder should look like the image

Brian Horais, AAW # 50641

Multi-Axis Turning - Horais

below. Draw a straight line to the other end of the cylinder and mark three pivot points that are aligned with the top three. Number them to correspond to the top numbers. This will be useful when keeping track of the offset axes. Offset of the pivot points from the center should be less than $\frac{1}{2}$ of the radius of the cylinder to keep the 'wobble' controlled. I use a small (5/8 inch), 4-blade drive bit to ensure that the drive has a good grip on the offset base. A larger drive would not engage the end of the stock fully due to the tilted angle of the base when doing the offset centers.



Marking the Offset Pivot Points



5/8 Inch 4-Blade Drive Center

Step Three – Turning the Twist

The numbering schemes on each end of the cylinder provide a means to select the three offset axes and ensure that they are used consistently when turning the three surfaces of the spiral. The sequence of connection points for the headstock (drive end) and tailstock are shown in the table below. The twist direction can be reversed by making the 'Tail' Sequence 3:1:2.

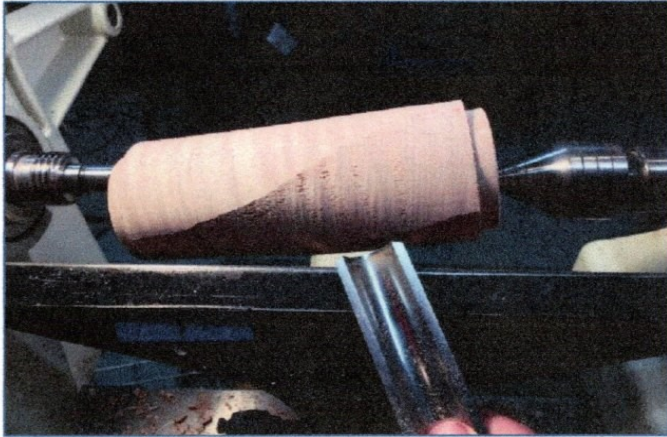
Turning sequence for the end points:	
<u>Head</u>	<u>Tail</u>
1	2
2	3
3	1

The offset Turning Sequence

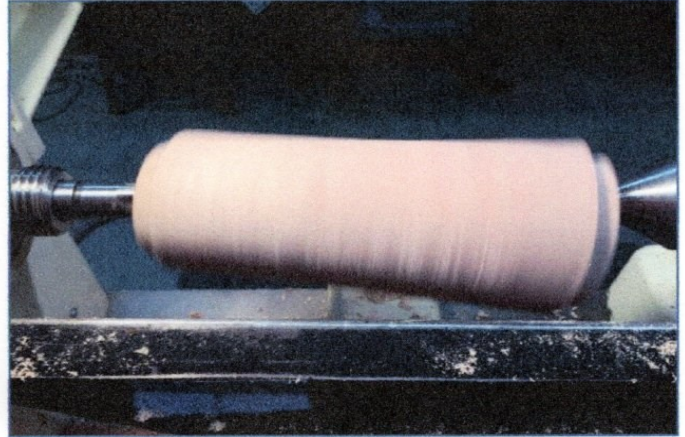
Brian Horais, AAW # 50641

Multi-Axis Turning - Horais

With the cylinder securely captured between the drive and tailstock on the first axis (head 1, tail 2), adjust the rotation speed of the lathe until there is noticeable vibration (600 to 800 RPM) and then back off the rotation speed slightly. It may surprise how much vibration a relatively small, off center, piece of wood can generate. A roughing gouge is used to turn the spiral surfaces and requires some care because the tool is only cutting wood for 1/3 of each rotation. Be sure to 'ride the bevel' when cutting with the roughing gouge.



Roughing Gouge Makes the Cuts

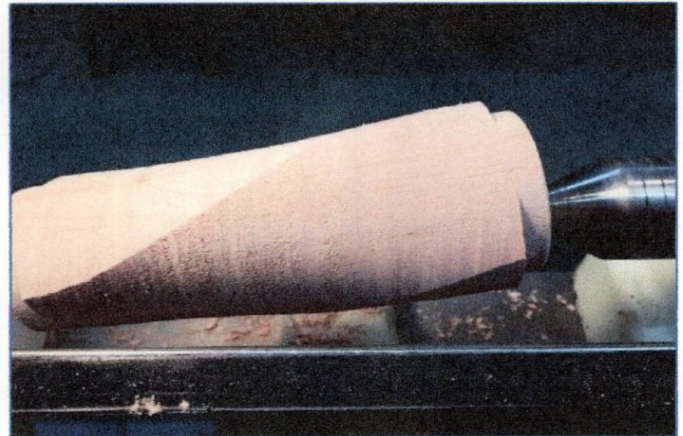


'Turning Air'

The remaining 2/3s of each rotation are what is known as 'turning air'. Engage the roughing gouge on the tool rest, away from the rotating shape (it will appear to be wobbling) and slowly advance the cutting edge of the tool until it begins to cut wood. Smaller cuts are recommended because too large a cut will cause the tool to bounce resulting in deep gouges. Work back and forth on the cylinder shape turning a depressed curve in the shadow of the spinning shape. Keep turning until you have achieved a spiral cut as shown in the figure below.



Partial Cut of Spiral Surface



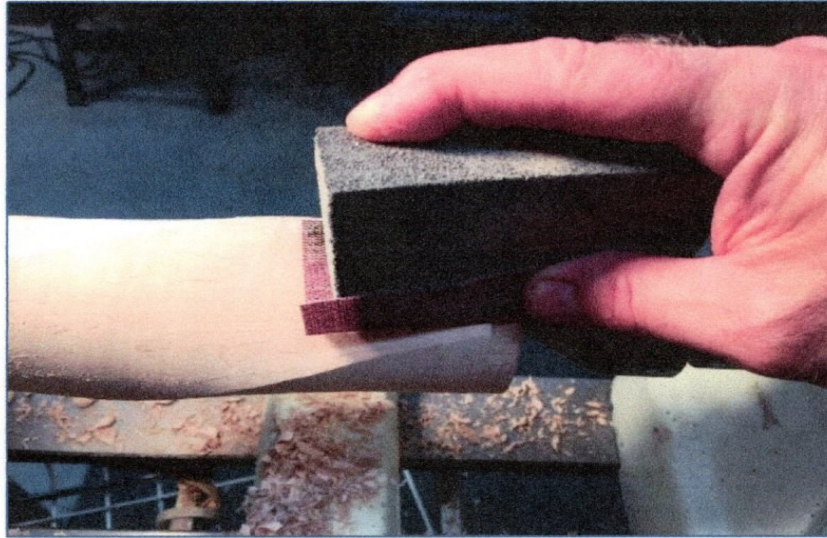
Finish Cut of Spiral Surface (Note Tenon)

The depth of the cut is adjusted by cutting the same amount into the tenon on each end as shown. You will know when you have removed enough material when the spiral edges begin to appear between the three surfaces. Using a very light finishing cut will provide a smooth surface with a minimum of cut marks.

Multi-Axis Turning - Horais

Step Four – Sanding in Place

Once you have progressed through the three offset centerlines and produced good spiral edges with fairly smooth surfaces, it is time to sand the surfaces to remove any tool marks. Sanding is done with the LATHE OFF to make sure the spiral edges are maintained. It is easiest to sand the three surfaces by hand if you remount the shape on the real (not offset) center. I like to use Abranet mesh sanding material with a flexible sanding sponge underneath as shown.



Sanding with LATHE OFF Using Abranet Mesh and Sanding Sponge

Sand in the direction of the grain, taking care not to sand away the spiral edges. You should practice with scrap wood before trying the overall technique on good wood. Keep your practice shapes to refer back to when deciding about twist direction and surface smoothness.

Additional Applications of the Technique

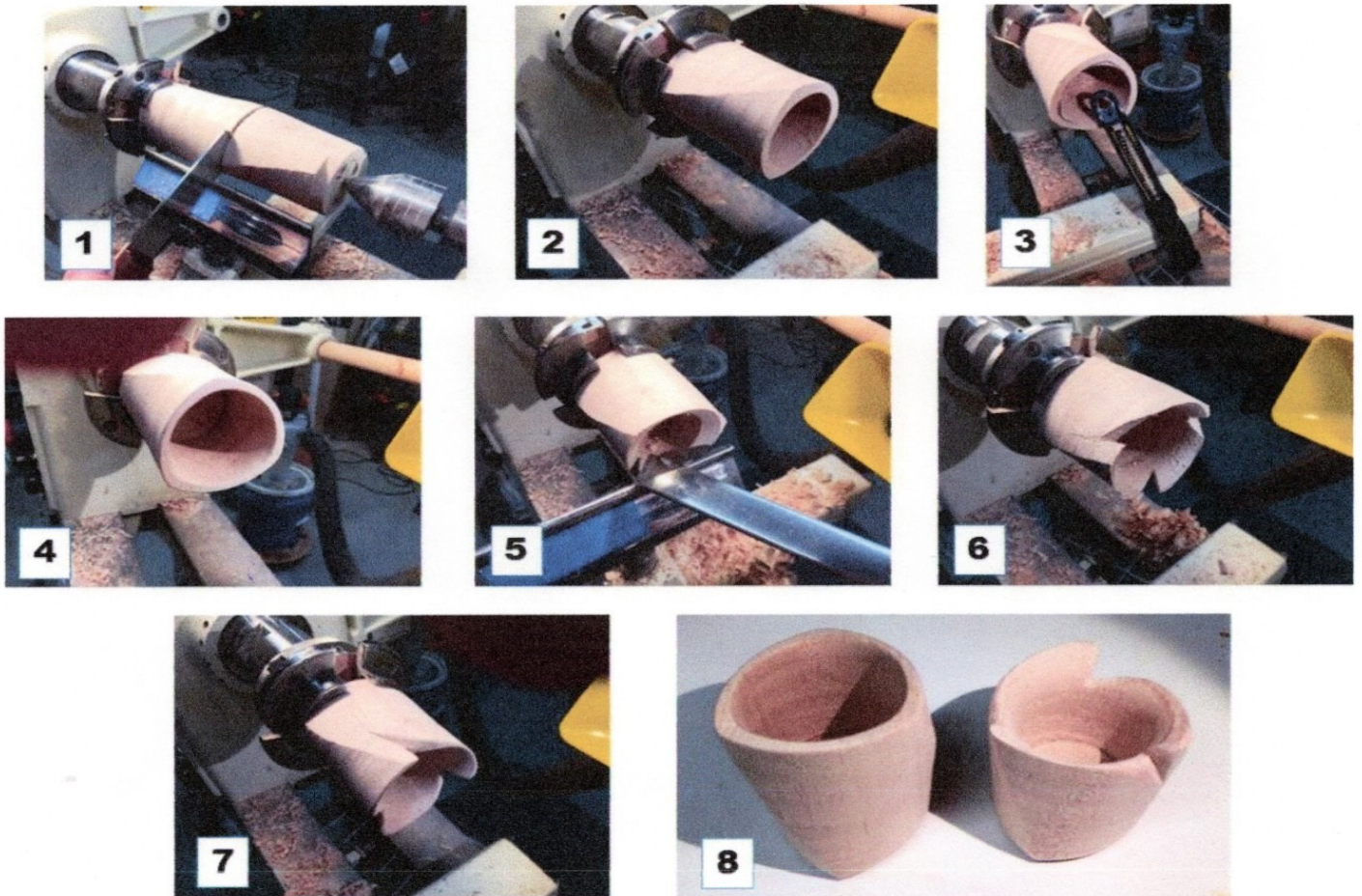
Once you are comfortable with the process and the technique of 'turning air' you can expand to some twisted shapes, such as cups or vases. You can also vary the overall shape by starting with a tapered cylinder or by turning a twist on part of the cylinder while retaining the cylindrical shape on the remaining part of the cylinder. Some examples are shown below.

Multi-Axis Turning - Horais



Two Cups Turned from the Basic Twisted Shape

The technique can also be expanded and enhanced by opening up the inside of the cylinder and carving the top section as shown. An image sequence is shown below of the steps taken to produce these two turnings.



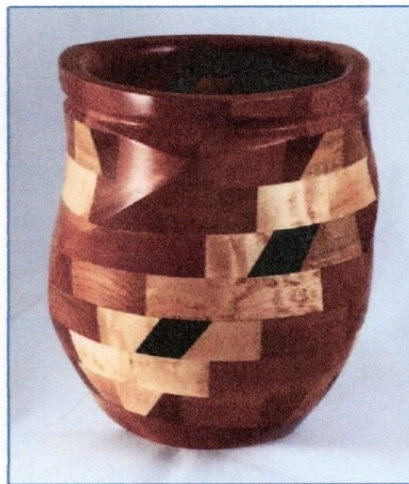
Brian Horais, AAW # 50641

Multi-Axis Turning - Horais

I like to use Microplane carving tools, shown below for the carving and then finish the turnings with sanding.



Once you get comfortable with the 3-point offset turning procedure, you can combine it with segmented turning and produce unique shapes, with the segmented design tailored to the twist.



Enjoy!

Brian Horais, AAW # 50641

Multi-Axis Turning - Horais

Sources of materials:

Abranet sanding mesh are available at:

- www.woodturnerscatalog.com
- www.woodcraft.com

Microplane carving tools are available at:

- www.highlandwoodworking.com
- www.woodworkingshop.com

5/8 inch 4-blade drive is available at:

- www.woodturnerscatalog.com
- www.woodcraft.com

Suggestions for further study:

Tutorials on my website: www.horais.com

Barbara Dill's website: www.barbaradill.com

Brian Horais
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