**Paddling Technique**

An outrigger is pulled not pushed through the water. To do this, paddlers need to reach out, grab the water and drag the canoe forward. Most blades also have a bend (usually around 10 degrees, held with the blade bending away from the paddler) which increases the lift of the blade as it enters the water. This effectively pulls and lifts the canoe to decrease the canoe surface area and the water resistance. Lift is achieved by focusing power at the front of the stroke.

The paddle should exit the water when it reaches the paddlers mid-thigh to hip. Extending the stroke beyond this point decreases the lift generated and increases drag. Synchronized paddling; with all paddles entering and exiting the water at the same time and all paddlers using the same technique; provides the maximum pull and lift for the minimum effort. This can only be achieved through developing a consistent paddling technique both individually and as team, it requires practice.



Rotating from the hips allows paddlers to apply leverage and deliver maximum pull through the water. Twisting the upper body instead of using the arms utilizes stronger muscle groups and minimizes fatigue. This reach and twist motion requires flexibility. Locking the lower body and arms also results in less rocking of the canoe creating a consistent streamlined hull. Paddlers should maintain a straight line up the spine, twisting around this plane, with heads up and all in a row. The optimum degree of lean (forward) is influenced by the paddler. Smaller paddlers may use a dynamic approach where they lean forward a little (10-30 degrees) at the start of the stroke to increase reach and then straighten during the stroke to provide power. Others should focus on a static approach with minimum lean and no forward/backward body movement. Inappropriate lean increases lower back stress and should never be excessive, larger paddlers should always adopt a static style.

Paddling technique is continually under review and development. Consequently there are a wide range of differing ideas about what constitutes good technique; however everyone agrees that all paddlers in a canoe should have the same technique. The following Paddling Phases can be used as a general guide.

**Set Up Phase**

1. The stroke commences.
2. Maximum reach and twist with the paddle blade just out of the water.
3. Paddle blade perpendicular to canoe hull.
4. Lower hand around one-hand width from the start of the blade face.
5. Top hand should not be outside the canoe.
6. Bottom arm with minimal bend and locked.
7. Top arm slightly bent and locked.
8. Leading leg (paddle side) extended and firmly planted. Offside leg bent under the seat.
9. Both legs (knees) braced against canoe to lock the paddler in.
10. Straight back, possibly a small forward lean.
11. Head up.
12. Basically your arms and shoulders should form a "big C".

**Entry Phase**

1. Plant the blade. Push the blade cleanly into the water; Everyone at the same time.
2. Drop bottom shoulder to move arms down and drive the full blade into the water up to the neck.
3. Strive for a clean entry (no plonking) by maintaining the paddle perpendicular to the canoe and entering the water at the speed (horizontal paddle movement) of the canoe.
4. At this stage you are not pulling the canoe just getting the blade planted.