

# All together now



On their way to being world champions, Zac Purchase and Mark Hunter move away from the start in the lightweight men's double sculls at the 2010 World Rowing Championships



Synchronisation is the key to making a crew great, writes **Robin Williams**

**D**espite rowing being highly synchronised, like synchronised swimming, it's just called 'rowing'. Just rowing?!? Rowers not only have to move in perfect time like the swimmers but they also do it at full physical capacity, connected together, with huge endurance. They have to make tactical decisions, allowing for wind, steering, as well as handling a boat and an oar! When one person falls out of sync it's the beginning of the end so it takes high levels of discipline, practice and repetition

“**Make your power complement theirs, wherever you sit**”

to stay together throughout a race.

But are timing and synchronisation the same thing? I would say timing is largely about what you can obviously see: blades squaring, entering, feathering, legs pushing down, recovery all phased etc. But synchronisation for me suggests something subtler, the *inner* feel as well: two people can be in perfect time outwardly, but who can say whether

internally they are each making the same pressure with the same muscles at the same time and feeling the same effort level? This is the key to making a crew feel great but it's hard to coach and it's hard to feel if you haven't already experienced it.

Let's look at an example of an eight approaching the catch. Eight people, say 80kg each, have their own mass plus their bit of the hull and cox to propel; perhaps 100kg in all.

As they arrive over the stretcher they will already be making their entry movement so that the instant the spoon is covered they can lock it there and load their mass against it simultaneously. That's the point where the stroke can begin and at race rate they might have just 0.6" in the water to build the hull speed as high as they can. Imagine one person being just 0.1" late connecting. That error is 15% of the available power phase time and for that moment the dead weight for everyone else goes up about 12.5kg. Can you imagine lifting a bar in the gym without knowing what weight is on the ends, and having it change unpredictably every repetition? Pretty disconcerting, never mind the injury

risk, but timing errors of 0.1" and much worse are very common in rowing crews.

To get this movement right means doing it in time together, but also feeling it too: the ability to stay balanced and relaxed over the front end coupled with the sensitivity to make that instant connection. A ruse I often recommend to stroke men is to make the entry and catch in the normal way so that your own mass is loaded up, but don't try to move the hull unless you feel the back-up of the crew with you. You can quickly destroy yourself if you try to take the boat yourself in those first moments of load and drive.

Try these basic drills for improving your crew's synchronisation:

- **Eyes shut rowing.** Means you have to feel the movements together, feel the hull, slide, weight of oar etc
- **Rowing in the dark** for the same reason
- **Rowing very light pressure**

Remember that muscle tension masks feel - you produce fluid handwriting by holding a pen relaxed, not as tight as you can, so to improve the feeling of the crew moving

together, rowing at very light pressure can be really useful. Then gradually increase it, one level at a time, perhaps using a pressure scale of 1 to 10 where 10 is flat out.

It's also important to bear in mind that the entry and catch take *nearly* the same time at light pressure as they do at firm: the blade width is constant so it always has

## “ Muscle tension masks feel ”

the same distance to drop to be fully covered. The thickness is also the same so you always have to clamp the face the same distance against the water before you can begin to move the hull. A well synchronised crew will do this bit well and have a better chance of staying in sync in the next movement sequence than crews who muck up the entry and catch.

To work on synchronisation in other parts of the stroke is really a question of

## “ When one person falls out of sync it's the beginning of the end ”

practising your sequencing – legs, trunk, arms, etc. But make sure you communicate how it *feels* to put detail on the basic description of movements; discuss how fast, how hard, which muscles feel the work and so on, and try to relate it to the boat. Did the boat respond, complain, feel faster / heavier etc?

Probably the most important point of all regarding synchronisation is that when rowing you need to have awareness of the others in the boat as well as yourself. Make your power complement theirs, wherever you sit.

An early inspiration for me was Brad Lewis's 'Assault on Lake Casitas' where he and Paul Enquist did lots of 'shadow sculling' in front of mirrors to perfect their movements together – again, no work, just movement. They won gold in the men's double at the 1984 Olympic Games.

Synchronised rowing: funny hats and nose clips definitely not required! ▀

PHOTO: PETER SPURRIER



Rowers have to move in perfect time like synchronised swimmers



PHOTO: GB ROWING TEAM

## Drills

- **Aim to paddle with a 'racing catch' all the time** so you are constantly teaching your neural system to work at the right speed. Remember that the boat can't move until you have created bend in the shaft, even at light pressure.
- **A drill for feeling pressure is to have one person row at a lower pressure than the rest**, so they can feel where they make their acceleration, time, etc, and then build the pressure back in before the next person has a go.
- **Dips, roll-ups and catches at higher rates** are useful too because although the oar and spoon dimensions don't change, you are moving quicker and are more likely to introduce tension, go off balance and go out of sync with each other.
- **A favourite drill in a quad scull is to take a 'nudge stroke'** (i.e. the first inch only) in the midst of continuous sculling. It's hard to truly connect in such a brief moment but a great way to test synchronisation on the pick-up.