# LONG BEACH Hydraulic Jump

**DO NOT** use this equipment unless an instructor has instructed you in its safe use/operation and has given permission.



Safety glasses may be required in work areas.

Appropriate footwear with closed-toe must be worn.

Rings and jewellery must not be worn.



Long and loose hair must be contained or constrained.

Long-pants are required.

Protective gloves may be required.

## **PRE-OPERATIONAL SAFETY CHECKS**

- 1. Check workspaces and walkways to ensure no slip/trip-hazards are present.
- 2. Check that all equipment components are in position and are operational.
- 3. Ensure you are familiar with the operation of the equipment.
- 4. Keep table and work area clear of all tools and debris.
- 5. Faulty equipment must not be used. Immediately report suspect equipment.
- 6. Be aware of any other students or personnel in the immediate vicinity and ensure the area is clear before using this equipment.
- 7. Familiarize yourself with all mechanical operations, switches and controls, including potential chemicals that may be used.
- 8. If you have any questions or concerns, ask the laboratory technician or instructor first.

### **OPERATIONAL PROCEDURES**

#### **NO FOOD OR DRINK PERMITTED NEAR EXPERIMENTS.**

- 1. Open both the pump in the working channel.
- 2. Change the gate opening and raise the tail gate to establish hydraulic jump in the middle of the channel.
- 3. Record the flow depths and flow rates upstream and downstream of the jump.
- 4. Change the gate opening and repeat step (3).

#### HOUSEKEEPING

- 1. Turn off all equipment once experiment is completed and dispose of chemicals in proper receptacles on completion. Leave equipment and working area in a safe, clean and tidy state.
- 2. Keep all walkways and aisles free of clutter and debris.

#### **POTENTIAL HAZARDS**



Date of last review

Signature \_\_\_\_\_