

WEK- Water Tissue- Equivalent Solid Water Phantom

1. Product Introduction and Structure

Fast and convenient, it can replace traditional water tanks for routine quality control of linear accelerator photon beams. Superior product characteristics: each Water phantom is tested for water equivalence in an independent calibration laboratory before use.

The sheets made of this special material have sufficiently high strength and do not stick together when stacked or stored. Changes in temperature and humidity do not affect the water-equivalent properties. The unique design features cavities that can accommodate parallel-plate or finger-type ionization chambers.

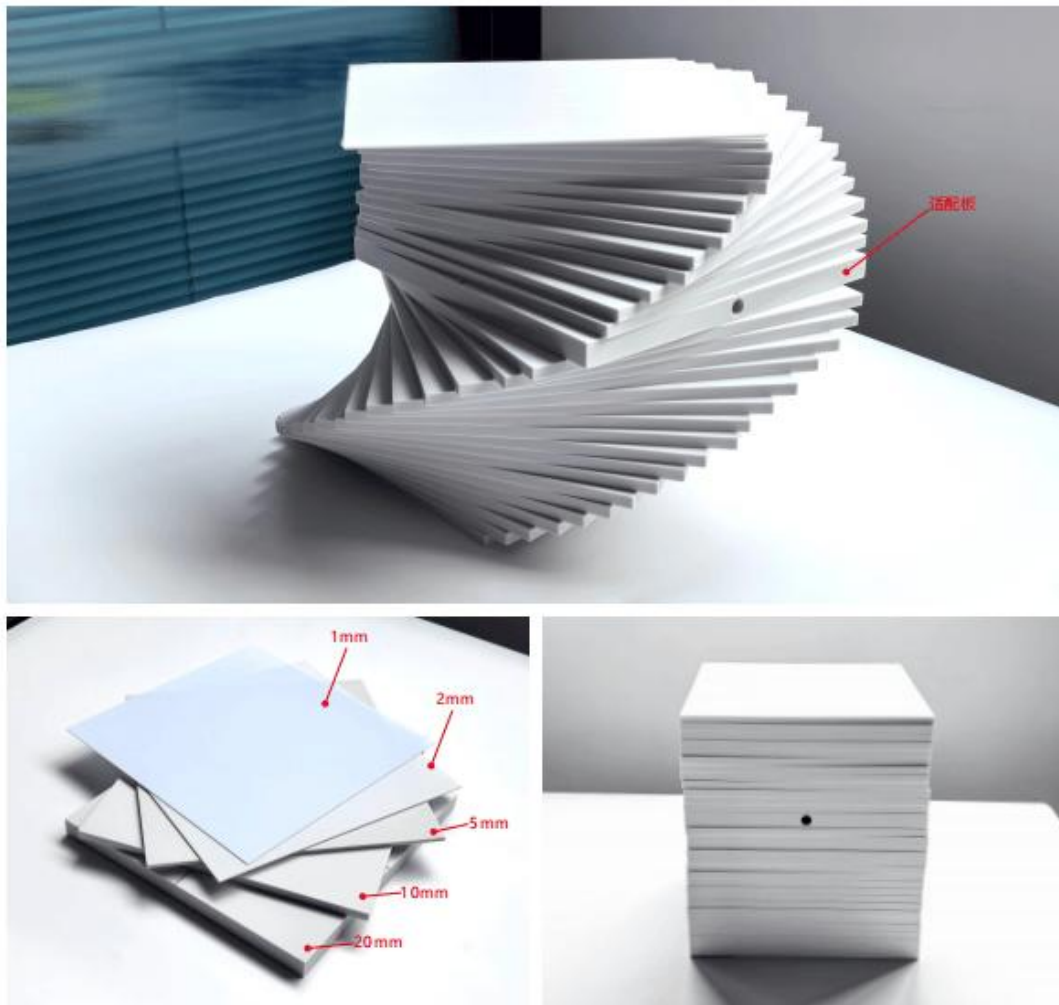







Figure A.1 – Schematic diagram of the tissue-equivalent solid water phantom

Table A.1 – Phantom configuration parameters

| Product Specification | Value |
|------------------------------|---|
| Solid water density | 1.03 g/cm ³ |
| Thickness tolerance | ±0.15 mm |
| Length/width tolerance | ±0.5 mm |
| Physical form | Square sheets |
| Standard dimensions | 300 mm × 300 mm |
| Standard sheet thicknesses | 10 mm, 5 mm, 2 mm, 1 mm |
| Adapter plate | 20 mm, compatible with FC65G ionization chamber |

Table A.2 – Phantom components

| Component | Adapter Plate | Solid Water | Solid Water | Solid Water | Solid Water |
|------------------|---|---|---|---|---|
| Image |  |  |  |  |  |
| Length × Width | 300 mm × 300 mm | 300 mm × 300 mm | 300 mm × 300 mm | 300 mm × 300 mm | 300 mm × 300 mm |
| Thickness | 20 mm | 1 mm | 2 mm | 5 mm | 10 mm |
| Quantity | 1 piece | 1 piece | 2 pieces | 1 piece | 29 pieces |