Plant Schedule

Trees

Number	Abbreviation	Species	Height	Girth	Specification	Density
3	AcE	Acer campestre 'Elsrijk'	400-450cm	14-16cm	3x; Extra Heavy Standard; clear stem minimum 200cm; 5 breaks; RB	Counted
3	Agl	Alnus glutinosa	400-450cm	14-16cm	3x; Extra Heavy Standard; clear stem minimum 200cm; 5 breaks; RB	Counted
3	ARH	Amelanchier x grandiflora 'Robin Hill'	350-425cm	12-14cm	3x; Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted
5	Bn	Betula nigra	400-450cm	14-16cm	3x; Extra Heavy Standard; clear stem minimum 200cm; 5 breaks; RB	Counted
2	CbF	Carpinus betulus 'Fastigiata'	400-450cm	14-16cm	3x; Extra Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted
3	ME	Malus 'Evereste'	350-425cm	12-14cm	3x; Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted
3	PAB	Prunus maackii 'Amber Beauty'	350-425cm	12-14cm	3x; Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted
5	SaM	Sorbus aria 'Majestica'	400-450cm	14-16cm	3x; Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted
4	SaSS	Sorbus aucuparia 'Sheerwater Seedling'	350-425cm	12-14cm	3x; Heavy Standard; clear stem 175-200cm; 5 breaks; RB	Counted

Total :31

Hedge Planting

Number	Abbreviation	Species	Height	Specification	Density
177	Lv	Ligustrum vulgare	80-100cm	0/2; Cutting; branched; 3 breaks; B	0.3Ctr Double Staggered at 0.25m offset

Shade Mix

Number	Species	Height	Diameter	Pot Size	Specification	Density	Percentage
131	Asplenium scolopendrium			2L	Full pot	0.5Ctr	15%
158	Dicentra eximia			2L	Full pot	0.45Ctr	15%
198	Epimedium youngianum 'Niveum'			2L	Full pot	0.4Ctr	15%
131	Pachysandra terminalis		15-20cm	3L	Several shoots; 9 breaks	0.5Ctr	15%
90	Sarcococca humilis	20-25cm		3L	Bushy; 6 breaks	0.5Ctr	10%
93	Skimmia confusa 'Kew Green'	30-40cm		5L	Bushy; 4 breaks	0.6Ctr	15%
93	Viburnum davidii	20-30cm		3L	Bushy; 3 breaks	0.6Ctr	15%

Total :894

SuDS Mix

Number	Species	Pot Size	Specification	Density	Percentage
110	Amsonia tabernaemontana salicifolia	2L	Full pot	0.5Ctr	15%
61	Gaura lindheimeri	3L	Full pot	0.6Ctr	10%
127	Geum rivale	1-1.5L	Full pot	0.45Ctr	15%
76	Hakonechloa macra	3L	Full pot	0.6Ctr	15%
127	Lythrum salicaria	2L	Full pot	0.45Ctr	15%
76	Pennisetum alopecuroides 'Hameln'	3L	Full pot	0.6Ctr	15%
127	Verbena bonariensis	3L	Full pot	0.45Ctr	15%

Total :704

Sun Mix

Number	Species	Height	Pot Size	Specification	Density	Percentage
256	Ajuga reptans		2L	Full pot	0.45Ctr	10%
307	Briza media		3L	Full pot	0.45Ctr	12%
127	Bupleurum fruticosum	20-30cm	2L	Bushy; 3 breaks	0.6Ctr	8%
214	Geranium 'Johnson's Blue'		3L	Full pot	0.5Ctr	10%
64	Hypericum androsaemum	30-40cm	3L	Bushy; 5 breaks	0.7Ctr	4%
256	Malva moschata		1-1.5L	Full pot	0.45Ctr	10%
179	Molinia caerulea		2L	Full pot	0.6Ctr	12%
212	Persicaria affinis 'Superba'		3L	Full pot	0.45Ctr	8%
165	Scabiosa columbaria 'Butterfly Blue'		3L	Full pot	0.45Ctr	6%
256	Silene vulgaris		3L	Full pot	0.45Ctr	10%
120	Spiraea japonica 'Firelight'	30-40cm	5-7.5L	Bushy; 7 breaks	0.7Ctr	10%

Total :2156

Native Structure Planting

Number	Abbreviation	Species	Height	Pot Size	Specification	Percentage
200	Csa	Cornus sanguinea	60-80cm		1+1; Transplant - seed raised; branched; 3 breaks; B	10%
239	Cav	Corylus avellana	60-80cm		1+2; Transplant - seed raised; branched; 3 breaks; B	12%
239	Cmo	Crataegus monogyna	60-80cm		1+1; Transplant - seed raised; B	12%
192	Eeu	Euonymus europaeus	60-80cm		1+2; Transplant - seed raised; branched; 5 breaks; B	13%
31	Ia	Ilex aquifolium	60-80cm	3L	Leader with laterals	4%
81	LONPE	Lonicera periclymenum	60-80cm	3L	Caned; several shoots; 3 breaks	4%
147	Rca	Rosa canina	60-80cm		1+1; Transplant - seed raised; branched; 3 breaks; B	10%
161	Sn	Sambucus nigra	60-80cm		1+1; Transplant - seed raised; branched; 3 breaks; B	11%
161	VIBLA	Viburnum lantana	60-80cm		1+2; Transplant - seed raised; branched; 3 breaks; B	11%
192	VIBOP	Viburnum opulus	60-80cm		1+2; Transplant - seed raised; branched; 3 breaks; B	13%

Total :1643

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Planting Schedules **L5**

Damp grassland areas over soakaway area to be seeded with Wetland Seed from Wyndrush Wild (or EM8 Meadow Mixture for Wetlands from Emorsgate)

Suggested Sowing Rates
5g/m^2

(if using EM8 then suggested sowing rates are:)
(40kg/ha 16kg/acre 4g/m2)

Description
Contains species suitable for seasonally wet soils and is based on the vegetation of traditional floodplain and water meadows. Soils in wet meadows may flood for short periods in winter, but are usually well drained in summer.

Ground Preparation
Endeavour to select ground that is not highly fertile and does not have a problem with perennial weeds. Good preparation is essential to success so aim to control weeds and produce a good quality seed bed before sowing.

To prepare a seed bed first remove weeds using repeated cultivation. Then plough or dig to bury the surface vegetation, harrow or rake to produce a medium tilth, and roll, or tread, to produce a firm surface.

Sowing
Sowings on ground prone to winter flooding are safest either in the early autumn or in spring once the land has drained. Most plants need time to grow mature enough to withstand flooding.

The seed must be surface sown and can be applied by machine or broadcast by hand. To get an even distribution and avoid running out, divide the seed into two or more parts and sow in overlapping sections. Do not incorporate or cover the seed but firm in with a roll, or by treading, to give good soil/seed contact.

First Year Management
Most of the sown meadow species are perennial and are slow to establish. Soon after sowing there will be a flush of annual weeds, arising from the soil seed bank. These weeds can look unsightly, but they will offer shelter to the sown seedlings, are great for bugs, and they will die before the year is out. So resist cutting the annual weeds until mid to late summer, especially if the mixture contains Yellow Rattle, or has been sown with a nurse of cornfield annuals. Then cut, remove and compost. Early August is a good time. This will reveal the young meadow, which can then be kept short by grazing or mowing through to the end of March of the following year. Dig out any residual perennial weeds such as docks.

Management Once Established
In the second and subsequent years sowings can be managed in a number of ways which, in association with soil fertility, will determine the character of the grassland. The best results are usually obtained by traditional meadow management based around a main summer hay cut in combination with autumn and possibly spring mowing or grazing.

Meadow grassland is not cut or grazed from spring through to late July/August to give the sown species an opportunity to flower. After flowering in July or August take a 'hay cut' : cut back with a scythe, petrol strimmer or tractor mower to c 50mm. Leave the 'hay' to dry and shed seed for 1-7 days then remove from site. Mow or graze the re-growth through to late autumn/winter to c 50mm and again in spring if needed.

Wetland habitats are characteristically quite variable in composition, reflecting local drainage and management. Conditions can vary, for instance, between the highs and lows in ridge and furrow grassland. Localized differences may require a targeted approach. For example, boggy areas which remain waterlogged for much of the year may be best sown with pond edge mixture (such as EP1 from Emorsgate).

Composition
Whorled caraway, small sedges, ragged robin, greater bird's-foot trefoil and compact rush are among the species in this mixture.

Ref:
https://wildseed.co.uk/product/mixtures/complete-mixtures/meadow-mixtures-for-specific-soils/meadow-mixture-for-wetlands/

Species-rich grass mix such as Emorsgate Seeds EM1: Basic General Purpose Meadow Mixture

Suggested Sowing Rates
40kg/ha 16kg/acre 4g/m2

Description
This is a simple low cost meadow mixture suitable for a wide range of soil types. The wild flowers are robust and showy, and the grasses are fine and slow growing.

Ground Preparation
Endeavour to select ground that is not highly fertile and does not have a problem with perennial weeds. Good preparation is essential to success so aim to control weeds and produce a good quality seed bed before sowing.

To prepare a seed bed first remove weeds using repeated cultivation. Then plough or dig to bury the surface vegetation, harrow or rake to produce a medium tilth, and roll, or tread, to produce a firm surface.

Sowing
Seed is best sown in the autumn or spring but can be sown at other times of the year if there is sufficient warmth and moisture. The seed must be surface sown and can be applied by machine or broadcast by hand. To get an even distribution and avoid running out divide the seed into two or more parts and sow in overlapping sections. Do not incorporate or cover the seed but firm in with a roll, or by treading, to give good soil/seed contact.

First Year Management
Most of the sown meadow species are perennial and are slow to establish. Soon after sowing there will be a flush of annual weeds, arising from the soil seed bank. These weeds can look unsightly, but they will offer shelter to the sown seedlings, are great for bugs, and they will die before the year is out. So resist cutting the annual weeds until mid to late summer, especially if the mixture contains Yellow Rattle, or has been sown with a nurse of cornfield annuals. Then cut, remove and compost. Early August is a good time. This will reveal the young meadow, which can then be kept short by grazing or mowing through to the end of March of the following year. Dig out any residual perennial weeds such as docks.

Management Once Established
In the second and subsequent years EM1 sowings can be managed in a number of ways which, in association with soil fertility, will determine the character of the grassland. The best results are usually obtained by traditional meadow management based around a main summer hay cut in combination with autumn and possibly spring mowing or grazing.

Meadow grassland is not cut or grazed from spring through to late July/August to give the sown species an opportunity to flower.

After flowering in July or August take a 'hay cut': cut back with a scythe, petrol strimmer or tractor mower to c 50mm. Leave the 'hay' to dry and shed seed for 1-7 days then remove from site. Mow or graze the re-growth through to late autumn/winter to c 50mm and again in spring if needed.

Composition
EM1 is a complete mix composed of 10% native wild flowers and 90% slow growing grasses (by weight). The flower and grass components are also available to order separately as EM1F for the flower component and EG1 for the grass component.

Ref:
https://wildseed.co.uk/product/mixtures/complete-mixtures/general-purpose-meadow-mixtures/basic-general-purpose-meadow-mixture/

Wildflower Meadow seed mix for neutral to slightly acidic soils from Wyndrush Wild or similar

Suggested sowing rates
5g/m^2

Description
Seeds are all collected from meadows in Pembrokeshire consisting of mainly perennial species and a handful of annual and biennial species to create a permanent area of pure wildflowers.

Ground Preparation
Endeavour to select ground that is not highly fertile and does not have a problem with perennial weeds. Good preparation is essential to success so aim to control weeds and produce a good quality seed bed before sowing.

To prepare a seed bed first remove weeds using repeated cultivation. Then plough or dig to bury the surface vegetation, harrow or rake to produce a medium tilth, and roll, or tread, to produce a firm surface.

Sowing
Seed is best sown in the autumn or spring but can be sown at other times of the year if there is sufficient warmth and moisture. The seed must be surface sown and can be applied by machine or broadcast by hand. To get an even distribution and avoid running out divide the seed into two or more parts and sow in overlapping sections. Do not incorporate or cover the seed but firm in with a roll, or by treading, to give good soil/seed contact.

Aftercare
During the first year remove any weeds which grow before they run to seed, either by topping, mowing or by hand for smaller areas. Weed growth is common due to the action of disturbing the ground (rather than being caused by contaminated seed mixtures).

The area can be cut once the flowers have died back in the Autumn. We recommend leaving the area undisturbed for as long as possible, ideally until February/ March (before the first spring growth) to shed as much seed back into the soil. The dead flowers and stems also provide a diverse environment which is a haven for wildlife through the winter months. In particular, it provides habitat for butterflies such as the Red Admiral and the Clouded Yellow which remain in their chrysalis during the winter months.

Ref:
https://wildseed.co.uk/product/mixtures/complete-mixtures/general-purpose-meadow-mixtures/basic-general-purpose-meadow-mixture/
https://www.wildflower.co.uk/products/wildflower-seed-mixtures/100-wildflower-seed-mixtures/lw10-coastal-areas-100.html

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LANDSCAPE ARCHITECTS

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