Calendar Of Events

There will be no formal meeting in February. The MWG will host an area at the Woodworking Show on February 13, 14, and 15th.

The February 2015 luncheon will be at 1:15 PM at Jimi’s in Royal Oak on the 26th.

The March 2015 meeting will be our annual Showcase Of Skills. The meeting will be held at the TechShop on Saturday, March 7th.

The March 2015 luncheon will be at 1:15 PM at Jimi’s in Royal Oak on the 26th.

The April 2015 meeting will include a presentation on Windsor Chairs by Jim Crammond. The meeting will be held at the TechShop on April 12th.

The April 2015 luncheon will be at 1:15 PM at Jimi’s in Royal Oak on the 23rd.

The May 2015 meeting will feature a round robin of Guild members presenting topics where they have a noted skill and expertise. The meeting will be held at the TechShop on May 17th.

The May 2015 luncheon will be at 1:15 PM at Jimi’s in Royal Oak on the 28th.
By the time you receive this newsletter, Christmas will be behind us and the beginning of the New Year will be here.

For those of us who attended our annual Christmas meeting on December 14th, we were treated to a very nice luncheon by the ladies of the Michigan Woodworkers Guild. Special thanks go out to Sally Rigstad, Connie Wolf, Carolyn Gayde, Patty Boulard and Michelle Mills.

Following the luncheon, Jerome Burns, showed the Michigan Woodworkers Guild members some of the techniques that he uses in photography. Jerome gave his advice on equipment and how to preserve the photographs.

Starting the New Year, January 11th will feature Mike Belzowski presenting on veneer techniques. This meeting will take place at the TechShop.

Instead of a February meeting, on February 13th, 14th and 15th, the Michigan Woodworkers Guild will have a booth at the Woodworking Show. The location of this show will be at the Suburban Collection Showcase on Grand River in Novi. It has been quite a few years since we were at this show in Novi.

Our annual Showcase of Skills will be held at the TechShop on Saturday, March 7th. It is time to start those woodworking projects. With all the new woodworking tools you received this Christmas, there should be plenty of woodworking projects ready for March. Even if the woodworking project is incomplete bring it anyway.

Happy New Year and hope to see everyone at the TechShop.

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President’s Corner
by John Sanchez

MWG Meeting Review
DIY Photography Techniques
14 December 2014

Guest speaker Jerome Burns provided the December holiday meeting program. Jerome is the Manager of audio visual services and adjunct professor at the College for Creative Studies in Detroit. His topic, do-it-yourself photography, provided a quick tutorial of photography fundamentals and reviewed equipment and methodology applicable to documentation of our woodworking projects. In addition to Jerome’s current teaching activities, he has run his own photography business and spent nearly a decade as a Photographic Supervisor at Ford Motor Company. While he has years of experience with expensive professional photography equipment, the focus of his presentation was use of readily available equipment not requiring a large cash outlay. His objective was to install in us methods to produce photo quality worthy of our investment of time and materials in the beautiful objects we produce. He briefly reviewed the critical photographic parameters of aperture (f-stop), exposure time, detector sensitivity, focal length, and their interplay to produce a photo result. He then recommended desired camera features, and demonstrated the set up of a simple home studio to provide clutter-free background and controlled lighting for producing photos which are adequately expressive of the beauty of our wood art. He also presented methods for long term preservation of digital photo files.

With today’s modern point and shoot cameras, including cell phone cameras, many of us have forgotten that camera settings for shutter speed, lens aperture, and ISO (film or digital detector sensitivity) are critical to capturing excellent photos. Jerome admonished us to not fear manual control of the camera! Using an “exposure triangle” diagram, Jerome gave a good review of these parameters and recommended we set them manually when photographing our work. One leg of the triangle is aperture setting (expressed in “f-stop”) which controls the size of the “hole” letting light through the lens and onto the detector. “Aperture” controls in part the amount of light hitting the detectors and, due to the physics of the optics involved, determines the depth of field (DOF) in a photo. A narrow aperture (large f-stop number) produces a large depth of field such that objects are in focus at most all distances from the camera, and a large aperture (small f-stop) results in a narrow range of focus such that only a single object, or part of an object, is in focus while
other parts, such as foreground and background, are intentionally not in focus. Another leg of the triangle is shutter speed, which determines how long light impinges on the film, or in today's digital realm, how long the digital detectors integrate the impinging light. Slow shutter speeds result in motion blur in a photo, whereas fast speed results in “stop action” of moving objects.

For a quality photo, aperture and shutter speed are not independent settings, due to the third leg of the exposure triangle, ISO. ISO (from the International Organization for Standardization) is a measure of a photographic film's sensitivity to light, or more relevant today, the sensitivity of digital imaging systems, specifically the electronic detector in a camera. In the good old film days, one “set” ISO by using a selection of film type (slow film being less sensitive than a fast film), but today one can set this parameter on a digital camera, within limits of the type of detector in the camera. There is a trade off in ISO as well. Lower ISO settings give the best color and low photo “noise,” while higher ISO settings sacrifice some color rendition and produce more photo noise. This “noise” in digital photography is something akin to “snow” on our old analog TV sets. Higher ISO settings can be used in lower light conditions without flash, which is desirable in some circumstances. Jerome recommends using lower settings for our woodworking object photos, to have less “noise” and better color, albeit at the expense of needing more light or lower shutter speeds.

For a given ISO setting the amount of light energy integrated by a detector during the “exposure” (open shutter time for film, integration time for digital photos) must fall within a certain range to produce good image quality. Thus, if one increases shutter speed to avoid motion blur, say resulting from handheld camera motion or a vibrating tripod, the aperture must be opened further so that the total integrated light is the same. Thus stopping motion can force shorter depth of field at a given ISO. If one shoots with limited light, as in a basement shop, the shutter speed must be reduced (to integrate more light) possibly giving rise to blurred photos due to motion. There are complex tradeoffs between all of the possible settings that must be resolved to attain optimal results. Modern point and shoot cameras electronically measure available light, and lacking parameter guidance from the user, automatically set all of the parameters to get best average image quality for a given situation, all while auto focusing the lens. Those selections may not be best for a desired result when shooting photos in our shops. For instance, when I take quick point and shoot construction photos in my shop I often get undesirable results, such as motion blur or too narrow of a depth of field to capture all of the features of the construction method.

For these reasons Jerome recommends that we avoid point and shoot modes when taking pictures of our art, instead overriding the modes and setting the parameters to best suit our needs. He also recommends using cameras which allow larger apertures (smaller f-stops) to capture more light in dim situations, as in certain home photo studio set up. Also desirable is a camera supporting manual white balance adjustment. White balance is the process of compensating for illumination source, so that objects that appear white in person are rendered white in your photo. Proper white balance has to take into account the "color temperature" of a light source, which refers to the relative warmth or coolness of white light. This is important when adjusting for the chosen light source in the home studio set ups demonstrated by Jerome. And finally, he suggests cameras which support a zoom lens, providing roughly a 24-70mm zoom range. One should avoid using the lower end of this scale, to avoid “fisheye” type distortion of the objects. Jerome indicated that a modern camera exhibiting all of these desired features may only cost $300-600. It does not have to be a $1,000 or more investment.

Good controllable digital cameras also let one choose the encoding format to be used to store the images on the camera, and eventually on the computer. Most digital cameras automatically provide photos in the JPEG (Joint Photographic Experts Group) format, which is an encoding algorithm that compresses a digital image to save storage space with a minimum of image quality degradation. However, there is always some degradation (perhaps unnoticeable in
some situations), and the encoding can prevent later correction of image defects. Better quality digital cameras will let one choose the RAW format, which preserves all of the digital information collected by the detector, recording a larger dynamic range (blackest blacks to whitest whites), and allowing for post computer processing to recover from some image defects. Jerome recommends use of this format, in spite of the resultant increase in photo file size. Photo processing software such as Adobe Photoshop can use the RAW files later to edit and improve images. The RAW images can then be recorded in copies with JPEG format to save archive space or send to others via email or web pages. While the full Photoshop software is very expensive, a simpler package such as Photoshop Essentials is adequate for most purposes. For archiving photos Jerome recommends using double backup onto external hard drives (two of them), one of which can be stored offsite in a safe deposit box. CD’s or DVD’s can become delaminated over time and are not safe for long term storage. USB (memory stick) drives are not reliable over the long term.

Once you have a good adjustable camera with an appropriate lens, you need a clean non-cluttered area (“shoot clean” as Jerome put it) to enable high quality photos of your painst work. A non-cluttered area with good controllable lighting to enable high quality photos of your work is required. Jerome demonstrated how to set up such a studio using readily available materials. He set up a folding table (a card table would work) surrounded by light reflecting surfaces. The surfaces were held up with simple 7ft long”1x2” poles set into 1-gal paint cans filled with Quick Crete. Inexpensive “A” clamps and other 1x2’s interconnected the poles and were used to hold up the surfaces. The background was a big sheet of wrinkle-free paper which swept down from the wall in a continuous stream all the way under the object of the photo. These paper sheets are available in larger sizes for large objects like furniture. Painter’s clip-lights, available at any hardware store, provided the illumination, but to avoid object shadows on the background, indirect diffused light was used. This was accomplished by the use of cheap white plastic shower curtains on each side of the object, with the light from the sides diffused onto the object through the curtains, and by bouncing another light indirectly off of the background sheet of paper. The resultant illumination of the object as it appeared in a readout of the camera was very professional looking. (Another desirable feature of a modern camera is a HDMI readout port to enable connection to a large screen TV for viewing of photos.) Jerome then showed how camera angle can be changed to accentuate different features of the object, and how ISO and shutter speed can be altered to produce a suitably bright image even under fairly dim lighting conditions. Light sources can be older incandescent bulbs, fluorescents, or even the newer compact florescent lights (CFL). The new LED lights, available in spotlight or floodlight form factors, provide an even greater range of control. LEDs have a broad color spectrum, approaching that of the Sun, and are more directional, allowing more controlled lighting. In any case, all the lights should be of the same type, and within type be of the same color “temperature.” This is because camera white balance mechanisms cannot suitably balance multiple color temperatures simultaneously.

Jerome did a wonderful job covering a lot of up-to-date photography instruction in a short meeting time slot. He has convinced me not to be lazy when it comes to manual camera settings. I cannot wait to finish my next project to try out these methods. My current techniques are pretty amateur with non-spectacular results. Jerome graciously offered to follow up on any questions we may submit via his contact info: Phone 1-248-506-1083 or e-mail jburnsphoto@gmail.com. Should you contact him, please thank him again for a wonderful program for our annual holiday meeting.

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For membership information, contact Bill Gayde at 25575 York, Royal Oak, Mi, 48067 or by phone at 248-543-3487 or by email at: williamgayde@comcast.net.

For name tags, sign up with Ed Stuckey at a regular meeting.
The Picture Gallery

The Self Serve Line In Operation

Dale Ausherman Recording Meeting