

Project Tutorial Featuring compatibility with nearly all CNC Machines

It is our pleasure to provide our customers with fun and useful projects to enjoy!

Vectric Project Tutorial www.vectric.com

Compatible with Current Version of:

Aspire /

Sample Carved with:

ShopBot Buddy

PRSalpha BT48

www.shopbottools.com

ShopBot®

arve

Beef, Fish and Poultry Trivets

Designed for Vectric[™] by Michael Tyler

Here is a handy set of three heat-resistant table or countertop trivets representing three of the carnivorous food groups -Beef, Fish and Poultry!

The samples were finished with heatresistant paints in contrasting colors (silver and black) but you could opt to forego the two-tone and just use one color paint instead. The project files are intentionally kept separate, but you can create your own multiple layout for creating as many trivets per board, as you wish.

The dimensions of each trivet are about 9.5 " diameter x 1.25" tall.



Main items you will need:

1) The Project Files (included):

- Beef_Trivet_GRID.crv
- Fish_Trivet_GRID.crv
- Poultry_Trivet_GRID.crv
- Universal_Trivet_BASE.crv
- **2) Boards with these dimensions:** Each Grid: 0.75 "x 9 "x 9 " (x3) Each Base: 0.75 "x 11 "x 11 " (x3)

3) Heat-resistant paint for the grid inserts (I used black and silver), stain and clearcoat or paint for the bases

4) Small smooth foam roller or foam cleaning pads (magic eraser type) for applying paint on grid flat surfaces

5) A Dremeltype rotary tool with assorted sanding wheels and bits to sand small details and speed up preparation for



and speed up preparation for finishing.

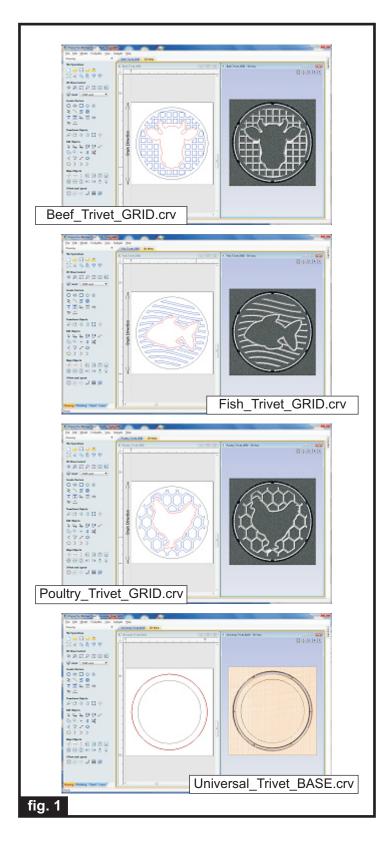
CNC Bits used for the Sample:

0.25" Down-Cut End Mill (EM) 60° V-Bit

Beef, Fish and Poultry Trivets

STEP 1 - Open and Review the Project Files

Start your VCarve Pro or Aspire software and open the project files. (fig. 1)



Carefully review all the toolpaths and make any necessary changes to suit your particular bits and machine. The toolpaths are currently set with feeds, speeds and pass depths that were used in creating the original sample. Please don't use them directly until you review them for your own setup.

You can edit the tools and change the settings to your own preferences and requirements. It is very important to recalculate all toolpaths after making any edits/changes.

Once you have recalculated for your own machine and bits, reset the preview, then preview all toolpaths again to visually verify the project outcome on-screen.

STEP 2 - Run the Project

When you are satisfied with your settings, save the toolpaths to the appropriate Post Processor for your machine. Place your material on your machine bed and proceed to run the file(s). (fig. 2a, 2b)

Machining Trivet Grid





Machining Base

(cont.)

Vectric Project Tutorial www.vectric.com

Beef, Fish and Poultry Trivets

STEP 3 - Separate Parts from Material and Sand

Separate the parts from the boards with a utility knife or hobby saw. Sand the components to remove the tabs and undesirable toolmarks. (fig. 3)



STEP 4 - Finish Application

Apply your choice of finish. Here's what I used on the samples made from Select Pine: (fig. 4a, 4b, 4c, 4d, 4e):

• Applied Rust-Oleum Traditional Cherry stain on bases, then several coats Krylon acrylic clear. Left center interior portion bare wood for glue-up later

• Applied heat-resistant paint. I did a two-tone...silver spray first, then dabbed on black BBQ paint onto the flat grid surfaces and outer edges with pieces of foam pads (magic eraser type). You can just apply one color overall instead of two-tone (it's easier/quicker).

> Applied stain and several coats clear. Left center bare for glue later.





Applied silver heat resistant paint to grids

Used cut up pieces of foam from a magic eraser type cleaning pad. Used factory-flat surfaces to apply paint.

fig. 4c





Spread black BBQ paint in a layer on a paper plate, then dipped the foam pad into the paint and dabbed onto the flat surfaces and outer edges of the grid inserts.





STEP 5 - Assembly

Glue the grid inserts into the bases with the grain

fig. 5

direction perpendicular between the inserts and the bases. You could opt to screw the inserts in from the bottom of the bases, if you wish. (fig. 5)



IN CONCLUSION

Apply self-stick cork or felt on the underside of the trivets to protect table surfaces. I hope you enjoyed making your heat-resistant Beef, Fish and Poultry Trivets!

Happy Carving!

Nichael

(cont.)

Vectric Project Tutorial www.vectric.com

(cont.)

Materials Source Page

• 3M Radial Bristle Discs from <u>www.mcmaster.com</u>

(stack 3 discs at a time on your rotary tool mandrel) 80-grit: part # 4494A19 220-grit: part # 4494A18



Items Purchased at Home Depot[™] or Lowes[™]

- Rust-Oleum Traditional Cherry Stain
- Rust-Oleum Black BBQ (brush-on) and Silver (spray) heat-resistant paints
- Disposable Brushes and Paint Rags





Heat-Resistant Black Brush-on





Heat-Resistant Silver Spray (would have preferred brush-on but store was out)



Foam "Miracle Cleaning Erasers" from WalMart™



Krylon Clear Acrylic Spray from WalMart™

NOTE: Direct weblinks and prices were valid at time of this writing, but can change at any time. If links don't work, then try visiting the website's home page and do a Search for the item to get directed to a current/valid page.

Additional Resources

RESOURCES...

There are numerous resources for Vectric software owners to make their experience with their products more enjoyable. The Vectric website includes video tutorials and more, to provide a good overview of the software products and how to use them. Please visit the Support page for a complete listing of available resources for you.

Vectric Support: http://support.vectric.com/

Vectric User Forum

Every owner should join the Vectric User Forum (http://www.vectric.com/forum/) where fellow users share their experience and knowledge on a daily basis. It is a FREE service that you will surely appreciate. A handy Search Feature helps you find answers to any questions you may have. There are Gallery sections as well, where you can post and view photos of projects created with Vectric software.

IMPORTANT: Before outputting any toolpaths you should carefully check all part sizes and the material setup to make sure they are appropriate for your actual setup. You should also check and re-calculate all toolpaths with safe and appropriate settings for your material, CNC machine and tooling.

Terms of Use: This Project and artwork is provided on the understanding that it will only be used with Vectric software programs. You may use the designs to carve parts for sale but the Files and/or Vectors, Components or Toolpaths within them (or any derivatives) may not be converted to other formats, sold to, or shared with anyone else. This project was created by Michael Tyler and is Copyright 2016 - Vectric Ltd.

The trademarks, service marks and logos used and displayed in this document are registered and unregistered Trademarks of Vectric and others.