

*Coagulation* is the process whereby specific coagulant chemicals are dosed into the raw water stream, causing a reduction of the forces tending to keep the particles apart. The purpose of coagulation is to destabilise the particles and enable them to become attached to other particles, so that they may be removed in subsequent processes.

The process requires application of rapid mixing (or flash mixing) equipment to provide a uniform dispersion of coagulant chemical throughout the raw water stream.

Both static in-line (motionless) mixer and dynamic (mechanical) mixer designs are commonly used for this application.

These mixer types are supplied by Aquatec Maxcon to suit the specific water treatment requirements:

### 1. "Statiflo" Motionless Mixers feature:

- Highly efficient mixing;
- Low energy consumption;
- No moving parts for maintenance free operation;
- No need for tanks in most cases; and
- Ease of installation and minimal space requirement.

### 2. Dynamic Mechanical Mixers:

Designed for open tank WTP installations

