Canal locks work on the principle that water seeks its own level.

A boat heading downstream enters the lock. The upstream gates are open, the downstream gates are shut with paddles closed. Because the water level is equal on either side of the upstream gates there is no pressure. Therefore the upstream gates can easily be opened and closed.

Once the boat is in the lock, the upstream gates are shut. The paddles in the downstream gates are opened letting out the water in the lock. The lock continues to empty until the water level reaches the downstream level. The boat gently descends with the lowering water level.

When the downstream level is reached the downstream gates are opened with paddles closed (because water levels and pressure are equal). The boat can now continue on to the next downstream lock.

Note: To go upstream through a lock this process is reversed.