

Modified WHO formulations for surgical hand preparation

Formulation I

Final concentrations: ethanol 80% wt/wt, glycerol 0.725% vol/vol, hydrogen peroxide 0.125% vol/vol.

Ingredients:

1. ethanol (absolute), **800 g**
2. H₂O₂ (3%), **4.17 ml**
3. glycerol (98%), **7.25 ml** (or $7.25 \times 1.26 = 9.135$ g)
4. top up to **1000 g** with distilled or boiled water

Formulation II

Final concentrations: isopropanol 75% wt/wt, glycerol 0.725% vol/vol, hydrogen peroxide 0.125% vol/vol.

Ingredients:

1. isopropanol (absolute), **750 g**
2. H₂O₂ (30%), **4.17 ml**
3. glycerol (98%), **7.25 ml** (or $7.25 \times 1.26 = 9.135$ g)
4. top up to **1000 g** with distilled water