This manual explains how to set up the vacuum pump and vacuum desiccator for the concrete sample conditioning required for rapid chloride penetrability measurements using Perma2™.

⚠️ CAUTION
Please refer to the user manual of the vacuum pump and vacuum desiccators provided separately by the manufacturer before the set-up of the vacuum desiccation system.

Included Parts:

- Vacuum pump and the vacuum hose connector (Part 1)
- Vacuum hose and the desiccator valve (Part 2)
- Water hose (Part 3)
- Vacuum desiccators (Part 4)
STEP 1: The vacuum hose connector (Part 1) has been already mounted on the vacuum pump. Make sure the clamps are tightened.

STEP 2: Connect the vacuum hose (Part 2) to the connector and tighten the clamp.
STEP 3: Connect the desiccator valve to the desiccators (Part 4). Then, connect the water hose (Part 3) to the desiccator valve.

Your complete set-up is ready!
HOW TO OPERATE THE DESICCATION SET-UP

⚠️ ATTENTION
Please refer to the instructions in the ASTM C1202 or AASHTO T277 for sample preparation and vacuum saturation.

⚠️ CAUTION
Please refer to the instructions in the user manual of the vacuum pump manufacturer and operate the desiccator valve properly in order to prevent any damages to the vacuum pump by water suction.

STATE 1: The vacuum pump is connected to the vacuum desiccator. Please note the direction of the arrows on the red handle.

NOTE: According to the ASTM C1202 a vacuum pressure of 50 mm Hg should be applied. This is equivalent to about -28 in Hg on the pressure gauge supplied by Giatec.

STATE 2: The desiccator is connected to the water hose. Please note the direction of the arrows on the red handle.