Lighting Steve McQueen's Motorcycle:

In-Studio Quartz Lighting Technique by John Siskin



I teach a class in studio lighting, and recently we had an opportunity to photograph a 1947 Indian motorcycle owned by the late actor Steve McQueen (1930–1980). This was the last motorcycle McQueen owned, and it had been restored for its new owner, Daniel Schoenewald, who bought it from the McQueen estate. The motorcycle was in fantastic shape, and a real joy to photograph.

Working within a time constraint

It is important to understand the limitations imposed on the shoot. First, we only had three hours to set-up, light and shoot before the bike had to be returned. For the purposes of my beginning lighting class, I used accessible and inexpensive equipment—mostly quartz lights. We used a Toyo 4×5 camera, so we had high-quality Polaroids with which to work, as well as finished transparencies.

Thinking through the shot before the class arrived, I decided to use a black plastic drop cloth on the floor. Because we'd be moving the bike around to find the perfect angle, I knew the plastic would look better than seamless paper. And since we'd need a very large background and shoot area for such a large bike, I used a 12-foot gray seamless on the back wall.

The first step was establishing the camera-subject relationship. We had to ensure that the background would surround the bike. A slight angle was chosen to highlight the front fender. The fender design is a distinctive feature of all Indian Motorcycles.

Drawing from past experience, I explained to the class that lighting and shooting motorcycles was difficult because of all the shiny spherical surfaces (mostly glossy paint and chrome). These surfaces tend to reflect the lights directly into the lens. If we were to light this bike with hard direct lights, it would be covered with hard specular highlights and very dark areas. Obviously, we needed to create very large smooth light sources to make this image work. This problem could be solved by using a 9×30-foot piece of white seamless paper (Figure 1) to create a wall between the camera and the bike. Then we spread the light on the wall.

But first we had to build the wall, which was an extremely awkward task. A full roll of seamless is 9×30 feet, which is a tough piece of paper to handle. We accomplished this task using Manfrotto Autopoles at each end, and C-Stands with clamps in the middle. (Paper is a lot less expensive than a 9×30 foot soft box.) The purpose was to enclose the sides of the bike and get the paper as close to the camera as possible.

Creating a window

However, this presented a problem—the camera can't see through the paper. Since we first established the camera-to-subject relationship, we don't need to move the camera around after the paper is in place. We just need to know where to cut a hole. To do this, turn off the lights in the room, then shine a quartz light through the camera back (Figure 2), using the barn doors on the light to prevent spill. Next, cut out the paper in the area where the camera back is projected. This way the window for the camera is kept to a minimum.

The ceiling of my studio has several movable wooden poles mounted on it. We put two Smith-Victor Quartz broad lights (model #770) on the poles (Figure 3), with Manfrotto Super Clamps and Compendium Arms. We opted for the broad light because the fixture is designed for large, even illumination. The Super Clamp and Compendium Arm combination provided awesome control of our light position. The lights were pointed at the white



Figure 1. A view from the inside wall.

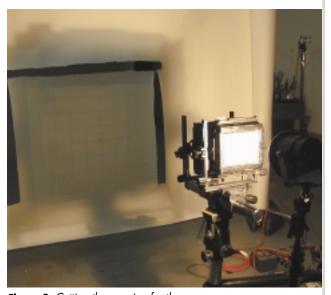


Figure 2. Cutting the opening for the camera.



Figure 3. The author's Smith-Victor 770 Quartz broad lights.



Figure 4. Mounting the main light source—a Smith-Victor 780 spotlight—on the studio ceiling.

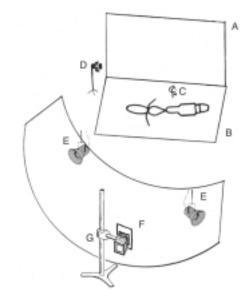


Figure 6. The lighting diagram shows the placement of the lights in reference to the motorcycle.



Figure 5. The author's 300-watt Berkey ColorTran Mini-Pro light.

seamless wall, away from the bike, creating a very smooth light on the motorcycle.

Next, we placed a Smith-Victor spot (model #780) behind the bike (Figure 4). Keep in mind that this light doesn't have a fresnel lens. Instead, it has a blue filter. Because the gel filter is delicate and susceptible to melting from the heat, we had to be careful to keep this light off as much as possible.

The light provided a pastel blue light behind the subject, with a circular fall-off. The light is pastel because the blue mixes with the white light reflected from the gray seamless and the fall-off is created by the spot pattern of the light.

Finally, we added a 300-watt Berkey ColorTran Mini-Pro. This lamp was placed to the left of the bike (Figure 5) and used to illuminate the ceiling and the left side of the white seamless. This was easy because the Color-Tran has a movable bulb to control its pattern and really good barn doors. The placement of this light put additional light on the seat and the back fender, both of which needed the help.

We used a Schneider 150mm f/5.6 Symar-S lens. The exposure was 1-second at f/11.5. A slight swing on the front lens board maintained depth of field along the side of the motorcycle. Somehow, after doing the lighting on a shot like this, the exposure seems almost anticlimatic.

Had we had more time...

This was only a three-hour shoot. If we'd had more time, there are several small things we would have tried to change. The bell-shaped cover on the side of the bike, which says "Indian," has an immediate transition from silver-tone to black-tone. This was caused by the difference in reflection between the white seamless and the black plastic. Additional white seamless might have helped with this. The other difficulty is with the gas tank, where there are reflections of the hole in the seamless and the ceiling. The hole in the seamless would be changed if the seamless were placed closer to the camera, and the ceiling could have been partially covered by additional seamless.

On the whole, we were very pleased with a quick shoot that used such accessible equipment.

John Siskin is a commercial and fine art photographer who specializes in shooting product, as well as macro, portraiture and architectural photography. He has taught photography for almost 20 years, the last 16 years for Learning Tree University in Chatsworth, Calif. John's classes include Studio Lighting and Capturing Interiors on Film. He lives in Reseda, Calif., and his web site is www.siskinphoto.com.