

Numerical Problem: Relative Motion

- A kayaker wants to paddle north across a 100 m wide river. The current in the river is flowing to the east at 2 m/s. The kayaker can paddle in still water at a speed of 3 m/s.
- **In which direction should the kayaker paddle in order to travel straight across the river?**
- **How long will it take the kayaker to cross the river?**