

*Rod Ewins*

## Matting and Framing Prints and Drawings

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As a practising printmaker and papermaker, for over 30 years I have been teaching people how to make, curate and exhibit prints. I have also always made drawings with a range of media. The following advice is offered to help you look after the prints you have made or purchased. How your print is framed has a great bearing on how good it looks on your wall, and its life expectancy. Properly matted and framed, it looks good, and is protected from the elements. Treated well, paper is a durable substance, and protected from consistent bright light, most modern inks are relatively colour-stable. But if your print is not protected from direct bright light, and is incorrectly framed, colours will fade, paper will discolour, and its life, and your investment and pleasure in it, will all be greatly diminished.

I have on occasion been asked by concerned owners to come and look at prints of mine that have wrinkled, faded, or suffered in other ways. These have never been prints I have matted and framed, but were invariably the victims of sloppy or ignorant tradesmen who have used poor materials and/or bad practices. I have sometimes been able to perform emergency restorative work, but not always. The moral is, either do it yourself in the ways described below, or get the work done by a reputable professional, giving him/her clear instructions about what you expect. If you don't know of such a person in your area, contact the professional printmaking body in your country for advice. In Australia this is the Print Council of Australia, whose address is:

PO Box 2949

Fitzroy Victoria 3065

Tel 03 9416 0150

Email: [generalmanager@printcouncil.org.au](mailto:generalmanager@printcouncil.org.au)

Webpage: <https://www.printcouncil.org.au/>

Finally, feel free to print out and give a copy of this set of notes to your framer. If he/she knows it all, they won't resent it since it merely confirms their current best practice. If they don't, they may find the information useful and be happy to act on it. If neither of these apply, go elsewhere.

### **(a) The frame itself**

Prints are usually relatively delicate images, and the frame should generally be subtle, not heavy. Apparently paradoxically, often there is an inverse relationship between the size of the paper and the size of matt and weight of frame. That is, a small print can often benefit from a fairly large matt and sometimes a more solid

and/or elaborate frame. The exception would be if the print is intended to be hung in a cluster with a lot of other small images, in which case it may be desirable to keep the unit size small and uniform. Up to a certain size (about 56cm x 76cm) the weight of the frame can then be reduced, the effect being to emphasise the size of the print. Beyond that size, a light frame can look inadequate. Also, on very large prints the image is probably more robust, and a larger matt and frame become desirable – even quite large, heavy frames can look fine and make the whole look imposing.

## **(b) The matt.**

Within limits, also, as the paper size increases, the visible matt area surrounding the print should decrease or the print will be dwarfed - a big print is overwhelmed by, not set off by, an overly wide matt.

Three things are critically important to consider in matting:

**(1) ACID-FREE MATTBOARD MUST be used.** Cellulose (of which paper is made) contains no acid in its original vegetable state, but most mass-production paper mills employ acidic bleaches which, solely for reasons of cost, they inadequately remove before final sheet-formation. These acids progressively attack the cellulose, especially at higher temperatures, making it brittle and burning it brown (we are all familiar with newsprint left in the sun turning brown in a day or two). The pH of good paper should be 7.5 - 8, but in newsprint it is often as low as 4-5 (7 is neutral).

The cheaper matt-boards (which includes virtually all of the coloured boards) are also almost invariably quite acidic, which not only burns the paper under them, but leaks out of the cut edge onto the print, burning the paper brown next to the image itself. I, like most professional printmakers these days, use only the best papers, usually mould-made or handmade cotton papers, which are guaranteed non-acidic. To put these behind acidic mattboards makes our care and cost pointless, but every day thousands of prints all over the world are subjected to this by unprofessional framers.

So, INSIST that your framer uses acid-free mattboard, and ask him/her to show you the label off the pack of mattboard he is using, as proof that he has. Don't be frightened of giving offence - if they are reputable professionals, they will be proud to show you that they know their trade, and will be pleased that you appreciate their care. If their response to your request is grumpy, go elsewhere. It's your investment, not theirs.

Two pieces of matt-board should always be used, in the form of a folder, one behind the print (against which the print is held, as described in the next section) and one in front of it, with a "window" cut in it to show off the print. The edges of this window must be cut on a 45° bevel - a straight-down cut using thick mattboard looks bad. The gap between the "plate-mark" or printed area of the print and the edge of the window needs to be carefully judged. In the case of rectangular images, this is

normally about 3-4 mm, but if the image is an irregular shape, more space will need to be left to give the image space, and enhance the shape the artist carefully designed-in to his/her work. The two pieces of matt-board are hinged with a strip of acid-free linen tape or paper - NOT with sellotape, masking-tape or brown paper-tape. All of these are very dangerous to the print in the longer term.

## **(2) DO NOT PUT ANY FORM OF GLUE OR TAPE DIRECTLY ON THE PRINT.**

This is the other of the two worst crimes in framing prints. In the very rare situations where it is necessary to apply glue to prints at all (such as when restoring torn or very fragile prints) restorers use totally acid-free and easily water-soluble glues (starch or methyl cellulose) and specially-selected fine papers (strong, thin, Japanese washi paper is often used), so that anything they do is neither harmful nor irreversible. But even though it should not be used on the print itself, such acid-free, easily-soluble glue should be used on anything that comes even close to the print.

Acid-free starch glue can be made by boiling up white rice in distilled water until it goes "gluggy", then sieving it and using the paste that passes readily through the sieve (don't push it through or you will get lumps). The use of distilled water is important because unless tests can be done, there is always the danger that tap water will have a lot of iron in it, which will cause "foxing" — those brown speckles you see on some old prints and books.

**NEVER** use PVA glues like Aquadhere or Elmer's glue ANYWHERE NEAR your print. These are okay in woodworking, but they are lethal to paper. The late Claudio Alcorso asked me to look at a beautiful lithograph he had received as a personal gift from Marc Chagall. He was concerned because it appeared to be discolouring. When I removed it from the frame, I found that the Sydney-based and quite well-known "framer" had, with the finely-tuned instincts of a carpenter, glued the print down completely, using PVA glue, to a piece of yellow-brown strawboard, which is at least as acidic as newsprint. The combination of the ageing, browning PVA and the acid from the board had already irreparably damaged the print, and the glue was virtually impossible to remove. So I had to return the print to Claudio with the sad news that his print, which should have been worth several thousand dollars, now had sentimental value only and would progressively and rapidly suffer aesthetically too.

In fact, it is far preferable that not even acid-free, water-soluble glues are applied to the print, NOT EVEN AS "HANGING-HINGES". Even these can be impossible to remove later on without damaging the print. Many printmaking papers, especially those used for woodcuts and lithographs, are either very lightly "sized" or "unsized" (so-called "waterleaf" papers), so even the small amount of water needed to melt water-based paste can ruin them. I had an entire exhibition of prints that I had sent to Spain totally ruined by the gallery concerned, because they used masking-tape hinges on my unsized-paper prints to hang them in their temporary exhibition frames. The tape could not be left on, or it would sweat with age, and would not

come off without tearing chunks out of the prints. About 30 prints, at a value of several thousand dollars, were destroyed, and the gallery of course ignored my letters of outrage! Without attempting international legal redress, which would have cost me as much as the prints were worth, I had no option but to bear the loss.

What should be done, is to make small "corners" to hold the print. These should be made from acid-free paper that is considerably less solid than that used for the print — Japanese washi, particularly kozo (paper-mulberry) paper is ideal since, though it is light and thin, it is strong. To make these corners is a simple piece of pseudo-origami:



At stage 4, the non-acidic paste described above is used between the two folded-over flaps to create the pocket. When all four pockets have been made and the paste allowed to dry, one is slipped onto each corner of the print, with the double-thickness facing to the back of the print. The print is then carefully positioned so that it appears correctly through the window in the front sheet of the matt-board folder. Then paste is applied to the underneath of each pocket (the double-thickness side, so the glue won't seep through), and each is adhered to the back sheet of the matt-board folder.

### **(c) The transparent lens or shield.**

A lot has been written about the relative merits of glass and acrylic sheet (sold as Perspex or Plexiglass among other names) as a transparent lens to shield framed artworks. Glass has some drawbacks as well as some advantages. Its principal advantages are that it doesn't scratch easily, is easy to clean, and it is generally somewhat less expensive than acrylic sheet. Its most obvious drawbacks are that it is very heavy and very brittle. With very small pictures these are not major issues, but as the prints get larger and heavier they become very considerable problems. First, as size increases, glass becomes relatively easier to crack or break. Second, the weight makes the picture hard to handle, and makes hanging-points a major issue. Hooks of any sort on plaster walls, for example, become very precarious, and few modern houses have picture rails. And if the weight makes the print fall off the wall, it will almost certainly shatter, very possibly cutting the print.

Another drawback is that glass has a great tendency to "fog" inside the frame in changes of temperature, more so than acrylic, causing the matt and print both to cockle, and creating an ideal environment for the growth of mould.

And finally, ordinary picture glass does nothing to impede the passage of ultra-violet light, which damages paper and fades coloured inks and paints. Acrylic sheet is better in every one of the above respects.

In particular it is lightweight, and I have known of one large print that fell off a plaster when the string used to hang it with broke (not wire or chain, or at least high-breaking-strain nylon fishing line, which *should* have been used), and bounce all the way down a stairwell, without any damage to the frame, acrylic sheet or print. I hate to think what would have happened had glass been used.

Framers often don't like acrylic sheet because it is expensive to carry stocks of, requires more expertise to cut it well, and scratches easily. For that reason, they may not offer it if not asked. But if asked, they should be willing to supply it. Be careful though, that they aren't charging you for a whole 1.8m x 1.2m sheet of acrylic to frame your single 56cm x 76 cm print, just because they don't normally stock it! I consider that the extra cost is money well spent.

The two disadvantages of this material are that it tends to be electrostatic and attract dust, and that it scratches easily. Not a lot to do about the latter except be careful, but the former is very responsive to the aerosol antistatic sprays sold for vinyl sound-records (though those are very rare nowadays so it might be harder to track down).

Whether glass or acrylic, ideally, one should use ultraviolet-inhibiting versions. These days both are available from reputable framing-supply shops. Sample brands are Tru Vue Conservation Grade glass, and Plexiglass Gallery acrylic.

Prints should not be allowed to come into contact with the lens, whether glass or acrylic. Sandwiching the print between the lens and a backing sheet is very common practice but is bad practice. If any sweating does occur in this situation, the print can actually stick to the lens and become impossible to remove without damage. If a matt is used as described above, this is not a problem since the print is separated by the thickness of the front piece of board. But if it is wished to display a print without an edging of visible mattboard, narrow strips of acid-free mattboard should be cut and adhered to the edges of the lens with the paste mentioned above, concealed by the frame but holding the glass or acrylic off the surface of the print. Particularly in the case of acrylic, which is flexible, it may be necessary to make these strips double-thickness.

#### **(d) Locating the completed picture**

Finally, where do you hang the print? Obviously, you will wish to put it somewhere where people will see it, but there are a couple of classic DON'Ts. **DON'T** hang it above the mantelpiece over a fireplace or heater that are in use. This is the place

with one of the greatest temperature fluctuations in the house, and in no time flat the print and its matt will have cockled, and mould may grow inside the lens. **DON'T** hang it on a wall you know to be damp. If you don't know it, often outside walls of houses tend to have a higher moisture content than inside walls. The same problems of cockling and mould will occur. **DON'T** hang it where there is consistent strong light, particularly daylight or fluorescent light, which tends to have a fair bit of u/v. If you really must do this, EITHER invest in u/v resistant acrylic (I have done this with some prints I wanted to locate near windows etc, and after 20 years they show no sign of fading, discolouration or damage of any sort), OR make a neat little curtain that is attached to the top of the frame and hangs over the print so that when it is not being looked at, it is protected from the light. If you use velcro buttons to attach the curtain to the top back of the frame, you can simply detach the curtain when you are having guests or want to sit and contemplate it. This is clearly more trouble than using the u/v resistant lens material, but that can be hard to come by and is expensive. If you ignore this advice and hang your print in bright light, you can fully expect some of the colours in your print to fade (particularly dye-colours such as magenta and crimson and the pink derivatives of these, blue-greens and prussian and turquoise blues), and if there is any trace of acid in the paper, for it to start yellowing or browning.

If all the above points are taken into account, you can expect many years of pleasure from your prints, and they will retain, hopefully even increase in, value.

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#### **LINKS:**

**(Australia)** [The Alchemist](#), supply store and archival framing (Melbourne)  
[Right Angles](#) picture framing (Sydney)

[Artery](#) art supply store (Hobart)

[Gallery 360](#) Online store (Perth)

**(USA)** [Light Impressions](#), suppliers for materials for mounting and framing artworks on paper

U.S. Library of Congress [Guide to Preservation Matting & Framing](#)

