

## PRODUCT INFORMATION SHEET

### **BENCHMARK: ODDY TEST RESULTS FOR SAMPLES OF 100% POLYESTER STOCKINETTE, WHITE**

Project number: 2003-1-2

Project: research & testing

Materials: 100% polyester stockinette, white

Date of report: August 6, 2003

#### **1. Procedures:**

These materials were tested for volatile compounds which may create corrosion in display or storage using a variant of the standard "Oddy Test." The production of volatile compounds was tested by isolating each sample to be tested in an air-tight glass vessel with polished metal coupons of lead, copper, and silver. Distilled water was included in each vial to provide high relative humidity and accelerate any chemical reactions. A control set of coupons was included. All coupons were exposed to temperatures of 40°C for a period of forty-eight days.

After this time period, the coupons were removed and examined using a bench stereo microscope to assess the extent of corrosion.

This procedure was augmented by use of the sodium azide test employing cut fragments of the fabric exposed under glass to the sodium azide test reagent for 3-4 minutes while examining the extent of the reaction with a microscope with a control sample of hair as a standard.

#### **2. Results:**

Control: no corrosion, oxidation or alteration was noted on the silver, copper or lead coupons.

Benchmark: 100% polyester black plain weave no corrosion, oxidation or alteration was noted on any of the silver, copper or lead coupons: no change.

Sodium Azide test: no release of nitrogen, from which can be inferred that no reactive sulfur compounds are present in the material.

#### **3. Conclusions:**

This fabric test indicates that the Benchmark sample 100% polyester white stockinette is safe to use in close proximity to art objects.

Requested by Benchmark, Rosemont, NJ 08556