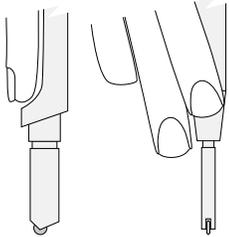


10 Ways to Improve Your Cutting

The following tips are courtesy of Rudi Gritsch of the Glasfachschnitzschule in Kramsach, Austria. Rudi is the former director of research at Bullseye Glass Co. and a world-class glasscutter.



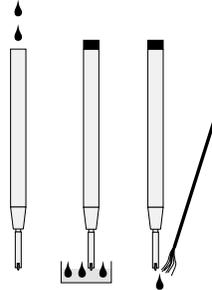
1. BUY THE BEST CUTTER YOU CAN AFFORD.

If it helps you cut accurately and comfortably, the expense is justified. A high-quality long-lasting wheel with a comfortable handle will save you money in the long run.

A handle with a rest for the index finger lets you apply pressure down onto the score. A wide housing allows the middle finger to guide the wheel.

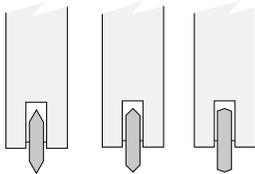
2. ALWAYS USE A CUTTING LUBRICANT.

Kilnworkers prefer mineral spirits because oil, if not completely cleaned, can leave a residue after firing. However, a cutting oil is less harmful to your skin, not really difficult to clean, doesn't smell and is a smoother lubricant. You can use a self-lubricating cutter, dip your cutter into the oil, or apply the oil with a brush.



3. USE THE CORRECT WHEEL FOR THE GLASS.

The size of the wheel determines how much pressure you need to penetrate the surface of the glass. The smaller the wheel, the less pressure is needed. Small wheels (like those on the Silberschnitt 2000) are best for thin glass. These microwheels have a diameter of about 1/10th of an inch.

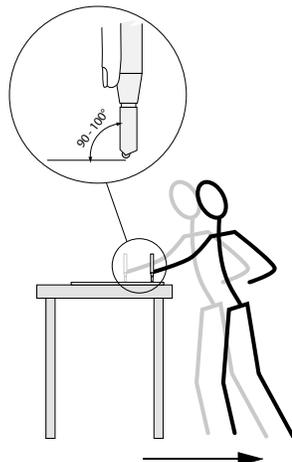


The angle of the wheel also affects the pressure needed. For thin or standard thickness art glass (2-3mm or 1/16-1/8") the perfect angle is 120°. For glasses up to 10mm or about 3/8" you can use an angle up to 135°. For glasses thicker than 10mm, a 160° angle is appropriate.

4. WORK WITH YOUR FULL BODY.

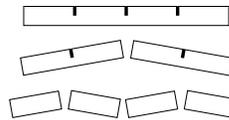
For the most even score, stand up and away from the worktable. Keep the cutter wheel perpendicular to the glass with the handle held upright or slightly angled back towards your body. Then move your whole body—not just your arm or hand—for the most even score.

When scoring severe curves, work at the corner of your worktable and move around the table as you cut.



5. IF POSSIBLE, POSITION YOUR SCORE SO THAT THERE IS AN EQUAL MASS OF GLASS ON EITHER SIDE OF THE SCORE.

The break below the scoreline will naturally tend to move to the side where there is less glass, resulting in an edge that flares out from your score.

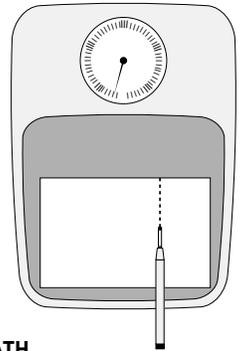


If you're cutting numerous thin strips, start with a piece that is four times as wide as the individual strip you need. Cut it exactly in half. Cut each half in half. By always keeping an equal amount of glass on each side of your score line you can get perfect strips that are as narrow as the glass is thick.

6. CONCENTRATE ON APPLYING EVEN PRESSURE AND UNIFORM SPEED.

Listen for a smooth consistent sound as you score. It should not be scratchy.

Want to compare the pressure needed for different cutters or different glasses? Try putting your glass on a scale while you score. Notice the difference in "weight" required.

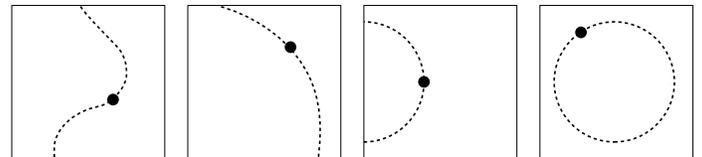


7. NEVER SCORE TWICE OVER THE SAME PATH.

If you make a bad score, do not re-score the same line on the same side of the glass. You'll dull the cutter wheel and lessen your chances for a clean break. If you absolutely must break the glass along the line you've scored, turn the glass over and very carefully score along the same line. Then, break it as usual.

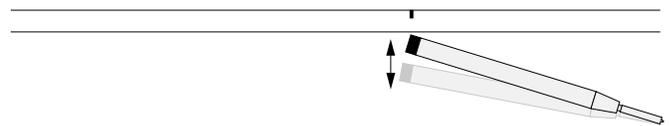
8. WHEN CUTTING CURVES CONSIDER RUNNING YOUR SCORE FROM THE INTERIOR OF THE SHEET.

With more complex shapes, think about how glass naturally breaks when you start to run the score. It tends to run as directly as possible to the edge of the piece. Therefore, if possible, start running your complex curves or circles away from the edge.



9. AVOID TAPPING WHENEVER POSSIBLE.

Tapping almost always leaves a jagged edge. But if you must, tap directly under the score line to minimize flared edges.



10. BREAK OUT YOUR GLASS IMMEDIATELY AFTER SCORING.

If allowed to sit too long, a scoreline will begin to develop fractures radiating along its entire length making it nearly impossible to break the glass cleanly.