September 2017 Meeting - Andy Coates

Andy started by telling us that he was not going to tell us what he was doing. It would be more about the finishing than the turning. He mounted a blank about 2" thick and 9" diameter between centres (steb drive and ring centre). In his words the blank was a grotty piece of walnut. It still bore evidence of the chainsaw.



He used a new M42 steel gouge with a long fingernail grind. He thinks that this steel is dramatically better.

He turned an ogee shape with a foot for a base. The tenon is sized for your own chuck and is slightly concave. Whilst still mounted he cleaned the top edge to a flat, the first 10 or 15 mm. and slightly rounded the base into this flat.

The base was then mounted onto the chuck and the surface cleaned into about one third from the centre. Then he turned out a shallow recess from this point to about 1/8" from the edge. The edge was then finished.





The first part is done. Colouring came next. Using cheap disposable plastic cups, wooden stirrers (as per Costa Coffee) and acrylic colours. Andy says quality paint pays. He used three colours plus titanium white. On this occasion he used Yellow, Paynes Grey and an Orangey Brown. Put about 1" of paint in the bottom of each of 4 cups. Add, SPARINGLY, demineralised water a drop at a time and stir until the paint is the consistency of single cream. It will run smoothly from the stirrer. Mix all before starting.

Next add a drop of silicon lubricant to the colours (not the white). The aim is for the white to drop to the bottom and the colour to stay on top.



Take a clean, empty pot. Put some white in and then add some of the colours. Don't mix just let it swirl around. Protect the underside and edge of your turned piece. Then with the piece upside down place the top of the cup in the recess you have turned. Carefully turn the whole thing upright and move the cup around the whole recess. The paint will leak out onto the surface in a multi-coloured format. Let the colour run where it will.



Take a cooking style blowtorch (nothing more powerful) and heat the surface by playing the flame in the air above the paint. Cells form in the colour and the white is raised. These cells are known as Rayleigh-Bénard cells and are formed by convection. Be careful not to overcook. Try not to leave too long before heating.

It will then take about three days to dry. The photo (right) shows the dried piece ready for final turning and finishing.





Experimental cell patterns on canvas, Andy developed his techniques over some considerable time and cost. The technique requires an understanding of the pigment weight to achieve the correct layering and cell formation. Andy had calculated this at the beginning of his experiments, however once he understood the 'feel' of his mixes he was able to replicate the technique through experience alone.

A sample of bowl showing the use of the cell forming technique.







Andy then turned a box with a cell decorated lid.

He took an offcut cylinder of pine, turned a tenon on the end for mounting and put in a reference point to allow for later remounting.

He mounted the cylinder and turned a tenon on the other end. He then parted off about one third of the way down.

The diameter of the tenon was transferred on to the face of the base and then it was hollowed at a slight angle to the depth of the tenon. Testing the fit to hold the top tightly. Hollow the interior. Clean the interior. Don't abrade the recess. Mark the chuck and the piece for realignment. Mount the lid to take some wood out. Leave enough depth for a recess in the lid. Finish the inside of the lid.

Remount the base as per the marks made earlier. Put the lid on and turn off the tenon. If we finish here we have a boring box. In practising for the first project Andy had ended up with a quantity of solid acrylic paint on canvas. This could easily be made up on purpose using the same process on thin mdf or ply. Cut from this a circle on the band saw. Using double sided tape place on top of the lid and GENTLY turn it to size. Turn a

recess in the lid to take the disc. Fit the disc. Tidy with the tip of a skew. Gently bead over the edge of the lid. Clean off any pencil marks with sandpaper. Remove the lid and sand top to fit. Mount the base and turn off the tenon GENTLY.



A very different and interesting evening which nicely demonstrated the almost scientific methods applied to this type of art. Andy's inclusion of this technique to his turned work has been popular with customers and gave all food for thought, Thank you Andy.