



# Principle of operation

## Closed circuit cooling towers

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Warm process **fluid (1)** enters through a **heat exchange coil (2)** and gets water sprayed on by the **spray system (3)** at the top of the cooling tower. At the same time the **centrifugal fan (4)**, located at the bottom of the unit, blows ambient **air (5)** upwards through the tower. During operation, heat is transferred from the internal circuit coil to the water, and then to the atmosphere as a portion of the water that evaporates. The cooled down fluid then **exits the unit (6)**. The tower **sump (7)** or basin collects the remaining water. The spray water **pump (8)** recirculates the water up to the water spray system. The warm saturated **air (9)** leaves the tower through the drift **eliminators (10)**, which remove water droplets from the air.



**You want to use the VXi cooling tower to cool your process fluid?**

Contact your local [BAC representative](#) for more information.