

# User Instructions

## Air gap accessory

### ⚠ CAUTION



Chemical exposure hazard. Obey laboratory safety procedures and wear all of the personal protective equipment appropriate to the chemicals that are handled. Refer to the current material safety data sheets (MSDS) for safety protocols.

### NOTICE

Before use with hazardous substances, find out the relevant hazards, protective measures and what to do in an emergency.

## Technical information

pH range	>pH 11 per ammonia ISA
Operation temperature	5 to 50 °C (32 to 122 °F)
Minimum sample volume	25 mL (with air gap accessory)
Ionic strength adjustor	Hach ammonia ISA (one liquid pillow per 25 mL standard or sample)
Recommended standard solution	1, 10 and 100 mg/L NH <sub>3</sub> -N Hach standard solutions
Warranty	One year for manufacturing faults. This warranty does not cover improper use or wear.

## Procedure

The Air Gap Accessory optimizes performance and extends the usable lifetime of the membrane module. Samples that contain substances that are known to cause membrane failure (e.g., surfactants, oils, fats) can be measured repeatedly. Since slopes, absolute mV and response times change, use the accessory for all calibrations and measurements.

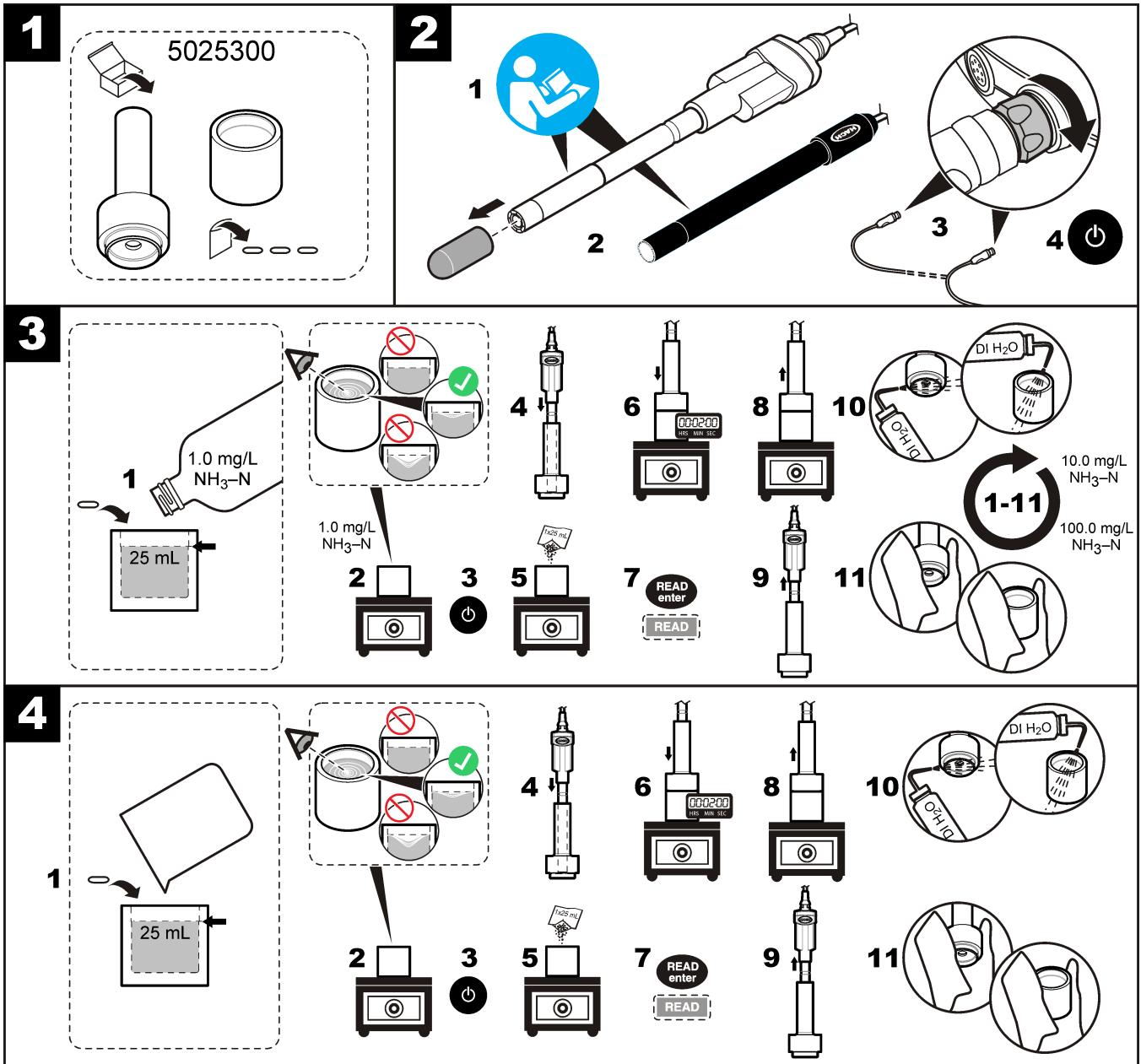
Collect the following items:

- Ammonia standard solutions
- Ionic strength adjusters
- Stir plate
- DI water
- Stir bars
- Lint-free cloth

Step 1 shows the product components. Step 2 shows electrode preparation. Refer to the probe user manual for more information about electrode preparation. Step 3 shows how to calibrate with the air gap accessory. Step 4 shows how to measure with the air gap accessory. Refer to [Figure 1](#).

Use a slow to moderate stir speed. Temperature, stirring speed and reaction times should be kept constant between calibration and measurement steps for optimal results.

Figure 1 Air gap preparation, calibration and measurement



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