

Regenerative Textiles: Colours & Techniques

Natural dyes in North West England

Gina Frausin^{1,2,3,4}, Katrina Barnish^{2,4}, Enda O'Regan^{2,3,4}, Kathy Barton³ & Victoria Frausin^{2,3,4}

¹ Independent researcher. ² Sewing Cafe Lancaster. ³ Claver Hill. ⁴ Textile Care Collective

Photos by Gina Frausin, except where indicated. Produced by: Gina Frausin [ginafrausin@gmail.com]; sewingcafelancaster@gmail.com; textilecarecollective@gmail.com



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For centuries, the source of all dyes was natural resources. Amazing colors from plants, animals and minerals inspired the shades of textile, food, wood, leather and other materials. However, with the boom of the textile industry, fast fashion and the emergence of synthetic dyes, the ancient natural colorant techniques are being forgotten and with them the knowledge about the uses of dye plants. Unlike natural dyes, industrial pigments generate enormous environmental impacts, for the health of humans and other organisms on the planet, due to their high toxicity, carcinogenic potential. More recently studies have revealed mutagenic potentiality of some synthetic dyes, that can intercalate with the helical structure of DNA and duplex RNA (see Hunger, 2003; Christie, 2007; Haq et al. 2018; Khan et al. 2016; Khan et al. 2018; Lellis et al. 2019; Hossen et al. 2019).

The Natural Dyes Project was created by Sewing Café Lancaster as a result of teamwork by dyers, designers, botanists, plant experts and photographers with the aim of developing skills and knowledge linked to natural dyeing, as well as raising awareness about the harmful impacts of the synthetic dyes. Our field guide is intended to illustrate some plant species that grow in our living collection of dye plants, wild and / or spontaneous species in the North of England and other exotic plants that are commercialized in the area.



Onion dyed samples
by Katrina Barnish

Photo by Katrina Barnish



Dyed samples in silk
by Katrina Barnish



1 Spinach
Spinacia oleracea L.
AMARANTHACEAE



Onion dyed samples
by Katrina Barnish



2 Onions
Allium cepa L.
AMARYLLIDACEAE

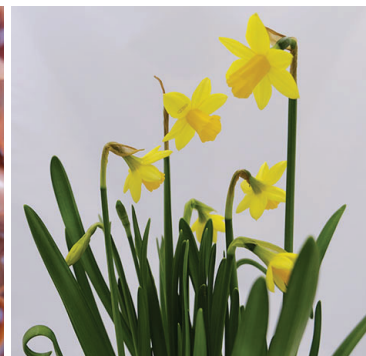


Onion dyed samples
by Katrina Barnish

Photo by Katrina Barnish



Onion peels



3 Daffodils
Narcissus spp.
AMARYLLIDACEAE



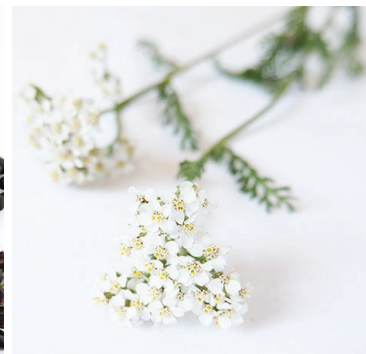
4 Daffodils flowers



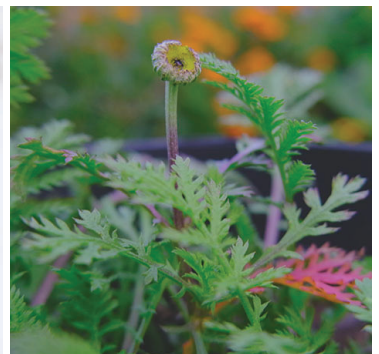
5 Carrot
Daucus carota L.
APIACEAE



6 Ivy
Hedera helix L.
ARALIACEAE



7 Yarrow
Achillea millefolium L.
ASTERACEAE



8 Dyer's chamomile
Anthemis tinctoria L.
ASTERACEAE


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10 **Calendula**
Calendula officinalis L.
ASTERACEAE



11 **Calendula**
Calendula officinalis L.
ASTERACEAE



Calendula petals

Photo by Katrina Barnish



Calendula dyed samples
by Katrina Barnish



12 **Coreopsis**
Coreopsis tinctoria Nutt.
ASTERACEAE



13 **Common dandelion**
Taraxacum officinale L.
ASTERACEAE



14 **Sunflowers**
Helianthus annuus L.
ASTERACEAE



16 **Tansy**
Tanacetum vulgare L.
ASTERACEAE



French marigolds dyed samples
by Katrina Barnish



15 **French marigolds**
Tagetes erecta L.
ASTERACEAE



Tansy dyed samples
by Katrina Barnish



17 **Alder cone**
Alnus glutinosa (L.) Gaertn.
BETULACEAE



Alder cone dyed samples
by Katrina Barnish



18 **Birch**
Betula pendula Roth
BETULACEAE


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19 **Common Alkanet**
Anchusa officinalis Gouan
BORAGINACEAE



20 **Comfrey**
Symphytum asperum Lepechin
BORAGINACEAE



21 **Hazel**
Corylus L.
BETULACEAE



22 **Cabbage**
Brassica oleracea L.
BRASSICACEAE

Photo by Katrina Barnish



23 **Cabbage**
Brassica oleracea L.
BRASSICACEAE

Photo by Katrina Barnish



24 **Woad**
Isatis tinctoria L.
BRASSICACEAE



25 **Red dogwood**
Cornus spp.
CORNACEAE



26 **Eco-printing of Soft Shield Fern**
Polystichum setiferum (Forssk.) T. Moore ex Woyn.
DRYOPTERIDACEAE



27 **Heather**
Calluna vulgaris L.
ERICACEAE



28 **Blueberries**
Vaccinium corymbosum L.
ERICACEAE



29 **Black beans**
Phaseolus vulgaris L.
FABACEAE



30 **Soy Milk**
Glycine max (L.) Merr.
FABACEAE



31 **Oak**
Quercus robur L.
FAGACEAE

Photo by Enda O'Regan



32 **St John's Wort**
Hypericum perforatum L.
HYPERICACEAE

St John's Wort dyed samples
by Katrina Barnish



33 **Iris**
Iris spp.
IRIDACEAE

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34 **Avocado**
Persea americana Mill.
LAURACEAE



Avocado seeds



35 **Pomegranate**
Punica granatum L.
LYTHRACEAE



38 **Eucalyptus**
Eucalyptus spp.
MYRTACEAE



36 **Hollyhocks**
Alcea rosea L.
MALVACEAE



37 **Hollyhocks**
Alcea rosea L.
MALVACEAE



39 **Cider gum tree**
Eucalyptus gunnii Hook. f.
MYRTACEAE



40 **Pine cones**
Pinus spp.
PINACEAE



41 **Rhubarb**
Rheum rhabarbarum L.
POLYGONACEAE



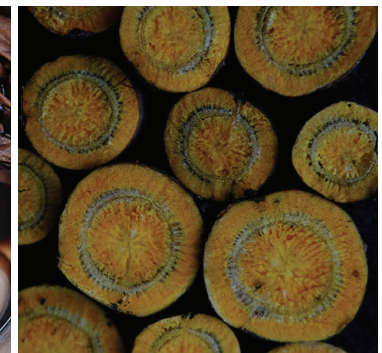
Shibori technique with Dock roots
by Katrina Barnish



42 **Dock**
Rumex spp.
POLYGONACEAE



Dye bath with Dock roots



Dock roots


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43 **Sorrel**
Rumex sp.
POLYGONACEAE



44 **Sorrel**
Rumex sp.
POLYGONACEAE



45 **Weld**
Reseda luteola L.
RESEDACEAE



46 **Buckthorn**
Rhamnus cathartica L.
RHAMNACEAE

Photo by Katrina Barnish



Buckthorn dyed samples
by Katrina Barnish

Photo by Katrina Barnish



47 **Buckthorn (berries)**
Rhamnus cathartica L.
RHAMNACEAE



48 **Buckthorn**
Rhamnus cathartica L.
RHAMNACEAE
Photo by Enda O'Regan



49 **Hawthorn**
Crataegus monogyna Jacq.
ROSACEAE



50 **Hawthorn (berries)**
Crataegus monogyna Jacq.
ROSACEAE

Photo by Katrina Barnish



Hawthorn dyed samples
by Katrina Barnish



51 **Apple**
Malus domestica (Suckow) Borkh.
ROSACEAE



52 **Rosehip**
Rosa sp.
ROSACEAE



53 **Blackberries**
Rubus fruticosus L.
ROSACEAE



54 **Plum**
Prunus domestica L.
ROSACEAE


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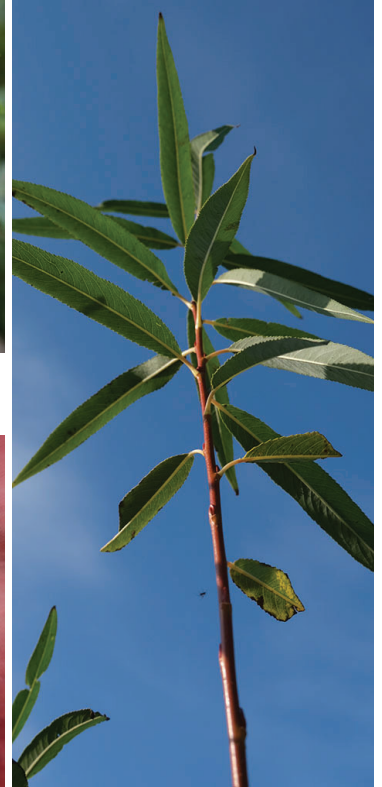
Dyed samples in wool
by Katrina Barnish



55 **Blackthorn**
Prunus spinosa L.
ROSACEAE



56 **Madder**
Rubia tinctoria Salisb.
RUBIACEAE



57 **Willow**
Salix alba L.
SALICACEAE



Madder dyed sample
by Katrina Barnish



Black tea dyed samples
by Katrina Barnish



58 **Black tea**
Camellia spp.
THEACEAE



59 **Eco-printing of Sycamore**
Acer pseudoplatanus L.
SAPINDACEAE



60 **Nettle**
Urtica dioica L.
URTICACEAE



61 **Nettle**
Urtica dioica L.
URTICACEAE



62 **Nettle**
Urtica dioica L.
URTICACEAE



Elderberries leaves, berries dyed
sample by Katrina Barnish


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63 **Elderberries**
Sambucus nigra L.
VIBURNACEAE



Elderberries dyed samples
by Katrina Barnish



64 **Guelder-rose**
Viburnum opulus L.
VIBURNACEAE



Turmeric dyed samples
by Katrina Barnish



65 **Turmeric**
Curcuma longa L.
ZINGIBERACEAE



Dyed samples in cotton
by Katrina Barnish



Eco-printing



Shibori technique with Dock roots



Dyed sample red onions on wool
by Katrina Barnish

Photo by Katrina Barnish



Dyed samples with soy milk and tea
by Katrina Barnish

Photo by Katrina Barnish



Eco-printing on paper
by Katrina Barnish



Dyed samples in cotton
by Katrina Barnish



Samples of plants for dyes