

Weirs & Flumes

Civil Engineering

Measuring flow by forcing critical depth.

Measure the head, read the flow from a calibrated law.

Device	Best suited to
Thin plate V-notch	Small flows, wide range
Thin plate rectangular	Moderate steady flows
Broad crested weir	Larger flows, some debris
Venturi flume	Silty flow, low head loss
Crump weir	River gauging stations
Orifice or gate	Controlled release, not gauging

Educational reference. Every device has a calibrated head-discharge law and installation limits set by its standard.