

# Dry & Store<sup>®</sup> Professional Hearing Aid Conditioning System

## Product Information

Dry & Store<sup>®</sup> is an electrical appliance for nightly use at home to store and care for all types of hearing instruments, including hearing aids, cochlear implant hardware, noise/tinnitus maskers, and ear monitors. It combines the three essential elements needed for effective drying: heat, moving air, and a desiccant that drives the relative humidity really low, then captures the moisture that is released. During the first eight minutes of the Dry & Store Professional cycle, a germicidal lamp sanitizes the hearing instruments, after which conditioning continues for 8 hours. The unit then automatically shuts off, continuing to store the instruments safely until they are needed.



### Physical Properties

- **Weight:** 2 lb., 8 oz. (1.1 kg)
- **Unit size:** 9" wide x 7" deep x 6" high (22.9 cm x 17.8 cm x 15.2 cm)
- **Drying Compartment:** Divided drawer provides two storage areas, each 2" w x 3.25" d x 1" h (5.1 cm x 8.3 cm x 2.5 cm). Can accommodate four BTEs with ear molds, or several smaller hearing aids. The Professional model can also be used with cochlear implant microphones, headpieces, and behind-the-ear (not body-worn) speech processors. (The Global model will accommodate most body-worn hearing aids and body-worn speech processors.)
- **Case Material:** Non-burn engineered thermoplastic. Neutral charcoal grey with gold accents.

### Electrical Characteristics

The conditioning cycle can be stopped at any time by opening the drawer. The unit resets on each drawer opening, so short-term conditioning is possible.

**Input Power:** 18 watts, 120 volts AC, 50 Hz at 0.15 amps.

### Operating Features

**Conditioning Cycle:** Dry & Store has an operating cycle of eight hours. It conditions at an average temperature of 90-95° F (32-35°C) and a relative humidity of 19-25%. The germicidal lamp (see below) illuminates for the first eight minutes then turns off automatically.

**Air circulating fan:** Ball-bearing fan continuously circulates warm, dry air for the entire operating cycle, causing moisture to move out of the hearing instruments by diffusion.

### Desiccant

The custom desiccant contains an aggressive sorbent (mol sieve), packaged in an attractive, molded, disposable container. Each Dry-Brik has a shelf life of at least one year, unopened. Once the foil label is removed, the Dry-Brik II lasts two (2) months. Replacement desiccants are inexpensive and are available from Dry & Store distributors. The desiccant also absorbs odors as it dries.

### Germicidal Properties

The Dry & Store germicidal lamp is a short wave low pressure mercury vapor tube that produces ultraviolet (UV) wavelengths that are lethal to micro-organisms. During its eight minute cycle, the lamp will generate enough germicidal energy to yield a 99% kill on common bacteria found in the external ear canal.

- 4 watts UV-C @ 254nm in the Professional model produces 660-710 joules/m<sup>2</sup> of UV energy.
- For comparison purposes, a 90% kill on pseudomonas aeruginosa bacteria requires only 55 j/m<sup>2</sup>.

Elimination of this flora from hearing aids can significantly reduce itching and the reintroduction of infection-causing bacteria into the ear canal. To the user, this means less itching and irritation, and fewer recurring infections of the external ear canal.

Note: The UV-C lamp is a surface sanitizer only, and it has little to no penetrating power. This means that it is not damaging to plastics or earmolds. (Germicidal lamps are not to be confused with sunlamps or blacklight lamps, for while those are also ultraviolet lamps, the UV produced by a sunlamp or blacklight is of longer wavelength and is not useful for germicidal applications.)

### Battery Removal

Batteries do not have to be removed from hearing aids before Dry & Store use. Independent tests by Eveready Battery Co. on their Energizer/Amplifier<sup>®</sup> batteries showed a 10-20% gain in battery life under high (85% RH) humidity conditions, and no decrease in life at normal (50% RH) conditions. This was confirmed by a user survey which showed that over 50% of users experienced longer battery life.

### Reliability

Every component was chosen with reliability in mind. The circuit board is manufactured in the U.S.A. by an international electronics manufacturer, one of the highest reliability names in the business. A UV lamp test was terminated after the equivalent of 30 years without a single failure. We offer a generous two year warranty, but we designed for, and expect, long term reliability. The device is ETL & CSA certified and is assembled in the United States by a company whose quality management system is ISO-9001 certified.

### Warranty

Two years in the USA and Canada. Proof of purchase required. Warranty claims should originate with the dispensing professional.

### Each Dry & Store Professional unit is shipped with:

One individually wrapped desiccant, a user instruction booklet, and a warranty registration card.