



# Ammonia Solution (880 Ammonia)

## NH<sub>4</sub>OH

MASS	BOILING POINT	MELTING POINT	DENSITY
17.03g/mol	37.7°C	-57.5°C	0.88g/cm <sup>3</sup>



### PRECAUTIONS:

When preparing solutions always wear appropriate PPE including eye protection and gloves. Always add acid to water (never water to acid). Use a fume cupboard. You should always carry out a risk assessment when using any chemicals. Follow all recommended safety procedures and adhere to the label instructions, hazard warnings and local legislations.

### RECIPES:

(The following recipes assume the use of 35%w/w (= 18.1M) ammonia solution.)

To make up dilute solutions, add ammonia to water:

- 1 litre 0.1M ammonia (IRRITANT) – add 6ml s.g. 0.880 ammonia to 994ml water (to nearest ml)
- 1 litre 0.5M ammonia (IRRITANT) – add 28ml s.g. 0.880 ammonia to 972ml water (to nearest ml)
- 1 litre 1M ammonia (IRRITANT) – add 55ml s.g. 0.880 ammonia to 945ml water (to nearest ml)
- 1 litre 2M ammonia (IRRITANT) – add 115ml s.g. 0.880 ammonia to 885ml water (to nearest ml)
- 1 litre 4M ammonia (IRRITANT) – add 230ml s.g. 0.880 ammonia to 770ml water (to nearest ml)

CAUTION: Very strong vapour, DO NOT INHALE. Higher molarity solutions require good ventilation when in use.

### EXPERIMENTS:

Ammonia solution can be used in the following experiments (scan or see website for details):



Colourful Reactions



Diffusion of Gases



ENVIRONMENTAL  
HAZARD



CORROSIVE



HARMFUL

### CONVERSIONS:

- 1ml = 1 millilitre = 1cm<sup>3</sup> = 1/1000th Litre
- 1 Litre = 1dm<sup>3</sup> = 1000ml
- 1M = 1mol dm<sup>-3</sup> = 1 mol l<sup>-1</sup> = 1 mole per litre

### WATER:

Distilled water should be used unless otherwise stated. Tap water is not suitable as it contains impurities.

Order your  
ingredients **24/7**  
at **SciChem.com**

