

REF 985 006

en

Test 0-06

03.16

**NANOCOLOR® Ammonium 200****Method:**

Photometric determination as indophenol: At a pH value of about 12.6 ammonium reacts with hypochlorite and salicylate in the presence of sodium nitroprusside as catalyst to form a blue indophenol.

Range:	30–160 mg/L NH <sub>4</sub> -N	40–200 mg/L NH <sub>4</sub> <sup>+</sup> /NH <sub>3</sub>
Wavelength (HW = 5–12 nm):	585 nm	
Reaction time:	15 min (900 s)	
Reaction temperature:	20–25 °C	

**Contents of reagent set:**

- 20 test tubes Ammonium 200
- 1 tube NANOFIX Ammonium 200 R2
- 1 test tube with blank value "NULL"

**Hazard warning:**

Reagent R2 contains sodium nitroprusside 5–33% and dichloroisocyanuric acid sodium salt 10–20%.

For further information ask for a safety data sheet.

**Preliminary tests:**

If the order of magnitude of the concentration in a sample is not known, a preliminary test with QUANTOFIX® Ammonium (10–400 mg/L NH<sub>4</sub><sup>+</sup>, REF 913 15) rapidly gives this information. From the order of magnitude the required dilution can be calculated and prepared directly.

**Interferences:**

The photometric analysis of water samples with own color or turbidity always requires determination of a correction value.

The method can be applied also for the analysis of sea water.

**Procedure:**

Requisite accessories: piston pipette with tips

- Open test tube, add
- 200 µL (= 0.2 mL) test sample (*the pH value of the sample must be between pH 1 and 13*) and
- 1 NANOFIX R2, close and mix.  
(*Close NANOFIX tube immediately after use.*)
- Clean outside of test tube and measure after 15 min.

**Measurement:**

For NANOCOLOR® photometers and PF-12 see manual, test 0-06.

**Measurement when samples are colored or turbid:**

For all NANOCOLOR® photometers see manual, use key for correction value.

**Photometers of other manufacturers:**

For other photometers check whether measurement of round glass tubes is possible. Verify factor for each type of instrument by measuring standard solutions.

**Analytical quality control:**

NANOCONTROL Multistandard Seepage water (REF 925 013)