

MATERIALS LIST

1. Drawing equipment:

Pencils: at least 2 different hardnesses, ideally 2H and HB. In any form, either: wooden artists pencils of good quality (e.g. Staedtler, Faber Castell) OR a clutch pencil/lead holder which holds a 2mm-sized lead (e.g. Mars Technico or Staedtler).

Sharpener: a blade (e.g. scalpel or stanley knife); or lead pointer for a lead holder.

Eraser: a white plastic eraser.

Measuring device: a clear plastic ruler or set-square. Dividers (simple ones with two points, OR proportional dividers. The latter are very expensive so not necessary to buy, although cheap versions are available).

Paper: 2 - 3 x A4 sheets of good quality, heavy cartridge paper, e.g. 160 – 200gsm, with a relatively smooth surface (although not too smooth – a little tooth/texture is desirable).

If you have an existing sketchbook you like to work in, bring it

2 x A4 sheets of tracing paper

2. Watercolour equipment:

Watercolour paints – Recommended: Winsor & Newton Professional Quality *or similar*. (Winsor & Newton is the brand most used by Kew Artists). Half-pans are the most economical form, or you can use tubes. A limited palette is recommended, using 2 x of each primary colour (yellow, red, blue); plus additional pigments for bright petal colours and toning. Each primary represents a “cool” or “warm” version. An example **primary palette** is:

Cadmium Yellow,* Cadmium Lemon,* Cadmium Red*, Permanent Alizarin Crimson, French Ultramarine, Winsor Blue Green Shade.

*Please note: cadmium colours are being phased out, so “cadmium free” versions of these are now available. You can also substitute with Winsor Yellow/Winsor Lemon, Aureolin, Indian Yellow, Winsor Red

Plus: Payne’s Grey, Winsor Violet, Permanent Rose, Neutral Tint, Permanent Sap Green

Students with existing watercolour paints can use what they already have, provided they are of good quality.

Please research similar primaries in other good quality brands (eg. Daniel Smith, Schminke) if you wish to use them. Please choose *lightfast pigments* of good *permanence*.

Small amounts some watercolour colours will be available for students to try out and use.

Watercolour paper - Type: a smooth surfaced paper (Hot Press, HP, grana satinata) of good quality and weight (minimum 300gsm – grams/square metre) is recommended. *There have been quality issues with papers previously favoured by botanical artists* in the past few years, which are still unresolved.

Brands: We currently recommend: Saunders Waterford HP “high white” 300gsm ; Fabriano 5 300gsm (occasionally of varied quality); Arches Satine 300gsm, Fluid, Fabiana Artistico (can be variable), Botanical Ultra Smooth.

Quantity: 2 x A3 or 3 x A4 or similar size.

Small amounts of watercolour paper will be available to purchase in class.

Brushes

1. A round watercolour brush/es made from either sable hair or synthetic.

We recommend a Winsor & Newton "Series 7," Size 1 sable brush for general use. (Series 7 is the style of brush, and the size number relates to the size of the bristles). This is a good all-rounder size, and you are welcome to buy additional sizes, for example a smaller size such as 00 or 0, or a 2, 3 or 4 W&N Series 7 or equivalent.

The equivalent size and shape in a less expensive synthetic brush is a Daler Rowney "gold taklon" Round, no. 2 or 3. These brushes come in a handy pack which include several sizes and a couple of flat shaders (see links below).

2. A "flat shader," synthetic brush, size 1 or 2.

3. Any synthetic brush for mixing up colours on the palette.

Palette – a ceramic palette, flat or with wells; or a white ceramic plate, for mixing and diluting paints before application. Plastic palettes do not work well with watercolour, as paint must be allowed to dry out on the palette for dry brushwork, and plastic doesn't do this well.

FOR ALL QUERIES ABOUT MATERIALS, please email Lucy Smith: l.smith@kew.org

Useful links (for description purposes only) of materials listed above:

Clutch pencil, 2mm leads:

Mars Technico (different leads can be purchased) <https://www.staedtler.com/intl/en/products/technical-drawing-instruments/technical-pens-drawing-ink/mars-technico-780-leadholder-m780/>

Staedtler <https://www.faber-castell.co.uk/products/TK9400clutchpencilHB%c3%982mm/139400>

<https://www.faber-castell.co.uk/products/TK4600clutchpencil%c3%982mm/134600>

"lead pointer" sharpener for 2mm clutch pencil: <https://www.staedtler.com/intl/en/products/pencils-and-accessories/sharpeners/mars-502-lead-sharpener-tub-502/>

Wooden pencils:

Staedtler Mars Lumograph: <https://www.staedtler.com/intl/en/products/pencils-and-accessories/graphite-pencils/mars-lumograph-100-drawing-pencil-m100/>

Faber Castell 9000: https://www.cultpens.com/i/q/FC05496/faber-castell-9000-pencil?glCountry=gb&gclid=EAlaIqobChMIj_Hi7dTu8QIV4oBQBh3RbQJxEAQYBSABEgKTQvD_BwE&gclsrc=aw.ds#FC05496-HB-1

Eraser: <https://www.staedtler.com/uk/en/products/pencils-and-accessories/erasers/mars-plastic-526-50-eraser-in-premium-quality-526-50/>

Dividers: <https://www.pullingers.com/p/JK1152/technical-drafting-tools/jakar/jakar-dividers>

Proportional dividers: https://www.londongraphics.co.uk/ecobra-proportional-divider?gclid=EAlaIqobChMI1eGw_OD6-AIVSJ7tCh2zNgw5EAQYAiABEgKpJfD_BwE

<https://www.ebay.co.uk/itm/201824027360>

Paper: <https://www.cassart.co.uk/surfaces-category/paper-surface/product-type-paper/cass-art-heavyweight-cartridge-pad-200gsm-25-sheets.htm>

Watercolour paintbrushes

Winsor & Newton Sable Series 7: <https://www.winsornewton.com/uk/brushes/watercolour-brushes/series-7-kolinsky-sable-brushes/>

Winsor & Newton Synthetic Sable: <https://www.winsornewton.com/uk/brushes/watercolour-brushes/professional-watercolour-synthetic-sable-brushes/>

Daler Rowney Gold Taklon: <https://www.ryman.co.uk/daler-rowney-simply-gold-taklon-synthetic-brushes-pack-of-6>

Watercolour paper

Saunders Waterford (High White, HP) <http://www.stcuthbertsmill.com/st-cuthberts-mill-paper/saunders-waterford-watercolour/#prettyPhoto>

Arches Satine 300gsm HP (**some artists report problems with this paper recently)

<https://arches-papers.com/arches-range-of-papers/watercolor-and-wet-techniques/arches-aquarelle/>

Fabriano 5 300gsm HP (**some artists report problems with this paper recently)

<https://www.fabrianoboutique.co.uk/album-fabriano-5.html>

Fabriana Artistico 300gsm grana satinata (**some artists report problems with this paper recently)

<https://www.pullingers.com/c/435/fabriano-artistico-watercolour-paper-sheets>

Botanical Ultra Smooth

<https://www.jacksonsart.com/st-cuthberts-botanical-ultra-smooth-watercolour-paper-70x50cm-300gsm>

Sketchbooks and Cartridge Pads

Daler Rowney Ebony (has had a recent change, and is smoother – not as nice – than previously:

<https://www.daler-rowney.com/ebony-artist-s-sketchbooks/>

Fabriano: https://www.fabrianoboutique.co.uk/collections/fabriano-arte/venezia-book.html?_SID=U

Cass Art 200gsm Cartridge paper: <https://www.cassart.co.uk/drawing/paper-3/product-type-paper/cass-art-heavyweight-cartridge-pad-200gsm-25-sheets.htm>

Tracing paper: <https://www.cassart.co.uk/surfaces-category/paper-surface/tracing-paper/cass-art-tracing-90gsm-pad-45-sheets.htm>