Technical Exchange

Useful tool for tape removal for more than just paper conservators

Over the years, Elissa O'Loughlin and Linda Stiber Morenus have been presenting their informative workshop on tape removal, with enormous success. (If you ever have a chance to participate, it is certainly worth the time and money.)

One of their many useful tools and techniques is a heating mat, originally introduced to Linda and Elissa by Shannon Zachary, head of the Conservation Services Preservation Division at the University of Michigan.

Flexible heating elements may be preferable to heat spatulas when old pressure sensitive tape has to be removed. These heating mats are available in kit-form in a variety of sizes. A suitable sized mat can be chosen according to the width of tape. The heating mat allows the conservator to apply an even amount of gentle heat in order to soften old pressure sensitive adhesive. A rheostat (power controller) should be used to regulate the temperature of the heating element. A good deal of the slightly softened residue of the adhesive can be removed by spatula or scalpel in preparation for a following wet treatment with solvents, if that should be desired.

Shannon keeps their heating mats protected in a Mylar sleeve welded on 3 sides. The Mylar is stable at the low levels of heat used for tape removal and is easily replaced. The least convenient aspect of the mats is the wiring. However, mats and wires can be tamed with some non-metal weights. Shannon reminds us that the heat goes in two directions. When working in a book, for example, she protects the untreated side with several layers of blotter.

Equipment with the necessary accessories is available from Cole-Parmer Instrument Company. For more info go to www.coleparmer.com/catalog.

KAPTON Heater Kits operate at temperatures as high as 400ºF (204ºC). They're perfect when you need a variety of small heaters fast. Choose from individual heaters, or order convenient heater kits. Kits include a sheet of 16 chemical-resistant KAPTON heater units in different shapes and sizes to meet your needs. Units come with pre-tinned solder pads to provide easy lead connections, a wattage chart, and instructions for selecting, wiring, and installing leads. Heaters operate on 120 VAC. Regulate heater temperature with a power controller sold separately. Kapton® heat mat kit, w/o adhesive, 120 VAC, $125.00 (EW-36067-00).

An Extension Adapter Cord is required for all Kapton heater kits to connect heater mats to rheostat. This accessory comes with a three-prong plug for 120 VAC, tip jacks, and a ground wire alligator clip. It is available from Cole-Parmer for $32.00, but could also be put together by yourself.

If you don't have a rheostat in your lab, here is a good, though slightly expensive, suggestion, also from Cole-Parmer. It is a solid-state controller featuring a power level dial independent from the illuminated "ON/OFF" switch. Control range is from 3 to 98% of input voltage. (This device also regulates universal motors up to 1 hp, or single-phase AC induction motors up to 1/2 hp, or incandescent lamps – not fluorescent lights). Mount the extruded aluminum housing to any surface; unit measures 6" W x 5 3/8" H x 3 1/2" D. Cole-Parmer® AC Power Controller, $218.00 (A-02604-00).

The following three tips were kindly submitted by Tiarna Doherty.

Suture Needles and Threads

Suture needles can be purchased alone or pre-threaded. Common suturing threads are made of Gore-Tex or polyester (colors of the thread can vary). I have found that the polyester threads are significantly weaker than the Gore-Tex threads. When anchoring a suture thread of Gore-Tex or polyester, surgeons recommend tying at least three knots (varying the direction of the knot) since threads can be slippery. Suppliers of such threads include:
Ethicon (a Johnson and Johnson company). An online catalogue is found at: http://ecatalog.ethicon.com.

W.L. Gore & Associates, Inc., 3450 West Kiltie Lane, Flagstaff, Arizona 86001.

Albrecht Gumlich, column editor

Telephone: 928 779 2771, fax: 928 779 3480. An online catalogue is found at: http://www.goremedical.com.

Silicone Socks

When heated needle tips are used in consolidation treatments, glue often sticks to the metal tip. In the 2001 AIC Paintings Specialty Group *Postprints*, Carolyn Tomkiewicz shared studio tips for the use of two heat conducting silicone rubber materials: Elastosil M1470 and Elastosil M4370 (both supplied in parts A and B) that are easily made into "feet" and "socks" for hot needle tips. Once cast, the silicone rubber will transfer heat from the needle but will stick to, or accumulate, adhesive.

The Elastosil M1470 comes as a thick putty that can be worked in a short amount of time by hand or with the use of tools. The Elastosil M4370 is a liquid that has a longer hardening time and requires dipping or pouring the materials into a mold.

In casting "socks" of this material to fit over a hot needle tip it was useful to use a series of pop rivets (found at a hardware store) of equal thickness as the hot needle. If one has access to a sanding belt, the tips of the rivets can be ground to mimic the pointed tip of the hot needle that will be used in the treatment. Using pop rivets allows for one to make numerous 'socks' by dipping the rivets into the liquid silicone rubber, allowing them some time to dry, and then repeating the process two or three times. Between repeated dipping of the rivets, one can suspend them by inserting them, upside down into polystyrene blocks.

The Elastosil M1470 and M4370 are produced by Wacker. While usually sold in large quantities, samples can always be requested from suppliers.These suppliers include: West coast- Walco Materials Group, 2121 Chablis Court Ste#100, Escondido, CA 92029. Tel.: 1 800 297 4541. marthabutler @walcomaterials.com; East coast: Rudolph Bros. & Company, 960 Walnut St., Canal Winchester, OH 43110. TEL.: 614-833-0707. Special thanks to John Hirx and Elma O'Donohue for sharing these materials with me.

Water mister

Andrea Rothe recently introduced me to plastic water-misters that may be purchase in the beach supplies aisle of the local drug store. The mister, designed for beach-bums who need to cool down, may be purchased for approximately $14. The container is made to fit on your belt. There is a handle to pump in order to create pressure, and the mist is dispensed through tube by means of a valve. One brand name recommended is the Misty Mate sport.mist (www.mistymate. com).

New Golden Products

Historical Colors

Golden Artist Colors recently announced that it is adding eight new Historical Colors to its current Heavy Body acrylic product line. Each color in the Historical line has at one time or another, been considered controversial with respect to paint quality, lightfastness, or artist safety. The Golden Colors are produced as hue combinations of contemporary pigments. Care was taken to ensure the Historical Colors shared the working properties and color qualities of their predecessors.

The colors are: Indian Yellow Hue; Naples Yellow; Prussian Blue Hue; Manganese Blue; VanDyke Brown; Alizarin; Sap Green Hue; and Hookers Green. The Historical Colors product line will be available in 4 oz., 8 oz., 16 oz., 32 oz., and 128 oz. They will also be available in two different sets. One set will contain all colors in a 22 ml size and the other in a 2 oz. tube size.

Archival Aerosol Varnish

Golden's other new product is Mineral Spirit Acrylic Aerosol w/UVLS in Gloss, Satin, and Matte finishes, the first in a new product line — Archival Aerosol Var-nish.The Aerosol has an adjustable fan spray tip for precise application with reduced overspray. The 12 fl. oz. cans contain enough product to achieve approximately 30-35 square feet of coverage.

Golden Artist Colors, Inc., 188 Bell Road, New Berlin, NY 13411-9527 USA, Phone:607-847-6154, Fax: 607-847-6767, E-Mail: goldnart@golden paints.com, www.goldenpaints.com.

(edited company press release)

Lives of the Conservation Saints

(The first portion of this very lengthy manuscript appeared in Vol. 23 No. 2, of the Newsletter, May, 2001. It is evidence of the diffuculty of the translation that it has taken so long for the next installment.)

St. Certifica

More is recorded of St. Certifica than can be written in a brief entry, although, oddly, little is actually known of her works or character. A toiler in the offices of the church, she is known principlally for the extreme length of time it took for the faithful to achieve her canonization.

The lengthy writings concerning her, much of it taken from the List of the Objecters, describe the struggles to prove her miracles to those who doubted her true worth as a daughter of the Faith. In the early years many questioned the influence of her family, in most part her grandfather, on the fulfillment of her vocation; later some argued that her sainthood would have no beneficial effect on the true practice of the faith but would only expose the faithful to the sin of pride. Others protested that her elevation would cast favor on those who, like St. Certifica, had survived the rigors and sacrifices of the holy training and cast scorn on priests of more humble origins. Most did share the belief that the convocations and novenas which would be held in her honor would only serve good.

Her supporters remained staunch, and in the example of the church abroad, spent many hours and years gathering writings that would enable all to participate in her sanctity.

St. Lascaux and St. Lascaux

Descended from an old and distinguished family of revered chefs, the twin saints could trace their roots back to the early cave dwellers whose fabled recipe for game stew is said to have been recorded in antiquity but is now lost.

In the time of the brothers Lascaux the family honor exceeded its resources, nonetheless, the brothers had to struggle all their lives with the sins of pride and grandiosity. It was to humble themselves that they joined the Conservatine Order where they came in time to work in the monastery kitchens. In this modest service each developed his own recipe for a miraculous creamy white soup, made only of ingrediants approved by the abbot. This brought honor and welcome donations from those who were blessed with the consolidation of their health upon drinking the soup.

A small illustration in the *Guide d'Hours du Duc de Micheline* is considered to portray the brothers. They are seen in their kitchen stirring pots of soup; one is shown with a halo of thirty six stars and the other with forty eight.

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