

Name: _____ Period: _____

Photoshop I and II

Notes from the **Opus Lighting System Demonstration by Ralph Portillo**

The difference between a **tripod** and **light stand** is the function, one is for the camera and the other is for a camera. The base of the light stand should always be spread and wide as possible. The knobs should only be turned finger tight in order to avoid stripping the screws. NEVER force the connections of any parts.

We have 3 monolights system

- The **monolight** - (mono-block or self-contained unit) all the power and functions are inside the head, the dials. The flash tube is what flashes to create a daylight effect. The flash tube is the most expensive part of the system, do not touch it ever, the oil on your hand can cause it to crack, \$200 to replace. Turn the system on, check the **umbrella**, you want a little light on the edge of the umbrella, adjust the edge of the umbrella. **Green** light indicates power, the **red** light indicates that it is ready to flash. **Adjusting the monolight setting:**
- **The far right dial** on the back of the moonlight is used to set the amount of power the flash receives.
- Just to the left you will see a dial to set the **modeling light** to get a preview of how strong the flash will be.
- The **reflector** (metal rim), surrounds the outside of the Mono-light. When attaching, be sure to line up the notch of the ring with the bottom right so that the umbrella can be attached to the light through the aligned holes.
- The **sync cord** (one end of the moonlight and the other is a PC connection, for the camera or the light meter). As long as there are two people working, we won't need this because we have the **radio flash receiver**.
- The **flash tube** generates the flash and the exposure for the camera
- The **Modeling light**: provides a preview prior to the moonlight flash
- **Light Modifier**: used to control the delivery of the flash – the
 - **Umbrella**; stronger lighting, use this for flat work. fits in beneath the light, fitting into the Mono-light base, the umbrella faces the light.
 - **softbox**: provides a soft lighting – use this for portraiture and object photography

Store equipment in the **case** if not being used.

A general tip: The closer your light source is to your subject, the softer the lighting will be. As the light source becomes smaller the shadows become harsher.

Light meter: used to determine the required f-stop for a correct exposure.

Use the side button to set the mode

- The sunshine icon = ambient (available) light
- **The lightning bolt** = non-corded flash (2 users, one on the meter, one on the light. 2 seconds to set off the moonlight flash – we use this one.)
- The lightning bolt with a lower case c = corded flash (the sync cord is plugged into the camera and the moonlight)

Light Meter: When using the light meter you will need the sync cord if you are working alone, you will not need the sync cord if at least one other person is working with you. F-stop numbers become smaller as you move away from the subject. The numbers get larger as you move the lights closer to the subject.

CAUTION: always turn the units **off** when making adjustments to the light modifiers. The lights should not be giggled or moved when on.

Camera Settings: Set the camera on M for manual. The **shutter speed** is on the back right of the camera and should be set to **80 and 100**. The F-stop will be set on the front right of the camera, the required setting will be indicated on the light meter. Take 3 readings; one in front of the subject, facing each light, and the final facing the camera. The needed F-stop will be indicated on the light meter, try bracketing your exposure, using one f-stop higher and lower than indicated.,

Taking the shots: When taking the shot you will not need the sync cord from the camera to the lights, because we have a **radio trigger** for our lighting system. The radio trigger slides into the hot shoe on top of the camera and the receiver hangs from the back of any of the moonlights. The other lights need to be set to slave to activate the automatic flash synchronization system. (use the eyeball icon).

Take a meter reading in front of the subject, you will need two people for this. One will hold the light meter in front of the subject and gently depress the side button, while another student will set off the flash on one of the moonlights. Disconnect the cord from the meter and plug into the camera when ready.

Slave Setting: when the lights are set to **SLAVE**, or light trigger, the mono lights will automatically flash without using the sync cord. The red light on the back of the moonlight indicates that it is ready to flash.

Using the Radio Trigger:

The trigger goes into the hot-shoe and sends a radio signal to the receiver which is plugged into the back of one of the moonlights. The rest of the lights should be set on slave (the eyeball icon).

3 lighting set ups determined by subject; portrait, flat work, or product.

Portraiture: 3 lights plus 2 umbrellas and one snoot (the slave setting should be set on the back of each monolight). The light height should be set slightly higher than the subject.

- The **Main or keylight** is the primary light, and should be set to the strongest power of all three, providing the main light source for the image. The keylight needs to be stronger than the fill light. The subject should turn slightly toward the keylight. The f-stop meter reading should be one stop higher (f11) than the f-stop meter (f8 or f8.5) reading for the fill, adjust the power dial as needed.
- The **fill** light is the secondary lighting and therefore set at a lower power to fill in the shadows,
- **Hair light:** replace the reflector with a snoot (the funnel looking thing) for specific spot lighting, this is usually set behind the backdrop and shown down from atop the subject, we don't have room for that so keep it as far behind the subject as possible. The hair light should be set to the lowest power of all three lights, it is used to all smaller areas of detailed highlighting.

Product Photography:

- Same lighting as portraiture, but use the soft boxes rather than the umbrellas.

Photographing Flat work:

- For photographing flat work you need 2 mono lights.
The lights should be at a 45 degree angle to the artwork, the camera should be straight out at a 90 degree angle from the backdrop. Two mono lights are to be used. The level of the moonlights should be set up at the same level as the artwork; same height, same distance, and the same angle. The level of the moonlights should be set up at the same level as the artwork; same height, same distance, and the same angle. Both lights need to be exactly the same power, distance and height.