

WEK-N3L NEMA SPECT Three-Line Source Phantom

1. Radioactive Source Distribution

The radioactive sources consist of a set of three wire sources with an inner diameter < 1.2 mm and a length of not less than 7 cm, distributed as shown in Figure A.1. The three-wire source phantom is measured in air, with the same activity in each wire source.

Imaging is performed in two orthogonal directions within a width range of 2 cm to 4 cm centered on the wire source axis.

The three-wire source phantom is placed at the center of a cylindrical phantom with an inner diameter of 190 mm and an inner height of 200 mm, and the cylindrical phantom is filled with activity in water.

Unit: mm

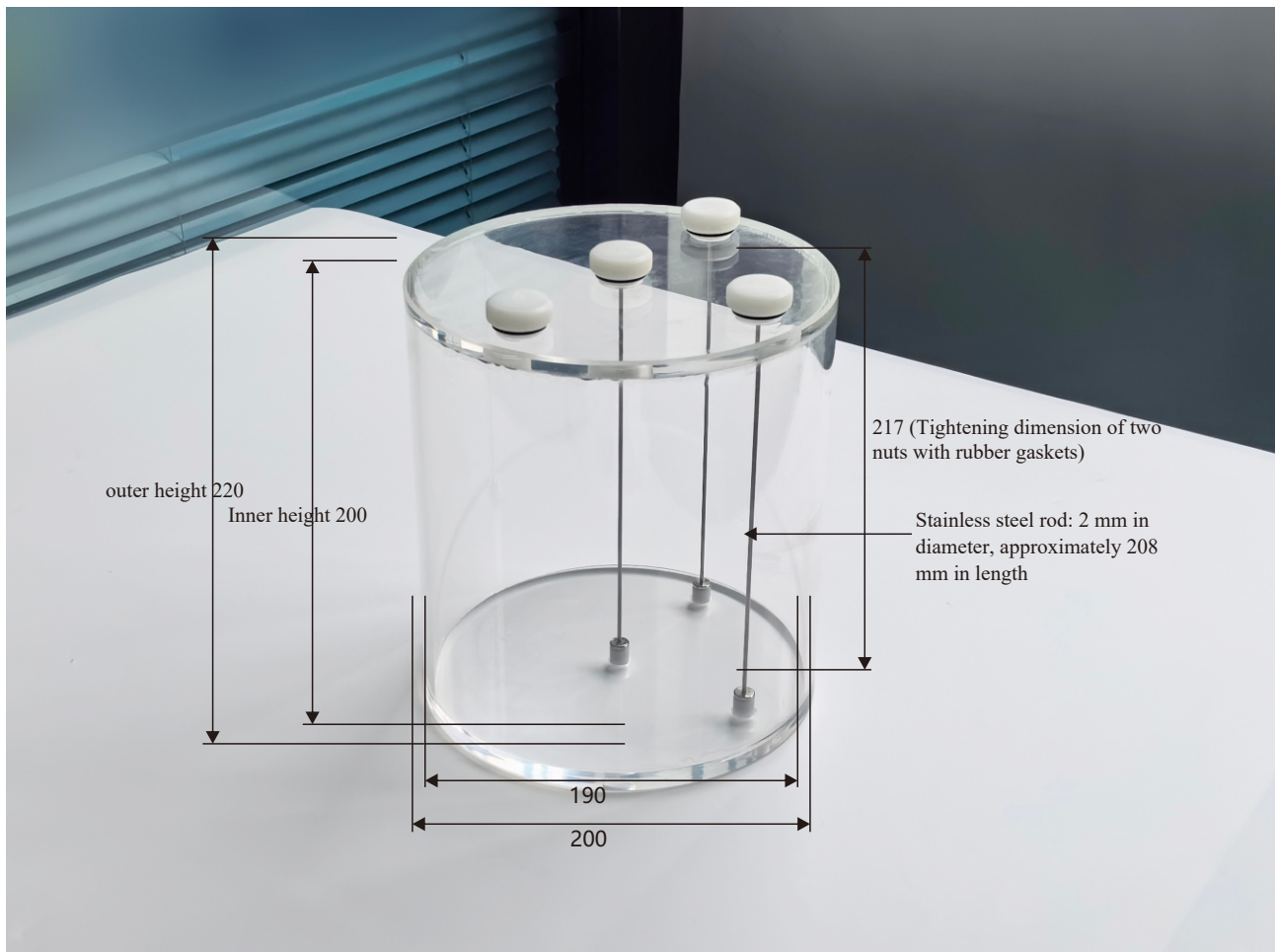

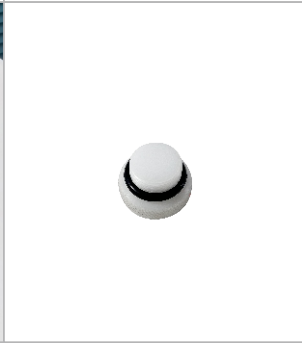

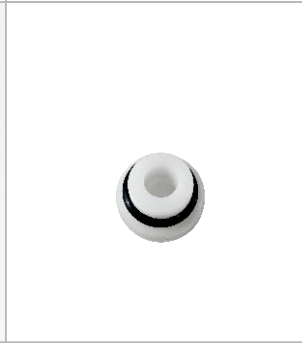


Figure A.1 Schematic diagram of the three-wire source phantom

Table A.1 Phantom Accessory Parameters

NO.	Main Barrel	Water Inlet Screw	Steel Wire	Screw
Picture				
Dimensions	Diameter: 200mm Height: 220mm	Diameter: 29mm Thickness: 20mm	Diameter: 2mm Hole size: 1mm Length: 208mm	Diameter: 29mm Thickness: 20mm
Other	Material: PMMA	Material: POM	Rubber pellets with a diameter of 10 mm are attached to both upper and lower ends of the steel wire	Material: POM
Quantity	1	1	3	3

