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The Joy of Breaking

Nine Points to Breaking Success

By Master Wiz

The founder of Taekwon-Do, General Choi Hong-Hi, created the "Training Secrets" to help Tae Kwon Do practitioners understand how they could increase the power in each of their movements. Here are nine breaking tips to help breakers increase the success of their breaks.

1. Use a stable breaking platform. For all breaks (except speed breaks) the more stable and solid a breaking platform, the easier the break will be. This allows the breaker to have greater success and break more boards. There are a number of commercially available board holders on the market that can increase breaking stability and avoid injuries to human holders. If the break requires a person, they must be taught how to hold and what muscles they need to use to create as stable a breaking platform as possible.



2. Choose the right difficulty of boards to avoid injuries to the breaker. It is important for breakers (especially new ones) to be able find ways to safely develop their skills and to be able to track their progress. Re-breakable nylon boards are the best way for breakers to gauge their skill and power. UMAB boards offers 13 levels so that breakers can gradually and safely increase the difficulty as they increase their skills.



3. All boards, regardless of the material, should be struck on the edge and not in the center. Striking the edge of a board (along the crack or with the grain) makes it easier to start a fracture or split that will easily continue across the entire board. An easy image to understand

this concept is to imagine opening a zipper; it is much easier to start on the end to split the zipper in half and not in the middle.

The total energy required to open the zipper or break the board is the same, but the intensity needed to initiate the fracture is less.



4. Strike directly through the thinnest part of the target. Often inexperienced breakers will strike the board from too indirect of an angle, which will increase the amount of material the breaker needs to fracture to have a successful break.



Evidence of a breaker not striking directly through the board is when the board slides off the board holder without breaking.

5. A very slight downward angle should be used on all horizontal breaks to increase the body mass that can be applied. $\frac{1}{2} \text{ mass} \times \text{acceleration}$ is the formula for kinetic energy. If a student is striking as fast as possible, the only way to increase the force is to include more mass.



6. Pre-action for downward breaks should start directly over the point of impact. Often breakers will use a circular or swinging motion to try to increase the power of their downward break. Although it is “showy” and may feel like it is generating more power, it is just a waste of energy and can actually cause the strike to lose power. To throw a ball forward, the arm first goes back; to jump up, the body first goes down. Therefore, for a downward strike the hand first goes UP, then straight down.
7. Increased time on target will increase power transference and increase the amount of destruction. Experienced breakers know that when they continue to push through on impact, they break more often. This is because it ensures that all the energy from the strike and the mass of the body will be directed into the board as opposed to when a breaker lets their hand or foot bounce off the board.
8. Position the height of the material so as to ensure proper biomechanical advantage. Breakers must take into consideration how the body moves and what is the best way to transfer energy for each strike. We can generate more power swinging a hammer at

a nail in the floor than we can if the nail is on a wall, and we generate even less power if we swing at a nail above our heads. In other words, while it is possible to break with a side kick at head level, maximum power is generated when the middle of the board is positioned approximately one fist above the belt. If the breaker lacks flexibility and/or hip strength, then the position of the board has to be even lower.

9. Body structure will affect the amount of boards a breaker can break. Bone density and structure play a factor in the amount of force a breaker can safely transfer to a board. A pebble may be the same size as a moth, but when they both impact a windshield at 100 miles an hour, the pebble breaks the windshield and the moth is squashed. The same is true for differences in the human body; some people have thicker and denser bones than others and can therefore withstand greater impacts without damage.

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