

Standard Solutions

Chemistry

Preparing a solution of accurately known concentration.

The standard procedure.

1

Weigh accurately by difference

Weigh the boat, transfer, reweigh. The difference is what actually went in.

2

Dissolve in a beaker

In less water than the final volume.

3

Transfer with rinsings

Rinse the beaker and stirring rod into the flask several times.

4

Make up to the mark

Dropwise at the end, bottom of the meniscus on the line.

5

Stopper and invert

At least ten times, to mix thoroughly.

WHY WEIGH BY DIFFERENCE

Some solid always sticks to the weighing boat

Weighing before and after transfer accounts for it

Weighing the boat empty afterwards is the same idea

Failing to rinse the beaker into the flask loses solute and lowers the concentration below the calculated value.