



FREDERICK E. HULME





THE LIBRARY OF THE UNIVERSITY OF CALIFORNIA

PRESENTED BY
PROF. CHARLES A. KOFOID AND
MRS. PRUDENCE W. KOFOID



Γ	ТАТ	ROCK	-GARD	EN (OF (OURS	







SPRING GENTIAN and GENTIANELLA.

Frontispiece

THAT ROCK-GARDEN OF OURS

BY

F. EDWARD HULME

F.L.S., F.S.A.

AUTHOR OF "FAMILIAR WILD FLOWERS," "WAYSIDE SKETCHES,"
"MYTHLAND," "WILD FRUITS OF THE COUNTRYSIDE,"

WITH FIFTY ILLUSTRATIONS BY THE AUTHOR

"Long worke it were

Here to recount the endlesse progeny

Of all the weeds that bud and blossom there;

But so much as doth need must needs be counted here."

SPENSER

PHILADELPHIA

GEORGE W. JACOBS & CO.

PUBLISHERS

RN

PREFACE

BUT few introductory words appear to be necessary. The present book is the outcome of many years of country life. When this happy period in the fulness of time came to an end, and was exchanged for a home in the outskirts of the great Metropolis it was yet our happiness to endeavour to gather around us some floral reminiscences of those former days, to welcome our old friends of the countryside in our new surroundings.

This rus in urbe has been a great pleasure to us, and we would desire to share this pleasure with others, if by any words of commendation of ours we can so far interest them as to induce them to give a like welcome to these children of Nature.

The possession of valued friendships with others of like tastes has also enriched our floral store, while wanderings beyond our own shores have brought us in contact with much of botanical interest, valued alike for its own sake and for the happy memories associated with it.

This is really the whole matter, and, to those in sympathy with it, we trust a sufficient justification for the following pages.

F. E. H.



CONTENTS

CHAPTER I

PAGE

The fascination of gardening—Our Nature-corner—Broad catholicity of taste called for—The scouted "primrose by the river's brim"—The great charm of association—The preservation of our native Flora—Nature's power of recuperation—The aristocratic rock-garden, and the rockery of the artisan—The necessary material—Whence procured—A clinkery—Nature's rock-gardens—A corkery—Judicious and injudicious building-up—Tree-roots—Approximation to natural conditions—Shade, sunshine, moisture, or the absence of it—Suitable soils—The heresy of under-planting—What to plant—Continuous variation as time passes—The freemasonry linking together kindred spirits

13

CHAPTER II

Spring our starting-point—Bartholomeus on the influence of Spring—Our snowdrops—What is an indigenous plant?—Fair Maids of February—Colt's-foot—Rustic pharmacy — Medicinal plants — The "Castel of Helth"—The "Foure Bookes of Husbandry"—Necessity in olden days of plant-knowledge—The common butterbur, or pestilence-wort—The fragrant butterbur—Uninvited visitors—Wild arum—Primrose-time—The Beaconsfield cult—Appreciation of

	PAGE				
the poets — Mealy primrose — Seedling leaves—					
Germination of seeds-Vitality of seeds-Daffodils					
—Daffodil culture—Hyacinths — Buttercups — The					
lesser celandine—Nature study in our schools .	37				

CHAPTER III

Anemones, or wind-flowers—The yellow anemone—
The mountain anemone — The so-called hepatica
 Lady's-smocks — The monks as herbalists —
Plants as teachers of religion — Wood sorrel—
Solomon's-seal — Solomon as herbalist — Tusser's
"Fiue Hundred Pointes of Good Husbandrie"—
Lilies of the valley—Cosmopolitan plants—Our
familiar wildlings introduced into Japan, the United
States, Australia, &c. — Of intention or inadver-
tently — Our daisies — La Belle Marguerite —
Chaucer's favourite flower — The virtues of may-
dew-Ox-eyes-Names suggestive of resemblance
—The alkanets we grow

60

CHAPTER IV

Museum facilities for the identification of plants—The Star of Bethlehem—Dame d'onze heures — The greater and lesser periwinkles—Live and let live—Sorcerer's herb—The "Historie of Plants, set forth from the Almaigne toong"—The columbine, or culverwort — Lion's-tooth — The "Paradisus" of Parkinson—Red valerian—The fragrant garlic—The mariner's defence — Our rampant strayberries — The "Via recta" of Venner — Our various geraniums—The Doctrine of Signatures—Celandine—The mystical vervain

91

CHAPTER V

Woodruff-La Reine des bois-Ordinarily very little sentiment in the old plant-names—Goosegrass— Lavender — Strewing herbs — Sweet marjoram— The "Dyetery of Helthe" of Boorde-Bistort-Meadow-rue — The globe-flower — Goat's-beard— The salsify-Nap-at-noon-The speedwells-The sky-blue flowers of the borage - The herb of gladness-"The Art of Longevity"-Agrimony-Philanthropos-The bindweed of our hedges-Sea convolvulus — The much-encroaching yet welcome little field convolvulus - The yet more encroaching but less welcome buckwheat-The

CHAPTER VI

The unexpected springing-up of plants in most unlikely places - The botany of a London stable-yard-Distributing agency of birds—The Adonis-flower— Our various violets—The sweet violet as a medicinal herb-A flower beloved of the poets-Miss North's "Recollections of a Happy Life"—Broom—The fragrant wallflower-The erratic spelling of our forefathers-Stone-crop-Blake's "Compleat Gardener's Practice" — Snapdragons — Toadflaxes — Curious competition statistics—Saxifrages—Londonpride-Moisture-loving plants-Grass of Parnassus -Sarracenia-Moneywort, the reputed healer of one hundred diseases-Various un-grasslike grasses of popular nomenclature—Loosestrife—The cinquefoil and its allies—Ground ivv . 141

CHAPTER VII

Blackberry-Poole's "English Parnassus"-The stonebramble—Dewberries—Hop — Tremendous vigour

DACS

CHAPTER VIII

CHAPTER IX

Hemlock—Its medicinal service—Mediæval writers great plagiarists—Alexanders—Coles' "Art of Simpling"—Goutweed—Herb Gerard—Plant-names based on

	PAGE
supposed medical virtues—Herb Christopher—Rose-	
root—Foxglove—Plant-names based on colour—The	
mullein-House-leek-The Flora of an old thatched	
roof-Marsh orchis-Wild tulip-The musk	
mallow and field mallow-Milfoil, or yarrow-	
Sneezewort—Other plants of the genus—Tansy—	
Tansy pudding - Cogan's "Haven of Health"-	
Wormwood - Honesty - The yellow and white	
melilots—Cockle—The corn marigold—Feverfew—	
The red and white campions—Flax-leaved goldi-	
locks—Flax	24 I

CHAPTER X

The chequered fritillary, or snake's-head — Orange
balsam—Yellow balsam—Forget-me-not—Mediæval
dread of the scorpion—Ground pine—Rosemary—
The flower of remembrance—Rue—Fennel—The
serpent's medicine — Ragwort — Hare's-ear — The
pearly cudweed—Milk thistle—Apple—Mediæval
pomatum—Sea buckthorn—Buck's-horn plantain—
Echmacea — Globularia — A fernless rock-garden
unthinkable — Brake — Male fern — The gift of
invisibility—Lady fern—Hart's-tongue—Royal fern
—Adder's-tongue—Polypody — Hard fern — Scale
fern—Black spleenwort—Fungi—Autumn foliage . 27

ILLUSTRATIONS

(Plates I., VII., XIII., XXI., XXIV., XXIX., XXXVI., XLV., are in colour.)

PLATE FACE PAGE	PLATE FACE PAGE
I. GENTIANA VERNA AND GEN-	XXVIII. STONE - BRAMBLE AND
TIANELLA Frontispiece	CLAYTONIA PERFOLIATA . 170
II. DOUBLE ANEMONE AND	XXIX. CLAYTONIA SIBIRICA . 176
LADY'S-SMOCK 13	XXX. CAMPANULA PULLA AND
III. YELLOW ANEMONE AND	GERANIUM ARGENTEUM . 182
PRIMROSE 20	XXXI. CAMPANULA REINERI, DI-
IV. ALPINE ANEMONE AND SMALL	ANTHUS DELTOIDES, RHODO-
CELANDINE 26	DENDRON HIRSUTUM 188
V. SAXIFRAGA ELIZABETHEÆ,	XXXII. UPRIGHT MEADOW CROW-
ANEMONE HEPATICA, AND	
	FOOT AND CHEDDAR PINK . 194
HACQUETIA EPIPACTIS . 32	XXXIII. CERASTIUM GIBRALTAI-
VI. EVERGREEN ALKANET 38	CUM AND DIANTHUS NEG-
VII. COLUMBINE AND LESSER	LECTUS 200 XXXIV. GOUTWEED 206
SNAPDRAGON · · · 44	
VIII. DUSKY CRANE'S-BILL 50	XXXV. ROSE-ROOT AND FOXGLOVE 212
IX. SPIRÆA TOMENTOSA, GERA-	XXXVI. MARSH ORCHIS AND TULIP 218
NIUM NODOSUM, AND SEDUM	XXXVII. FLAX - LEAVED GOLDI-
RUPESTRE 56	LOCKS AND PERENNIAL
X. BLOOD GERANIUM AND PEN-	FLAX
CILLED GERANIUM 62	XXXVIII. HARE'S - EAR AND
XI. SNAPDRAGON AND CELANDINE 69	PEARLY CUDWEED 230
XII. SPIKED SPEEDWELL 74	XXXIX. APPLE 236
XIII. SALSIFY AND OX-EYE . 80	XXXIX. APPLE 236 XL. SEA BUCKTHORN 242
XIV. PINK BINDWEED 86	XLI. IBERIS SEMPERVIVENS,
XV. INULA MONTANA 92 XV. INULA HELENIUM 92	ACHILLEA RUPESTRIS 248
XV. INULA HELENIUM 92	XLII. BUCK'S-HORN PLANTAIN . 254
XVI. WALL-FLOWER 98	XLIII. SAXIFRAGA RHEI, RANUN-
XVII. YELLOW LOOSESTRIFE . 104	CULUS AMPLEXICAULIS, AND
XVIII. GOLDEN SAXIFRAGE AND	SAXIFRAGA CYMBALARIA . 260
SEA PLANTAIN IIO	XLIV. PRIMULA FRONDOSA, SAXI-
XIX. BLACKBERRY 116	FRAGA WALLACEI, AND S.
XX. DEWBERRY 122	TOMBEANENSIS 266
XXI. MONK'S-HOOD 128	XLV. ECHMACEA PURPUREA . 272
XXII. TUBEROUS COMFREY AND	XLVI. GLOBULARIA CORDIFOLIA,
PURPLE COMFREY 134	RANUNCULUS MONTANUS,
XXIII. YELLOW IRIS AND CORN-	AND LYCHNIS DIURNA . 278
FLOWER 141	XLVII. HIERACIUS INTYBACEUM
XXIV. FRAGRANT BUTTERBUR AND	AND HESPERIS MATRONALIS. 284
	XLVIII. VIOLA LUTEA AND CAM-
DAFFODIL 146 XXV. EDELWEISS 152	PANULA RHOMBOIDALIS . 290
XXVI. SOLDANELLA AND CYCLA-	XLIX. SENECIO DORONICUM AND
MEN NARCISSUS	SAXIFRAGA AIZOIDES 296
XXVII. CAMPANULA PUSILLA, BIS-	L. ACHILLEA TOMENTOSA AND
TORT, AND ONONIS FRUTICOSA 164	SENECIO AURANTIACUS 202
	SEINBULLU AUKANTIACUS . 202





DOUBLE ANEMONE and DOUBLE LADY'S SMOCK.

To face page 13.

That Rock-Garden of Ours

CHAPTER I

The fascination of gardening—Our Nature-corner—Broad catholicity of taste called for—The scouted "primrose by the river's brim"—The great charm of association—The preservation of our native Flora—Nature's power of recuperation—The aristocratic rock-garden, and the rockery of the artisan—The necessary material—Whence procured—A clinkery—Nature's rock-gardens—A corkery—Judicious and injudicious building-up—Tree-roots—Approximation to natural conditions—Shade, sunshine, moisture, or the absence of it—Suitable soils—The heresy of under-planting—What to plant—Continuous variation as time passes—The freemasonry linking together kindred spirits.

I has been laid down by no mean authority that gardening is one of the purest of earthly pleasures, and to all who have come under its fascination the statement would appear a very reasonable one. Our gardening may take the practical form of cultivating long rows of succulent lettuce, crisp celery, or such wealth of tender and

luscious peas as no mere dealing with the local greengrocer, before we had tasted the delights of a garden of our own, could at all have prepared us for; or we may have borders ablaze in glowing floral splendour; or, by patient persistence, such roses and chrysanthemums as once seemed to us but an ideal, a dream nowhere to be found on earth outside the wonder-compelling illustrations of the florist's catalogue.

When, however, we have reaped the reward of our labour in these well-ordered lines of acceptable produce for bodily needs, and when the æsthetic sense within us has been captivated by the rich fragrance, the magnificent colours of the treasures of our parterre, there remains even yet to us an added charm in the return to the sweet simplicity of nature, a corner somewhere where the delicate primroses may cluster and the ferns of the hedgerow unfold their spreading fronds amidst such resemblance to natural conditions as we can compass. Some would tell us that such are but weeds, unworthy of a place in any well-ordered garden, while other some, as narrow-minded as these, would seek to persuade us that there is an ineffable charm in these wildlings that the results of the skill of the horticulturist cannot yield; that the wild strawberry of the woodlands has a flavour that no purchase in Covent Garden can rival; that the wild rose of the country lane has a beauty and a fragrance that no

product of the florist can touch. While, however, there is abundant cause for appreciation, there is absolutely no call whatever for depreciation. Happy he, or she, who in broad catholicity can welcome all.

We ourselves look back with thankful pleasure to, we will say in round numbers, half a century of this enjoyment. We recall such gatherings from the kitchen garden as might almost tempt even a tiger to essay vegetarianism; we see again our noble rose arches bordering the lawn of living verdure, and the stately walk where some hundred white lily stems fringed the verdant alley and made for it a glorious fence of snow-white blossoming. Yet pictures as enjoyable rise before us as we recall our wild garden, the rock-work silvered with sheets of white saxifrage, aglow with the golden festoons of the moneywort, crimson in the mantling of the autumn foliage of the crane's-bills; always changing, always charming.

It has been said by pessimists that things too often are not what they seem, but we would venture to say that in many cases they, practically, are what they seem—that, and that only. The uninteresting personage who was introduced to us by one of our poets—though he may be encountered commonly enough in plain prose too—who was so shockingly indifferent to the charms of the primrose that gazed up at him from the river's brim, would naturally care but little for such a rock-garden as we advocate.

Bœotia and Philistia know it not. But to those attuned the commonest weed is full of interest; science finds in it a wondrous organisation in its adaptation to environment; art sees in it beauty of form and of colour; legends, mayhap, enshrine it; while associations, historical or personal, may give it an added value. These are not things that one merely ticks off on a florist's list; each has a pleasant history attached to it, and recalls bygone days of sunshine, or possibly reminds us of that valued companionship that is now for ever lost to us. Thus our noble plant of yellow iris is not only a delightful thing in itself, but recalls to our mind many an enjoyable ramble by the silvery Kennett and our old home on its banks; our grey tufts of thrift, or sea-pink, that will in due course burst forth into heads of crimson blossom, are not only a joy in themselves but a sunny memory of the grand cliffs, and the widespread blue of sea and sky, and all that went to make the day we brought them away one that yet lives pleasantly in our memory. Hence our plants recall no less enjoyable rambles over breezy commons, down verdant lanes with their hedge-banks of ground ivy, violet, and strawberry, through the woodland copses in search of the golden daffodils, or amidst the far-stretching purple haze of hyacinths in the forest glades. The enthusiast who takes the train a few miles out into the country and arms himself with a trowel, an old biscuit-box, or

a bag of reasonable size, will scarcely fail to find something or other that he will be glad to transfer from its country surroundings to their counterfeit presentment, and, once there, if he be successful in its cultivation, it remains a pleasant record.

It may be here brought against us that this filching from the general store that Nature provides for the delectation of all, for the gratification of one, is unjustifiable, and we have heard people gravely protest against such a state of things as children being allowed to gather a bunch of wild flowers. It is in such matters well to clear our minds of cant. We venture to claim that we stand behind no one in our desire to see our flora and fauna preserved, but there is a medium in all things, and while the uprooting of rare plants is an evil to be vigorously protested against, we feel absolutely no sense of wrong-doing to our neighbour when, to take a concrete case, we bear away from some desolate saltmarsh one plant of thrift from the hundreds that surround it, or one root of red valerian from the hundreds that spring forth in profusion from the cliff-crannies. Nature has great power of recuperation, and even such a loss as one per cent., not on the total output of the country but in one small area, leaves no permanent void, no lasting scar.

The term rock-garden is a very comprehensive one, and covers everything from the lordly pleasaunce planted with choice Alpines and the floral treasures of some palatial domain, to the lowly dirt-heap, duly embellished with an odd whelk-shell or two, a statuette, headless, of the little kneeling Samuel, a piece of broken blue and white plate, and a few brick-ends in some stifling back-yard in the midst of the town; which, poor and vulgar as it is, is nevertheless the touching delight of some hard toiler in office or factory, who sees in it and its soot-laden London-pride or musk sweet far-off suggestion of the meadows he played in as a boy, before he had found out that the city that his imagination paved with shining gold has no earthly realisation. Somewhere within these extremes is the rock-garden that most of our readers, if they so will, may fairly hope to compass.

The first consideration, naturally, in the formation of a rockery is the getting together of the necessary raw material. This, in many country districts, is no great difficulty, as almost any geological formation will yield us excellent stuff for our purpose; though some of these formations, as the sandstones, limestones, or granites are

"There the pitcher stands,
A fragment, and the spoutless teapot there:
Sad witnesses how close-pent man regrets
The country: with what ardour he contrives
A peep at nature, when he can no more."

¹ Cowper brings before us, with admirable touch, the grotesque pathos of the position:—

naturally to be preferred to chalk, or rock of a soft and friable character that powders up, or splits into thin plates by the action of frost or other untoward influence. Quartz is not a desirable material, as it is somewhat strong and assertive in colour, and does not readily tone down, so that while other materials weather and mellow, our masses of quartz preserve for a long time a distressing appearance of newness, and a disinclination to blend with their surroundings.

Cartage is the chief expense, stones having a way of being so very heavy. Great care must be exercised in loading up and unloading, so as not to needlessly abrade the surfaces, and thus rub away the charming masses of pale grey or gorgeous orange lichens that clothe them, and which, if preserved, at once save the rock-garden from the otherwise bald and horribly new look that a recently made thing of the kind must almost unavoidably have.

The townsman, if he has no country friend to hunt up material for him, or no inclination to meet the heavy expense of its transport from the locality where it is found *in situ*, has but little choice before him. He must either laboriously "convey" suitable stones that he may find on waste ground (a very long process, and one sufficiently tiresome, being alike destructive to one's clothes, and arm-aching to one's muscles, as any one will find who in a fit of

enthusiasm conveys home for some two miles the noble stone that he has rescued from the bottom of some ditch or the surface of some suburban road being made up), or else he must put himself into the hands of some contractor or general dealer. A singular property of these casual blocks that we may encounter and appropriate is the startling way they appear to increase in bulk and weight. When we first hustle one from amongst the stinging nettles, to the great disgust of the various beetles, wood-lice, centipedes, and other small creatures that have found welcome shelter beneath it, it can be carried quite easily, but in ten minutes its weight has apparently nearly doubled, and it is found to be liberally possessed of uncomfortable protuberances or knife-edged angularities that we had no suspicion of at first. Henceforth its bulk increases in appalling ratio, and we are only saved from throwing it down in disgust from the reflection that if we do so all the Herculean labour we have thus far expended on it will have been absolutely wasted.

From time to time we may see a notice intimating that Mr. So-and-so, purveyor of coals, coke, slates, gravel, stone, &c., may be dealt with within the dreary area enclosed by his rickety palings, and on entering we find in some corner the very material we are in need of, in which case he is ordinarily willing to let one have it at a not too inordinately grasping rate, since such stones as



YELLOW ANEMONE and PRIMROSE.

To face page 20.



we require for our present pursuit are of little other use. An enthusiastic rockery-building neighbour of ours has lately cleared out all the yards for a long distance round, and would as eagerly run to earth a pile of old and discarded building or road material as others would rummage an old bookstall for black-letter treatises and worm-eaten folios, or pursue with reckless haste the fragrant fox.

We would sorrowfully admit that something of the nature of a rockery, or rather brickery, may be sometimes seen compounded of old brickbats, lumps of cement, clinkers, and masses of fused and vitrified material from the brickfield; but we trust our readers will "not leave a stone unturned" to avert such a lame ending of their early hopes, for while we cannot quite deny that a well-planted clinkery may be a good deal better than nothing at all, we feel at least equally strongly that it must be looked upon only as a possibility when nothing better can be got together.

One's idea must be to reproduce nature as far as possible, and those who have revelled in the glorious natural rock-gardens of Devonshire and Switzerland will scarcely need to be reminded that brickbats formed no part of their charm. Uvedale Price, writing in 1796, says: "The source of the superiority of good landscape gardening lies in the artist's removing from the scene of his operations whatever is hostile to its effect, or unsuited to its

character: and by adding only such circumstances as accord with the general expression of the scene, awakening emotions more full, more simple, and more harmonious." What applies to landscape gardening as a whole applies no less to the limitation we impose on ourselves, and it will be found that the common brickbat fails to awaken the right sort of emotion, nor does a garnishing of broken plates adequately recall the grandeur of the sculptured cliff, the loveliness of some Alpine dell, where amidst the noble masses of lichen-stained rock nestle the saxifrages and gentians, white as the eternal snows, blue as the vault of heaven o'erhead. The eye and the mind, incapable of taking in, without strain, more than a certain amount of sublimity, call for a rest, and even amidst the grandest scenes must presently call "Hold, enough!" If then, turning aside awhile from the glorious prospect of glacier or snowfield, we contemplate our immediate surroundings, the wild strawberry, the pure white Alpine crowfoot springing amidst the grass around us, the spleenwort amidst the crannies of the rock, we not only realise that at our feet is beauty no less worthy of our regard, but we give the eye and the mind the refreshment that they need.

"If we could open and intend our eye, We all, like Moses, should espy, E'en in a bush, the radiant Deity."

¹ Cowley, "The Garden,"

One may often find the rugged bark of the corktree used not ineffectively, in the greenhouse and elsewhere, but it would not long stand outdoor service, and is therefore, in any case, unsuited to our present need, even if we could by closing our eyes very much, and indulging in any amount of make-believe, come round to the idea that cork and rock were practically the same thing. A corkery may do very well for those who can do no better, but to those who have ambitions beyond a greenhouse shelf, or a flower-box on the window-sill, it does not suffice.

There should be a considerable variation in the sizes of the stones-anything like uniformity of bulk is apt to give a feeling of formality that is destructive of the picturesque. The stones, too, should not be too rounded in character, like beach boulders, but should possess a certain quaint angularity of form, the latter being also much more useful practically, as in the resulting crevices we may plant many graceful little things, like the ivyleaved toadflax, that could find no home on the smooth surface of an ovoid block. In most things there is that valuable institution, the happy medium, to be reckoned with, and it is as much to be studied here as in any other of the affairs of life; so one must not rush to the opposite extreme, eschewing boulders and landing in an effect suggestive of a cemetery, where smashed-up hearthstones seem to have supplied the raw material.

Having got our material together, the next very important step is to make a wise use of it. The stones must not look as though they had merely been shot out of a cart and left there. When Nature makes a land-slip, and clothes the fallen matter, as Nature only can, with rich tapestry of bramble or fragrant honeysuckle, and throws her glorious sunlight over all, the heart is dull indeed and the eyes dim that cannot enter appreciatively into so fair a scene; but the attempt to reproduce the impression of this at home by merely emptying out a barrow-load of stones is predoomed to failure. The bases of the stones should all be sufficiently buried in the earth to give the feeling that the masses are rising from it, and not merely lying on the surface. If our stones are of homogeneous character, and our observation of nature and study of geological text-books go deep enough-a not very exacting requirement—a suggestion of stratification is a welcome feature.

So very much must depend upon the space and material available that it is impossible to lay down any general rules, but we may just say that wherever practicable it is always better to have one's rock-work curved more or less, or angular, on the ground-line, rather than straight. As such a matter once established is not an easy thing to modify, both on account of the bulk of the material, and the injury done in moving the things planted

upon it, it is very important to think the thing out first, and then act, rather than to reverse the process, and thus build in haste and repent at leisure. Such work must have both the semblance and reality of permanence: any suggestion of fragility makes the whole thing ridiculous. If you dare not, having reared your structure, clamber freely about it, for fear of bringing it all down, your work is inadequate, and no matter how delicately you may tread as you pass by it, and speak in bated breath, it will not bear the test of time, and some day, after an extra shower of rain or a more than usually strenuous cat-fight, the whole thing will be found collapsed, a mere ruin, a byword and a reproach.

Picturesque old pieces of tree-roots may be sometimes advantageously blended with the rock-work. They are not only pleasing in themselves, but they form a welcome home for some kinds of ferns and other plants, and as they slowly decay away, give valuable nutriment as well. No part of the permanent structure, it is evident, must have as its foundation or support a tree-trunk that will of necessity presently break up.

In making out our rock-garden it is advisable to commence operations by setting out a good foundation row of stones of goodly bulk in such variation of ground-line as commends itself to us. The back may then be filled up a foot or so with

almost anything, if it be necessary to economise material, the better earth being saved for the front and upper portions. Where such thrift is not called for, it is needless to say that if the earth be of the best all through we are so much the nearer to a success, since some plants have roots of wonderfully penetrating power. Dwellers in the country, who have extensive garden-ground, an orchard, and perhaps a meadow or paddock, can scarcely understand, with such a wealth of soil at their disposal, how pinched the man is in this respect who has but a small plot of ground at the back of his little place in Suburbia, where the abstraction of enough earth to fill a flower-pot leaves a permanent void in his flower-border. We know of one enthusiast, residing within a shilling return ticket from the centre of the metropolis, who based his rock-work on a fairly solid substratum of empty pickle bottles laid on their sides, one or two pails turned upsidedown, and a goodly garnishing of canisters, with, of course, a veneering of stones to suggest something at least of "the everlasting hills." This we need scarcely say was not an ideal basis, though probably the foundations of the house itself were not much better, judging by the queer mass of

¹ On digging up carefully some plants of the common mallow that were encroaching overmuch on their neighbours we find the roots descending into the ground considerably over a yard!



ALPINE ANEMONE and SMALL CELANDINE.

To face page 26



things—road scrapings, cabbage stumps, old boots, sardine tins—that is deposited on land that one half-year bears an intimation that rubbish may be shot there, and the next half carries a row of genteel villas. The rockery-builder could at least plead that he was preserving the unities, and intimate his belief that what was good enough to rear his children on should suffice for the up-bringing of a patch of ground ivy, the practical result being that the youngsters would be anæmic, and the vegetation etiolated, the equivalent botanically to that washed-out, colourless state of affairs.

Having laid discreetly our foundation series of blocks, we may now proceed to add our second tier of stones, and again carefully back these with earth, and also judiciously fill up the interstices with good mould. The stone facing and the earthen backing should grow together. If a mound of earth be first made, and then the stones stuck all over it, as we sometimes see bleached almonds projecting boldly and profusely from some triumph of culinary skill, the effect is not happy, while the slope that the earth naturally takes is somewhat too gentle. On the other hand, if the building-up of the stones alone be carried too far, independently of a backing of earth, the intervals between the blocks never get properly filled up with soil. When the roots of a plant penetrate into one of these empty spaces they quickly dry up, and the flower withers and decays.

It must be borne in mind that as the whole thing consolidates it will sink considerably; it will therefore be necessary to allow a good margin for this in our estimate of the task before us. A neighbour of ours has the usual seven or eight foot wall around his garden, but his rock-work reaches to the top of this, and is built boldly and irregularly forward from this. Instead, then, of the formal brickwork, all that we see—and it is very pleasant to see—are the rocky flower- and fern-clad masses of rock, the trees of the adjoining gardens, and the sky, forming the background.

The stones should be so built that each should recede slightly from the one upon which it rests. By this means the rains and dews find their way into the interstices and keep the plants sufficiently supplied with water: the reverse of this, a mass of overhanging stone, means drought, and the speedy death of any unfortunate plant that is placed in so uncongenial a locality. The rock-work should not be built up too steeply, in wall-like guise, or the rain streams off it with undesirable rapidity, and so the upper parts, especially, are too freely drained of their necessary moisture. It is advisable to build it in terraces rather than in one continuous slope though these must not be too formal-looking or too obvious in their repeating lines.

In planting care must be taken to group the plants together, as far as may be, not only with an

eye to their effect, but also as to the relative amounts of moisture they can stand. One is then able to supplement the natural downfall on a particular set of plants that are lovers of damp, without at the same time deluging those to which an excess of moisture would be prejudicial. We cannot successfully grow anything whatever except by approximating our arrangements as nearly as possible to its natural conditions, and reproducing, as far as may be, its habitat, whether it be a plant like the heather, rejoicing in the open sunlight; the herb-paris sheltering itself amidst other vegetation; or the moneywort, delighting in a humid situation. Questions of soil are no less important. It is rather a common fallacy to suppose that because the silverweed, for example, grows luxuriantly under the hard conditions of the dusty roadside it will prosper ten times better if we transplant it into what we consider soil ten times as good. Under such conditions plants either ramble so grossly as to lose their typical character, or, more frequently, decline to grow at

¹ A brother enthusiast told us that when he first reared edelweiss from seed the result was a great disappointment to him, as the plants grew up considerably over a foot high, flowering but little, and it was only by considerably hardening the conditions that he was able to get anything like the typical plant that had charmed him on the mountain-side. We recall an instance again where a lady, desirous of growing a hyacinth particularly well, fed it so liberally with some one's wonderful fertiliser, that it threw up leaves of utterly

all. If we have a portion of our garden made up of light sandy soil, there our heather should do well; if we have another portion consisting of stiffish clay, there our primroses will specially prosper. While we must admit the fact that we cannot be equally successful in all directions, we may at least approach that ideal in another direction by arranging that some of our rock-garden shall be overshadowed by trees, a noble mountain-ash richly laden in Autumn with multitudinous clusters of scarlet berries, a fairy birch that in Spring is a mass of graceful pendulous catkins, fulfilling this function to admiration in our own garden, while other parts have the full strength of the sunshine upon them.

Many persons fall into the grievous error of under-planting, being so enamoured of their stone-heap that they cannot bear to see it getting grown over. But this is a heresy; for, beautiful as the stones alone may be, they are infinitely more beautiful when peeping out from amidst the wreathing over of rich masses of foliage. "Beauty unadorned" is not "adorned the most" in this particular case.

What the rock-garden should be planted with is a very wide subject. Ferns, of course, cela va sans

abnormal length and bulk, but yielded no blossom at all. The error is akin to that of the patient who, when ordered to take recurring doses of a teaspoonful takes two teaspoonfuls instead, so as to get better as fast again.

dire, will find an honoured place, and it is also very desirable to plant ivy, periwinkle, and some few other things that will clothe and beautify, even through the dreariest days of winter. The ivies planted will advantageously be of the various finerleaved varieties. Such essentially garden flowers as pelargoniums are out of place entirely, as the aim is to reproduce some little reminiscence of the charms of some rocky dell or mountain slope. A plant in a rock-garden does not thence become a rock-garden plant. Some will plant with Alpines; some prefer to confine their attention to British species. Some will spend lavishly in stocking their gardens; while others, and the wiser we think, will only nurture such as they have themselves collected, or at most have received at the hands of friends, so that everything carries with it a pleasant fund of association. One need not in hobby-driving think overmuch of the curb. While in our own garden we have some of the commonest English plantsweeds, in fact, in the language of Philistia, and

¹ We once overheard two disputants. The woman had said something that the man evidently did not think was right, and he, with merciless logic, brought up point after point, and then triumphantly summed up with "So how do you fit that in?" "Oh," she merely replied, "I don't fit it in!" What more could be said? The rock-gardenist may claim a similar licence, and decline in his planting to be cooped up within too rigid barriers of logic or anything else.

others of interest to us from their rarity, we have welcomed no less the edelweiss and the wolf's-bane, as reminiscent of glorious days amongst the Alps, and North American bog and other plants brought to us by kindly friends.

One of the great charms of contact with living things is that matters are continually changing. we visit a museum the stuffed monkey that we saw there last year looks much the same to-day; the brick from Nineveh has undergone no change; but if we visit Kew Gardens we shall, no matter how numerous our visits, always find something that we had never seen before. This is no less true of half a mile of country lane. Flowers appear and disappear; the ferns that a fortnight ago were tightly curled up have to-day their full development: the bud of a fortnight since has not only fully expanded in the meanwhile into blossom, but this blossom itself is even now passing onward to the next stage, and showing promise of its fruiting. And so, in like manner, in our gardens, unless they be but mere rows of pelargoniums, calceolarias, and the like, it would not be possible to take a floral census that would hold good for more than a few days.

To-day, May the 17th, we have found plenty of primroses still throwing up their pale sulphur stars amidst the crannies of our rock-work, while in more exposed positions the wallflowers are in full bloom,



SAXIFRAGA ELIZABETHEÆ, ANEMONE HEPATICA, and HACQUETIA EPIPACTIS.



and filling the air with their fragrance. The globeflowers are bearing freely their golden spheres, and the quaint columbines are in rich variety. In a sheltered corner the lilies of the valley are unfolding their delicate pure white bells, companioned by the long lines of pendant blossoms of the Solomon'sseal. The London-pride is in full luxuriance, and the evergreen alkanet is splendid with its masses of intense blue blossom, while beneath the shade of the rapidly unfolding ferns the silver stars of the woodruff give us bright welcome. The Claytonia-Claytonia sibirica—an American wildling that is gradually establishing itself on this side of the Atlantic, is in profusion with its multitudinous pink stars, while the yellow anemone—the A. ranunculoides—so suggestive in flower and foliage of the buttercup, is passing away. The herb Robert is in abundance in the chinks and crannies, a mass of graceful foliage, from which rise the pink stellate flowers, while alongside we see the golden cruciform blossoms and richly cut foliage of the celandine, and in a sheltered corner we find the quaint spathe of the wild arum unfolding amidst its glossy sagittate leaves. The bistort stands gracefully erect; divers saxifrages are in welcome evidence amidst the rock masses, and the yellow tuberous comfrey is at its best, while the ox-eyes, the delicate lady's-mantle, the boldly upspringing meadow-crowfoot, the great clumps of red valerian, and many other plants, are well in bud.

A month ago daffodils, hyacinths, windflowers, were to the fore, and the brown soil was lavishly starred with the golden blossoms of the pilewort, while even before this the snowdrops decked the ground, attended by the yellow disks of the colt's-foot, and the rarer fragrant butterbur. A month hence the flowers of to-day will many of them have passed away, though by no means all, but such gaps as the efflux of time may make in this will be speedily filled by their successors, and so, well-nigh the whole year round, our rock-garden yields beauty and interest.

Elsewhere in our garden we can grow the roses, the gladioli, and other floral treasures that one would naturally expect to find under cultivation in one's borders; but while we welcome these, we revel yet the more in the wild corner of our garden, since, apart from the simple charm of these wildlings, almost every plant there has, as we have said, its history and associations. Some were sent to us by brother enthusiasts, friends of long standing; some, with words of much kindly greeting from those who have only known us from the printed page, whom we have never seen in the flesh, and shall probably never meet in fraternal hand-grip, but who are our friends nevertheless in the freemasonry that links together fellowstudents in nature-lore. Others, again, recall to

¹ One of those kindly friends, who had previously sent us some white heather, presently wrote again, sending us a plant

us the pleasant days of their acquisition; those most enjoyable rambles-alone or with congenial companions—over open moorland, in the woodland recesses, by the banks of some placid stream, anywhere and everywhere a delight. Others of our plants again, commonplace as they may seem to the commonplace, have an interest from literary and legendary associations, from their medicinal value, real or reputed, from their fancied astrological influence, from many reasons that, if not immediately evident, and perhaps the better for not being thus conspicuous, amply repay their study. Should the unhappy man to whom we have already referred, of whom it is recorded that he really saw no special interest in a primrose, or any one akin to him, take up this our book they will doubtless promptly lay it down again, well content that they neither know nor seek to know the things of which it treats: but to others, nature-lovers, it will, we trust, appeal in its attempt to declare and set forth the interest that may be found in the study and cultivation of the wildlings that in profusion spring up around us, and to indicate something of their charm.

—the bog pimpernel—for identification, as she and her friends could not decide what it was. To this appeal, most courteously worded, we never replied; the letter we received gave only the name of the residence, no town being added, while the post-mark was too blurred for identification. We trust that this may meet her eye, so that we may at last be absolved!



CHAPTER II

Spring our starting-point—Bartholomeus on the influence of Spring—Our snowdrops—What is an indigenous plant?—Fair Maids of February—Colt's-foot—Rustic pharmacy—Medicinal plants—The "Castel of Helth"—The "Foure Bookes of Husbandry"—Necessity in olden days of plant-knowledge—The common butterbur, or pestilence-wort—The fragrant butterbur—Uninvited visitors—Wild arum—Primrose-time—The Beaconsfield cult—Appreciation of the poets—Mealy primrose—Seedling leaves—Germination of seeds—Vitality of seeds—Daffodils—Daffodil culture—Hyacinths—Buttercups—The lesser celandine—Nature study in our schools.

UR starting-point may well be from the lengthening days of Spring, the verdant season associated with the idea of renewed life, though on a moment's reflection we see clearly enough that Nature has throughout the long waiting-time of winter been but apparently dead, and that months of quiet, steady preparation have been necessary to bring us at last to the opening bud,¹

LYDGATE.

[&]quot; "Mighty Flourra, goddes of freshe floures, Whiche clothed hast the soyle in lousty grene, Made buddes springe with his swete shoures, By influence of the sonnes so sheene."

the unfolding flower. Even the dweller in the town is buoyantly conscious that Spring has at last arrived: even square miles of houses cannot wholly shut out the welcome knowledge. Fires, once so welcome, go untended, windows are thrown widely open, and the soot-laden buds of the town park, or suburban garden, burst into tender green and remind us that not so very far away after all the meadows are golden with countless buttercups, that the lark in ecstasy is pealing his song of jubilant welcome.

Spring has in all ages evoked the encomiums of the poets, and it would be needless indeed here to repeat their glowing utterances, since these are accessible readily enough to most of us; besides, raptures at second hand are, we take it, of no great value to any one. Every one in Spring should be his own poet, feel his own heart stirred within him. The following passage, however, is, we feel, too delightfully quaint to keep entirely to ourselves, and is considerably less accessible than Keats, Wordsworth, and such-like modern men. writer, one Bartholomeus, built up an old blackletter tome, which he called "De proprietatibus rerum," and this book, dealing most comprehensively with the properties of things, was issued in the year 1597. It will be readily detected that his spelling is scarcely such as would pass him



EVERGREEN ALKANET.

To face page 38.



into the army or civil service according to modern requirements:—

"Spryngynge tyme is betwene hotte and colde, most temperat betwene winter and somer, meane in qualyte and partyneth with eyther of them. For then blode begynneth to multiply in bodyes of beastes, and humours that were bounde and made thicke in wynter begynne to be dissolved by heate of Spryngynge tyme. For heate is cause effective, werkynge, nouryshyng, and encreasyng, and the moysture is cause materyall. Spryngynge tyme openeth the erthe that hath bene longe closed and bounde with colde, and bryngeth forth rotes and bushes that were hydde in therthe, and exciteth birdes and foules to cherterynge, and clotheth and hyghteth all the over partye of the erthe with a wonder fairnesse. In Spryngynge tyme all thynge semeth gladde, for the erth wexeth grene, trees burgynne and spred, medowes bryng forth flowers, heven shyneth, and all thynge that semed deed in wynter and widdered ben renewed." The reader, however, is cautioned that in this "Spryngynge tyme water is unwholesome to drynke, for it is made thycke with vapours that ben resolued, also it is infect with frogges and other wormes that than brede, and therfore if it be nedefull to drynke water that tyme it conseyleth to seeth it fyrst, that it may be clensed and purged by boyllynge."

While Spring is yet little more than a pleasant

anticipation our rock-garden is bright in sheltered positions with patches of the snowdrop. The plant stands its ground sturdily enough in the keenest weather and the most boisterous gales, frail-looking and delicate as it appears. It should be in flower by February, and when once planted should be left undisturbed. Some would tell us that the snowdrop is not really one of our native flowers, but however that may be, we at least know that for centuries it has been springing up in our woods and shady pastures.

The question as to what is and what is not indigenous is a very difficult one, if we insist on proof and pedigree. Of course if we can definitely show that a certain plant was introduced, designedly or accidentally, by the Phœnician merchants, the Roman legionaries, or any one else, centuries of residence amongst us, and the happiest adaptation to English conditions, will not suffice; it must be throughout the ages considered as having at most been granted letters of naturalisation; but most of us will be well content to welcome amongst us, and enrol in our Flora, such a plant. If we come down to very hard fact, nothing we presume must be held really indigenous to these islands unless it can be demonstrated that it was already flourishing here while Adam and Eve were yet in Eden. If it were not here at the beginning of all things it came from somewhere else. This sounds uncommonly like a truism, but it is the essence of the matter.

The gardeners have taken the snowdrop in hand and produced various modifications, the flowers and foliage being in some of these of much greater bulk; but, after all, size is not everything, and one can turn from these back to the simple yet beautiful wildling with renewed pleasure. We sometimes see the flowers, too, doubled under cultivation, and thereby the delicacy of form of the blossom entirely lost.

If so soon as the plants begin to reach the budding stage we carefully dig them up and bring them indoors, placing the bulbs in a little mound of earth in the centre of a plate, and covering our mound over with the moss that we shall find in the wood, the result will be entirely charming. The moss is pleasant in itself to the eye, conceals the bare earth, and retains moisture, and from its midst for a long time will rise a group of these beautiful little flowers. We have tried planting the bulbs freely on our lawn. and in the early spring the effect is very pleasing; but one requires sometimes to look a little ahead in divers matters, and this is one of them. After the flowers have perished the leaves greatly develop; if we cut them down too speedily we do some little injury to our bulbs, but if we do not do so the large tufts of rather coarse leaves scattered freely over the lawn are somewhat of a disfigurement.

In Wales our plant is the Clychau'r baban. at least, we are told by a native of the Principality, but we confess that the word scarcely looks Cymric enough, one conspicuously weak point in it being that from its fairly reasonable supply of vowels we can at least attempt to pronounce it. The significance in English is "baby's bells." Our English name, the snowdrop, is equally poetic. One of the alternative names is Fair Maids of February. During the whole mediæval period the Church taught alike by eye and ear, and did not disdain to press even the wayside weeds into her service, and to associate them with the Virgin Mary, the saints and martyrs, and so the snowdrop got its name of Fair Maids of February, 2 since its delicate blossom was often already expanded by the 2nd of February, the Feast of the Purification. It may at first strike

- ¹ A large class of popular names, in England and abroad, arises from a real or fancied resemblance between the flower and some other object: to this class our snowdrop belongs. Other good descriptive names are the arrowhead and the bee orchis. The bladder campion is so called from its inflated seed-vessels, the ox-tongue from the shape and roughness of its leaves, the mouse-ear from their form and soft hairiness. Hare's-ear, crowfoot, monk's-hood, snake's-head, shepherd's-purse, are only a few of the many examples that might be cited.
- ² The Virgin Mother is commemorated again in such names as Lady's-mantle, Lady's-thistle, Lady's-smock, Lady's-bedstraw; while in Germany we have the Frauenmantel, the Mariendistal; in France the Chardon-Marie, the gants de nôtre Dame, and many others of like import.

one that such names are frivolous, irreverent, superstitious; but while we in these latter days are not supposed to need such incentives to faith, we cannot but feel that the intention which influenced such titles was an altogether worthy one.

Amongst the earliest blossoms in our wild garden will be found the golden thread-like flower-heads of the colt's-foot. This is a plant that thrives best on clayey or gravelly soil, and it may often be seen in profusion in the early Spring starring the railway banks. Like the butterbur, and some few other plants, its flowering stems are developed before its foliage. Where it has once taken hold it increases freely, so that it will be well to plant it where this spreading habit will be welcomed rather than regarded as an encroachment. In the Spring its masses of yellow blossom rising from the bare ground are very welcome, while scarcely less welcome are, later on, its quaintly angular leaves, that contrast agreeably with the surrounding vegetation. Their resemblance to the foot, or hoof, of a colt is somewhat remote.

The colt's-foot was one of the plants largely used in rustic pharmacy. Its generic name, *Tussilago*, is a testimony to the repute in which it has for centuries ¹ been held, being derived from *tussis*, a

¹ It was strongly commended by Hippocrates, who mentions two hundred and forty plants as being of remedial value. He was born at Cos, B.C. 459. Theophrastus, Dios-

cough. Roots, flowers, and leaves have all been held in repute, but the latter have been most commonly employed, being dried when fully grown. Rubbed to a coarse powder they may be smoked as a remedy for cough or difficulty of breathing, or a decoction of them in the fresh state may be employed.

Before modern research placed at the service of the physician plants of healing virtue from every quarter of the globe, our forefathers made an immense use of the Flora of their own land. In any old botanical book "the vertues" of the plants set forth form a very important feature, and this necessarily led to a more general knowledge of our common plants than at present obtains. In some cases, without doubt, plants of foreign origin are possessed of greater potency, and have, therefore, rightly superseded the home-grown article; but it is very possible that matters have gone too far in this direction, and that many of our native plants possess a healing virtue that few now credit them with. "Forasmuch as every Countrey," Frugis reminds us in his "Vade Mecum," 1651, "is not furnished with all sorts of things (God having so disposed thereof) that some should abound with those things which others stand in need of, the omnipotent Providence hath taught us the means of transporting by water

corides, and other very early writers, all unite in their testimony of the healing virtue of this lowly herb.



COLUMBINE and LESSER SNAPDRAGON.

To face page 44



from one Countrey to another, with small loss, trouble, and charges, so that one Nation may communicate those commodities to another which the Creator hath bestowed upon them all, each granting mutual help to the other by this meanes." Elyot, writing his "Castel of Helth" in 1541, looks back even then to the good old days when home-grown remedies sufficed and cabbage was the panacea for all the ills of humanity, for he writes "before that auarice caused marchauntes to fetche out of the easte and southe partes of the world the traffycke of spyce and sundry drouges to content the unsaciableness of wanton appetites, Coleworts for the vertues supposed to be in them, were of suche estimation that they were judged to be a sufficient medicine agaynste all diseases." Conradus Herebachius, in his "Foure Bookes of Husbandry, as newely Englished by Barnabe Googe," goes even farther than Elyot in his denunciation of the introduction of foreign drugs, seeing in it not merely the greed of the merchantman, but the dire necessity of the druggist's shop. "Nature," he writes, "hath appoynted remedyes in a redynesse for al diseases, but the craft and subteltie of man for gaine hath devised Apothecaries Shoppes, in whiche a man's Lyfe is to be solde and bought, where they fetche their medicines from Hierusalem, and out of Turkie, whyle in ye meane time euery poore man hath the ryght remedyes growing in his Garden: for yf men

would make theyr Gardens theyr Physitions the physicions craft wold soone decay."

Whatever we may think of the value of the following prescription, which we extract from "The Family Dictionary and Household Companion" of William Salmon—a book published in 1696—it at least serves to illustrate our point, that our forefathers possessed a more extensive knowledge of our common plants, or were at all events credited with it, than some of their descendants. How few good housewives now possess the necessary knowledge to accurately make up the following "Water for the Plague"! "Take of Celandine Rosemary, Bawm, Mugwort, Pimpernel, Scabius, Agrimony, Bettony, Angelica, Pellitory, Carduus, Marigold leaves and flowers, Borrage leaves and flowers, Featherfew, red Sage, Setwall, Thyme, and Tormentil, of each a good handful, with a few sprigs of Rue and Walnut leaves." These numerous ingredients were all to be well bruised and then steeped for three days in white wine. Ten spoonsful of this, after warming it, were to be taken at a time. If this brew produced nausea, as would be only too probable, the abundant consolation was that "it is a sign it has taken the better effect." If you could take it it was a very good thing, but if not then it was still better.

In another portion of our garden we may find the flowers of the butterbur. These, like those of their near relative, the colt's-foot, are to the fore before the leaves are much, or at all, in evidence. Their pale lilac heads, thrown up some eight inches or so, are much less conspicuous than the golden stars of the colt's-foot, but they have a quiet charm of their own. While the colt's-foot thrives best in dry, gravelly soil, the butterbur must be given a damp situation. One can dig up the roots by the sides of most streams, but we must scarcely go in for it if we are pressed for room, as the real beauty of the plant is seen in the noble leaves that are thrown up later, and which require plenty of space to do them justice.

Parkinson, we see, says of them that "when they are full growne they are very large and broad, that they may very well serve to cover the whole body, or at the least the head, like an Umbrella from Sunne and Raine." An old name for the plant was the pestilence-wort, for "the rootes hereof are by long experience found very available against the plague and pestilentiall fevers." A decoction, too, of the roots in wine is "singular good for those that wheeze much." In Plate I.—our frontispiece—we have an illustration of the fragrant butterbur—a much less common plant. It is a native of Italy and Southern Europe generally, but sometimes establishes itself in England as an escape from the garden, and is in some districts naturalised. Phillips, in his "Flora Historica," written in 1524, speaks of it as "planted

in pots for the purpose of perfuming our winter apartments, and thus the plant, which so short a time back could not by all its fragrant charms obtain a corner in a cottage garden, now fills a situation in the proud saloon, to the admiration of all the crowd that usually attend the decorated apartments of gay routs." That fashion, we imagine, has long passed away; but the delicate flowers and fragrant odour of the plant make it a very welcome member of our floral commonwealth, and especially as it is in blosom quite early in the year. The leaf figured is the size of the foliage when the plant is flowering; later on the leaves are considerably larger. It flowers very freely with us, and can be very readily multiplied by dividing up the roots, so that it is a very convenient plant to exchange with a botanical brother for something that he in turn can spare, or, of course, to enrich his store without thought of reward beyond mutual goodwill. It is sometimes called the winter heliotrope.

One curious feature in starting a wild garden is that one comes into possession of so much more than one anticipates, through the accidental introduction of seeds, fibres of roots, and the like, with the plants that we really do strive to introduce. Only this last year we had springing up in our garden the wild arum, purple hyacinth, anemone, and several other plants that were not brought there by any intention of ours, welcome as they were.

The wild arum, or cuckoo-pint, should certainly find a shady corner prepared for it, as it is a very quaint and picturesque thing. Its arum-like spathe may be found nestling in early Spring in the undergrowth of the hedgerow. The leaves appear later; they are arrow-headed in shape and of a very glossy surface, and after these in turn have gone, we get a stem some five inches long bearing a cluster of scarlet berries. We have thus three very marked states, and all of them attractive. Every part of the plant is acrid and pungent, so that the mere application of the leaves to a delicate skin will inflame and irritate it. The roots are still more powerfully irritant, producing a burning in the throat that lasts for some hours. It is curious that this pungency is almost lost when the roots are dried, and deleterious as they are in their raw state, all their evil qualities are entirely dissipated by either baking or boiling them. The roots were at one time an article of food under the name of Portland arrowroot; but now that half a dozen foreign substitutes, and most of them probably considerably more nourishing, can be procured with the minimum of trouble, only very conservative folk would collect and prepare the home-grown root in preference. A distilled water was formerly prepared from the plant, that was for a while held in high repute as a cosmetic. In its fresh state it is a plant to be treated with considerable caution. Many cases are

on record of its deleterious effects; children, for instance, have more than once been killed from eating its leaves. The noble ruffs and petticoats of our ancestors owed their stiffening to the starch made from this plant, though it was, as Gerard reminds us, "most hurtful for the hands of the laundress that hath the handling of it, for it choppeth, blistereth, and maketh the hands rough and rugged, and withal smarting." Our edition of Gerard, we see, is dated 1633.

A rock-garden in which no primroses expanded their delicate-looking blossoms in the genial Spring sunshine is a well-nigh unthinkable state of things. So keenly did we feel this that we have them flowering in profusion, a friend sending us up out of Sussex, from his woodlands a great hamper of roots, which we promptly planted here, there, and everywhere, in every available nook and cranny. Beautiful as our garden is at various times of the year, it is, perhaps, never more charming than when these clustering flowers in their hundreds are its leading feature. Primroses enjoy a strong and clayey soil, and under lighter conditions gradually wither out. As a feeling has frequently been expressed that the Beaconsfield memorial cult¹

LORD BEACONSFIELD AND PRIMROSES.—Mr. Arthur Vernon sent the following letter to the South Bucks Free Press: "Your last number contained some references to the late Lord Beaconsfield, repeating the frequent assertion that



DUSKY CRANE'S BILL.

To face page 50.



of the primrose may presently make it a rare plant, we may mention that few plants propagate more freely. After the parent plant has finished flowering we may find scattered around it any number of vigorous seedlings, which we may in turn plant out, and thus largely increase our store. We figure the flower on Plate III. Primrose flowers vary a good deal both in colour and form. Some are almost white, while others are of a much deeper yellow than the normal sulphur-tint. Some, from the narrowness of the petal segments, have a star-like form, while in others the flowers are round in appearance, the segments being broad and often overlapping each other. Another curious thing to note is that on some roots the blossoms have the head of the pistil plainly visible in the centre of the flower, the stamens being considerably below this, reaching, in fact, but halfway up the tube; in other examples it is the pistil that reaches but this intermediate height, while the

he had no special regard for primroses. Having had the honour to serve as land agent to the late earl for many years, perhaps I may be allowed to say that no one on the Hughenden estate doubted his lordship's keen affection for primroses. The woodmen had orders to protect these plants; they were cultivated in large numbers alongside the walk behind the manor house, known locally as the 'German Forest path'; and by the earl's directions (given to me personally during the last year of his life) a clump of trees in the park where the grass grew scantily was thickly planted with ferns and primroses."

five stamen anthers form a coronet at the mouth of the tube. These are known respectively as pincentre and rose-centre flowers. The transfer of the pollen from the anthers to the pistil-head is naturally most readily performed in the rose-centred flowers, the fertilisation in the other form, the pin-centre, being almost wholly dependent on the transfer of the pollen from some other primrose flower by the unconcious agency of bees or other insect visitors to the blossoms.

Cowper tells of-

"Lanes in which the primrose ere her time Peeps through the moss that clothes the hawthorn root,"

and in sheltered hedgerows we may find primroses in bloom sometimes even at Christmas. The poets often adopt a somewhat patronising and pitying tone in their dealings with the primrose; ¹ but in truth it needs no such commiseration, as it can well hold its own in the struggle for existence, and accepts with equal fortitude driving sleet, drenching rain, roaring gale, or whatever else disagreeably climatic may befall it. Its blossoms are at least as permanent as

^{· &}quot;The primrose pale."—Scott.

[&]quot;Pale primrose."—SHAKESPEARE.

[&]quot;Soft silken primrose, fading timelessly."—MILTON.

[&]quot;The rathe primrose that forsaken dies."—MILTON.

[&]quot;O that so faire a flower so soone should fade."—
SPENSER.

those of most other flowers; their delicacy and refinement of colour probably suggested the idea of a frailty for which there is no real warrant.

The primrose derives its name from being one of the earliest plants of the year, and its French, Italian, and German names are equally significant; but, curiously enough, by many old authors the name is applied to the daisy. Matthiolus, for example, figures a most unmistakable daisy for his Fiore di prima vera, and we find the same thing again in the "Ortus Sanitatus" and other early works.

In some parts of the country a primrose blooming prematurely betokens ill-fortune, and the introduction of the flower into the house is held disastrous. Like most other plants, however, it was deemed medicinal, and folks having "the phrensie, choler, or flematicke humour" were glad to gather the leaves and flowers and make a decoction from them. adding thereto a little sugar, pepper, salt, and butter. The leaves boiled in wine were held good for "the drawing forth of the flesh any thorne or bone fixed therein," while the "uiyce" of the pounded roots "sniffed into the nose purgeth the braine and qualifieth the paine of the megrim." It is clearly, therefore, a plant to be cultivated. Even to those who may, to their grievous loss, be indifferent to its charm and to its association with sweet Springtime, there remains this practical utility, the relief of their own megrims. Such ailments are often imaginary, and for these an imaginary remedy should be of the greatest value.

The mealy primrose—the Primula farinosa of the botanist—should, if possible, find a place in our garden, if we can somewhere devise a bit of bogland; and this we must certainly do, if at all possible, or we shall fail to rear many charming things—the bog-bean, bog-pimpernel, bog-campanula, and many others. The mealy primrose is common enough in many parts of Northern England, the moist meadowlands being sometimes quite tinted over with its multitudinous lilac-pink blossoms. These, like little primroses in form, all cluster together at the top of each flower-stem. In a wild state it seeds very freely, but if we have been at all successful in its culture it is scarcely worth while to trouble about seedlings, as the roots divide up very readily. Down South it is a rather difficult plant to rear. Parkinson, the author of a delightful herbal written in the seventeenth century, gives us his experience that it "would hardly abide culture." If we give it too scanty a supply of water during the Summer it will certainly die, but it can equally be destroyed by too much wet in winter. The plant derives its popular name from the grey, meal-like look of the under surfaces of the leaves. The primula frondosa, another of our charming rockgarden plants, is very similar in general appearance

to the mealy primrose. We figure it on Plate XLIV. The silvery whiteness of the under side of the leaves will at once be noted. It is not a British species. The closely allied plants, the cowslip and the oxlip, should find a place in our collection; the latter, perhaps, especially.

The seedlings that spring up around us are often very interesting, the first leaves being generally so entirely different from those that succeed them. Any one who has grown sunflowers or scarlet-runners, mustard or radishes, must have observed this curious feature, and in the woods the seedling beeches, sycamores, and many other trees exhibit the same thing. The young lime, for example, has its first leaves spreading broadly like a hand with extended fingers, and absolutely different in character to those that succeed them.

Seeds to germinate successfully require light and air, and a certain amount of heat and moisture. If sown when the ground is very wet they will probably decay; if, on the contrary, sown under conditions too dry for their well-being, germination is checked, and the young plant probably perishes from drought. If sown too deeply, though the seed may swell and growth commence, it suffers from lack of warmth and air, and the ascending shoots fail to reach the surface. Nature mothers her offspring with a wonderful solicitude. When the keen frosts of the opening year have broken up the ground

an entrance is given to the liberal rain-pour of February. The March winds dry up the superfluous moisture, and make the soil fit for the reception of the seed, and then for the well-being of the tender plant are provided the gentle showers, the outbursts of sunshine, of April.

The vitality of seeds is a point of interest that is often impressed upon one's notice, plants suddenly appearing in one's ground of which we had no expectation, and which must have been resting dormant for a considerable period. We have known an instance where a piece of land that had been laid down as a pasture for over thirty years yielded an abundant crop of charlock on being ploughed up. One finds, too, that following such disturbance of the soil as results from digging foundations, making wells, railway cuttings, and the like, an entirely new series of plants springs into existence, and not uncommonly some of these are plants that are found nowhere else in the district.

Every nature-lover, of course, knows and appreciates the daffodil; we figure it on Plate I., and it certainly must not be omitted in our gardening operations. The flowers are so refined in form and so delicate in colour that we each year gladly find room for them.¹ The daffodil delights to grow

Ruskin tells us that "after all there are only three things worth anything in this world, or probably in any other—to feel what is beautiful, know what is true, and do what is



SPIRÆA TOMENTOSA, GERANIUM NODOSUM, AND SEDUM RUPESTRE.



in copse-land and in open clearings in woods, and though not so commonly distributed over the country as some other plants, is ordinarily in abundance when met with at all. Wordsworth's "host of golden daffodils" that "stretched in neverending line," and which he computed at some ten thousand, are recalled to one's memory. We have seen far-reaching tracts of woodland as gloriously yellow with countless daffodils as a buttercup meadow is in June, and though it is in such districts the correct thing for the children and cottagers to "go daffying," not all the baskets-full of golden treasure that are carried off appear capable of diminishing the wealth of blossom in the slightest degree.

The older herbal-writers call them affodillies, the Latin name being asphodelus, but with the popular taste for alliteration we get daffodil too, and daffadilly, or even, as in Spenser's "Shepherd's Calendar," daffadowndilly. They are also sometimes called Lent-lilies, and golden tassel. The aspodel was in classic days one of the sacred flowers, being dedicated to Proserpine and blossoming in the Elysium Fields. It is referred to by

good." The lover of his garden plot may claim at least the first third of this ideal life.

As in bachelor's buttons, parsley-piert, codlins and cream, goosegrass, primprint, primrose-peerless, hook-heal, lamb's-lettuce, tine-tare.

Homer, Sophocles, Lucian, Virgil, and many other venerable authors, and in later days its charms have been sung by Shakespeare, Drayton, Milton, Herrick, Keats, and divers other poets.

Daffodil culture has produced a great variety of very beautiful forms. These are grown, commercially, in immense quantities. From the Scilly Isles alone over five hundred tons of Spring flowers are sent up to the great metropolis and the provincial flower markets, and these are mostly daffodils. As it takes about seven thousand bunches of twelve flowers each to make one ton weight, it will be seen that this means the gathering of millions of these flowers from this source alone. The fen-lands of Lincolnshire and Cambridge are also largely devoted to this industry. At Wisbeach, for instance, one grower alone will show us over five million bulbs in bloom at once—a sight indeed to see.

Daffodil bulbs, wild or cultivated, should be planted in our rock-garden soon after they have done flowering, and they require moisture, so that on light, sandy ground one has but little success. They must be planted, too, where they will get the benefit of some little shade: it must not be forgotten that they are plants of the woodland. Near where we pen these lines daffodils are grown in immense numbers in the orchards, and very beautiful they look as they extend as far as the eye can see beneath the leafless apple and pear-trees.

Long ere the trampling of fruit-gathering time the plants are safely ensconced below the surface. "The plentifull root, being ministred medicine-like remedieth the serpents sting;" at least Maplet says it does. We trust that none of our readers may ever have to put it to the test. On Plate XXVI. we have a very curious member of the family—the Narcissus cyclamineus. This came to us from Portugal. The vigorous throwing back, cyclamenlike, of the perianth, naturally suggests its specific name. It has a distinct and quaint originality that, with its early appearance and rich golden colour, makes it very attractive.

The daffodil naturally suggests to one its sister bulb, the hyacinth. The one flowers in rich profusion, clothing the woodlands in a robe of gold: the other, in equal profusion, with a mantle, no less beautiful, of purple. There is scarcely a more charming Spring sight than the soft haze of violet colour extending in every direction beneath the overhanging boughs when the hyacinths, in countless thousands, deck the ground.² A few plants in

" "A Greene Forest," 1567.

² "Groves that looked a perfect paradise
Of blossom, over sheets of hyacinth,
That seemed the heavens upbreaking through the earth."

Tennyson.

There is no finer Nature-poet than Tennyson; his word-pictures are not only poetic in their setting forth, but absolutely true to the hard facts,

one's own garden give no suggestions of this prodigal wealth of colour, but they are at least reminiscent, and therefore welcome.

"The root of Hyacinth, boyled in wine, and drunke," we are told by one of the old herbalists, "helpeth against the venemous bitings of the field Spider: being beaten and applied with white wine they keepe back the growth of haires. The root is full of a shiny glewish juyce, which wil serue to set feathers vpon arrowes in stead of glew, or to paste bookes with."

If we are to believe the ancient poets and their imitators, the original Hyacinthus was not a flower at all, but a youth who was greatly beloved by Apollo and Zephyr. He unfortunately displayed so marked a preference for the former that the latter grew outrageously jealous, and one day when the injudicious youth was indulging in a game of quoits with the Sun-god, the quoit of Apollo was blown by Zephyr on to the head of Hyacinthus with such hearty illwill that nothing would have remained in these matter-of-fact days but to hold the inquest and make the necessary funeral arrangements. Instead of this prosaic ending, however, Apollo changed him into the flower that has ever since borne his name. The "fair-haired hyacinth" that Ben Jonson sings of does not derive its epithet from any hirsute feature now visible in the flower: the reference is to the flowing locks of the original bearer of the

name. While enjoying to the full the tempered sunshine the old tragedy is not repeated, the most searchingly jealous blasts of boisterous March being powerless to cut short its fair existence.

The flower of the hyacinth though normally of a rich blue-purple may not unfrequently be found of a pure white—a variation that we shall be careful in our woodland rambles to be on the watch for. The odour of the flower is very strong, and, though very sweet, is almost too powerful for some folk the rich fragrance arising from a large mass of its blossoms, in their unfortunate case, producing giddiness and a sense of nausea.

The *R. amplexicaulis* is an interesting buttercup to grow. Its large white flowers are quite sufficiently in accordance with one's idea of what a buttercup should be, but the very simple form of foliage, and its habit of clasping the stem, at once attracts notice. We figure it in Plate XLIII. Yet another foreigner may be found on Plate XLVI.: this is the mountain buttercup, *R. montanus*. Our specimens were one of the numerous results of a holiday in Switzerland, plant-hunting in its aim.

The pilewort, or lesser celandine, we must have, for Wordsworth's sake ¹ and our own—and perhaps

[&]quot; "Pansies, lilies, kingcups, daisies, Let them live upon their praises: Long as there's a sun that sets, Primroses will have their glory;

more especially for our own. Its golden stars (see Plate IV.) are to be met with in profusion in the hedgerows and woods. That it should be called the lesser celandine clearly implies that somewhere or another there must be a larger celandine, and so truly there is, and we shall hope to make its acquaintance presently. These celandines derive their name from the Greek name, chelidon, for a swallow, in the case of our present plant from its appearance and that of the swallow being more or less contemporaneous. When we pull the plant up we find at its base a mass of little tubers, and by this means, as in the case of the potato or artichoke, the plant is propagated very freely. It behoves one then to take quiet thought whether we want the plant or not, since when we have once made up our mind that we do the decision is final. Even the smallest tuber grows, and it is practically impossible to get rid of the plant when we have once elected in its favour. Still, as we do not want to get rid of it this reflection need not grieve us. Its brightly burnished foliage and brilliant blossoms come at a time when there is little else, and though after flowering-time has passed the leaves begin to get a little shabby, all that is needful is to pull the plants

> Long as there are violets, They will have their place in story; There's a flower that shall be mine, 'Tis the little celandine.''



BLOOD GERANIUM and PENCILLED GERANIUM.

To face page 62.



up vigorously, remorselessly, well assured that next season will bring us as goodly a show as ever.

The lesser celandine is botanically a buttercup. Most of the buttercups are partial to damp situations, and if we are able to arrange a little bit of swamp the water-buttercup, with its pure white flowers, should certainly find a place, and by all means the great spearwort, with its flowers as large as pennies. The wood-buttercup is a charming little species, and we have also grown the upright meadow crowfoot (Plate XXXII.). This branches very freely, with delicate slender stems, bears a large number of bright yellow flowers, and attains a height of a yard or more. Having got our little patch of bog we shall be careful to secure some marsh-marigold for it, a near relative of the buttercups, common enough in most places, but none the worse for that. In the language of science a buttercup is a Ranunculus, a diminutive from the Latin rana, a frog, in allusion to the damp situations which most of the species thrive in: hence some of the old herbalists call them "little frogges grass." The belief that the rich yellow of Spring butter is caused by the cows eating the great sheets of golden buttercup that then so lavishly deck the meadows is altogether without foundation. The richness of the butter arises from the general vigour of the growth of the herbage under the genial influence of the season, but if one carefully watches the cows in one of these flowery meads we shall soon perceive they very carefully avoid the golden cups. When made into hay these plants would appear to lose all their acrid and noxious qualities.

Maplet in his book "A Greene Forest," tells us how in his time "the valiant Beggers, most cunning in that their daylie craft doe make their flesh seem rawe and rancored" by the use of buttercup leaves, "to the intent men may pittie them the more, and give them the sooner their Almes; whereas peradventure they be as whole and as lustie as those that have pittie of them in very deede. But here we may percieue there is a counterfayting almost in euerie thing. They therefore to beguile men thus vse it. With this they chafe their legges, their armes, and other partes also where they will, till it blister and breake the skinne, and having so done it sheweth a right meruelous ill looke." To tender skins even the gathering of the plants may be irritant.

"For many years," wrote Carlyle, "it has been one of my constant regrets that no schoolmaster of mine had a knowledge of natural history, so far at least as to have taught me the grasses that grow by the roadside," and he prophesied that a time would come when such knowledge should be strictly required from the teacher. In many of our large Public Schools the Natural History Society is a valuable feature, and affords

an excellent opportunity for any and all of its members to acquire this desirable knowledge, while the rural surroundings of many of them supply those "happy hunting grounds" that turn the study into a delight. In our Board Schools the pressure of work is already tremendous, while their situation in the midst of our crowded streets is a great drawback. While therefore we have thousands of children in our midst who are passing in this or that standard, who can repeat the order of succession of the kings of Judah, on what river the most insignificant town in Europe is situated, or the natural products of Alaska, such natural products of their own land as a stagbeetle, a glow-worm, or the golden stars of the celandine, of which in their Readers they find the poet Wordsworth singing the praises, are unknown to them.

The want of this knowledge is not only the loss of much pleasure, but has at times its inconveniences. Such knowledge is not a mere æsthetic whim, but a possession of downright practical value. We had a curious little illustration of this lately. A great bird-fancier told us that he found it so difficult to get a sufficient quantity of groundsel that he had been planting roots of it in his own garden so as to ensure a perennial home supply, but that he had been entirely unsuccessful in rearing it. The groundsel is an annual, and springs

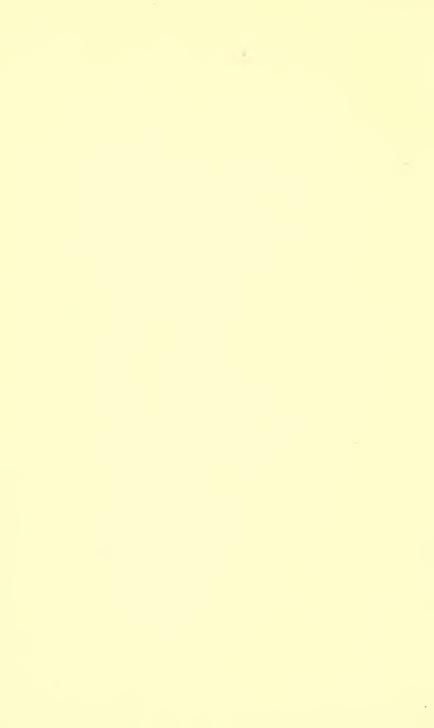
afresh each year. We sent him a large boxful of seed and he will now doubtless succeed in rearing an ample supply.¹

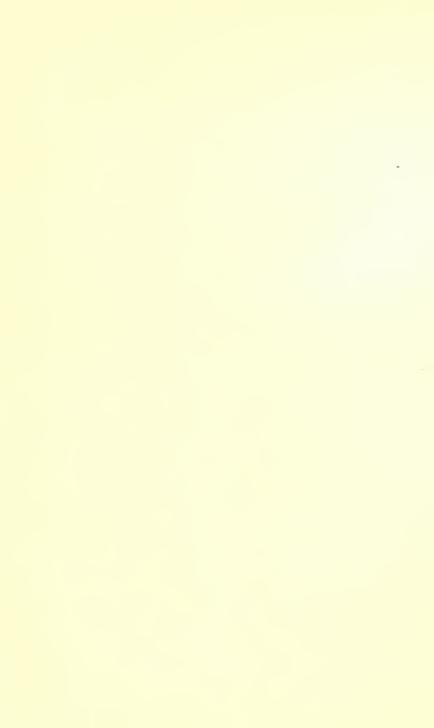
One great drawback of this want of knowledge is that children and others are ignorant of the deleterious effects of some of our commonest plants. While our chemists carefully label their bottles with full instructions and cautions as to the poisonous nature of their contents—and the sale of these drugs is very properly fenced round with many restrictions—almost any mile of country hedgerow, or acre of suburban allotment ground, contains enough deleterious material to decimate the whole parish.

From want of definite and precise knowledge, many persons think to be on the safe side by telling children that everything they touch is poisonous, and conjure up the most alarming tales as to the consequences that will inevitably ensue if the warning be disregarded. This does very well perhaps for a while, but the discovery is soon

¹ A country friend of ours told his coachman to go into the garden and dig up some celery. After a considerable wandering round the paths he was at length forced to come in and ask some one to show him which the celery was! Before this he had a servant who had come in from one of her first walks in the country in a state of great astonishment: she had seen a man digging onions up out of the ground. Till this awakening she had thought that they grew on trees,

made that actual facts do not accord with these highly sensational stories—some companion perhaps, who has not had these solemn warnings addressed to him, eating some wayside fruit, and evidently enjoying it, without coming at all to that grievous damage that was to be anticipated. The period of unquestioning faith then gives place to an equally strong feeling of scepticism—a state of things that may really end in very considerable peril. The path of safety lies in accurate knowledge alone.







SNAPDRAGON and CELANDINE.

To face page 69.

CHAPTER III

Anemones, or wood-flowers—The yellow anemone—The mountain anemone—The so-called hepatica—Lady's-smocks—The monks as herbalists—Plants as teachers of religion—Wood sorrel—Solomon's-seal—Solomon as herbalist—Tusser's "Fiue Hundred Pointes of Good Husbandrie"—Lilies of the valley—Cosmopolitan plants—Our familiar wildlings introduced into Japan, the United States, Australia, &c.—Of intention or inadvertently—Our daisies—La Belle Marguerite—Chaucer's favourite flower—The virtues of May-dew—Ox-eyes—Names suggestive of resemblance—The alkanets we grow.

THE snow-white anemones that spring up in such profusion in the copses in March and April are so called from the Greek word for wind, the name being given from an old belief that the flowers could not expand till beaten by the wind. This idea is found in the works of the earliest writers, such as Dioscorides and Pliny. It is often called the wind-flower, and especially by the poets. It is a very easy plant to cultivate, seeming to do equally well whether in the sunshine or the shade, and when once established needs no further care. On our second plate we have an illustra-

tion of the double form, where the mass of yellow anthers is replaced by a white frilling. In turning over our copy of Gerard "Of the Historie of Plants," the edition being that of the year 1633, we are interested to see an illustration of this double white wood anemone. He writes of it: "There is in some choice gardens one of this kinde with white floures very double, and I had one of them given me by a Worshipfull Merchant of London, called Mr. John Franqueville, my very good friend." The form, as he gives it, lacks the elegance of growth of our plant of the year 1908. As we see it priced at threepence a root in a gardener's catalogue i its acquisition can scarcely be held an extravagance, though ours, the gift of a botanical friend, now gone hence, has a more tender association.

The yellow anemone, botanically the A. ranunculoides, and the mountain anemone, the A. Apennina, are both South European specimens, but are occasionally found, as escapes, in England, and have obtained in consequence a somewhat dubious place in our British plant lists. The first of these has flowers of a bright golden yellow—we figure it on

¹ If we once allow ourselves to come under the spell of these tempting productions, many beautiful anemones are open to us—A. Robinsoniana, with large sky-blue flowers, A. fulgens, gloriously crimson, and others that we need not name, having blossoms of a deep blue, rich purple, sulphur yellow, pale rose, straw-colour, and many other varieties.

Plate III.—and it is scarcely surprising that some of the earlier herbalists thought it a buttercup, not the colour of the flowers alone, but the form of the foliage being reminiscent of the blossoms and leaves of one of the commonest of our buttercups. Hence, too, it is botanically the A. ranunculoides, the ranunculus-like anemone. The petaloid sepals vary in number in all the anemones, being anything in individual flowers from five to nine, but with a partiality for six. The possession of but five in the flower we figure makes the effect yet more buttercup-like. The typical growth of all these anemones is the throwing up of a single stem, surmounted by a single blossom, and having some little distance from its upper extremity a ring of three more or less elaborately cut leaves: the rising of two stems from this ring-a feature that we see in our drawing of the yellow anemome—is abnormal, though in looking through our plants we have found it in several instances. The mountain anemone— Plate IV.—is seen at its best in the Alpine pastures, but it readily accommodates itself to cultivation. Its flowers are of a delicate bluish purple. The Pasque flower, a British species, must also find a place in our collection. It is somewhat lacking in the grace of our other anemones, but its deep purple flowers and very finely cut leaves give it a welcome individuality. It is a plant of the chalk and limestone districts.

From a remote antiquity the wood anemone has had wonderful healing powers ascribed to it. Even so early a writer as Pliny, compiling his "Historia Mundi" in the first century of the Christian era, tells us of wise men of old who bade their disciples gather the first flower they saw each Spring, repeating on doing so the formula, "I gather thee as a remedy against all disease." This blossom was then reverently placed in a fold of scarlet cloth, to be left undisturbed, unless by evil fate the gatherer fell ill, when it was to be tied round his neck. The assumption was that he would there and then amend.

Yet another anemone is figured on Plate V., the plant that our gardeners ordinarily call the hepatica, in the same way that another well-known plant is popularly called the japonica. Both these names, however, are but the specific titles. The one plant is the Anemone Hepatica and the other the Pyrus japonica. The plant that we may for convenience' sake call the hepatica is not one of our British anemones, though it is common enough in Switzerland amongst the Spring wild flowers there. As we have already emphasised that one feature of an anemone plant is the ring of three leaves upon its stem, our readers may perchance feel that our illustration scarcely bears this out, but in this species this involucral ring is so close to the flower that it resembles a threesepaled calyx. It is clearly shown in the right-hand figure, after the withering-off of the perianth. The word hepatica is Greek in its origin and relates to the supposed efficacy of the plant in liver trouble.

The other two plants on our plate are also foreigners. The one to the left is one of the very numerous rock saxifrages, the Saxifraga Elizabetheæ, a charming plant for the rockery: its blossoms, large for this genus, and of a delicate sulphur yellow, being very attractive. The remaining plant is the quaint Hacquetia Epipactis, a plant that just misses being Swiss, since though it is found at the foot of the Great St. Bernard, it is upon the Italian side. These three plants were flowering with us at the beginning of April.

The delicate and graceful Lady's-smock may be found in abundance in May in damp pastures, and by the sides of streams and wayside ditches, and it may well find a place in our regard. Its old English name points to the time when this grace and delicacy of form and colour caused it to be specially dedicated to the Virgin Mary. Its tender flowers are sometimes pure white, but more ordinarily they are of lilac colour, sometimes of the most delicate tinge, at others of a more pronounced tint. Normally, the plant being a crucifer, the flowers have four spreading petals, but the blossoms may occasionally be found

double; the form we depict on Plate II. We are glad to grow both forms: the double is the less common, and therefore we select it for illustration.

In the dawn of our island story the monks were the scholars, and such culture as was existent found its home in the cloister. To the dwellers in the monastery befell at once two grave responsibilities: the care of the bodies and of the souls of men, and the plants around them, studied for the healing of the physical woes that flesh is heir to, were no less, as we have seen in the snowdrop, the symbols and reminders of religious belief. They were the teachers of doctrine, and were associated by name and legend with the saints and martyrs, and thus the wayside weed recalled, however imperfectly, to the downtrodden serf amidst the toil of the fields, to the rough soldier in the turmoil of the camp, something of a brighter hope, a higher life. Thus the little field pansy, with its threefold coloration, was to them the symbol of Triune Deity; the season of special abstinence was recalled by the Lent lily, while the Pasque flower was one reminder the more of the joy of Easter, the great Paschal feast. The cult of the Virgin Mary had associated with it an extensive Flora, as we have already seen, and this lady's-smock is but one example of many.

The wood sorrel bore Alleluia as one of its old names, not only in England but in France and



SPIKED SPEEDWELL.



Italy, from its flowering between Easter and Whitsuntide, the psalms recurring in the church services at this season being of a specially jubilant character. It is a charming little plant, alike in flower and leaf, and we very gladly find it a sheltered and rather damp corner in our rockgarden. It is an excellent weather-guide, both the flowers and the foliage closing and drooping before rain and on the approach of evening, unfolding again with the approach of daylight and sunshine. It is curious that while many plants that visibly go to rest at night will unfold their leaves again if brought under the influence of strong artificial light, the wood sorrel declines to be thus imposed upon: bedtime is bedtime, and daylight, and that alone, is the summons for awakening. The leaves are so sensitive that they droop and fold together if at all roughly handled.

The wood sorrel is occasionally found with blossoms of a bright purplish red, but the normal purple-veined white flowers are the more attractive. The delicate trefoil leaves have a sharp, sour taste, making better greenesauce than any other herb whatsoever, and our forefathers, or more prob-

¹ We are referring here to the plant as a wildling. If we turn our attention to the cultivated species of oxalis we get a great variety of colouring, articulata being yellowflowered, Bowieana crimson, rosea rose-coloured, violacea violet, speciosa purple, &c.

ably our foremothers, made from it "a cooling syrup for hot pestilentiall fevers." Besides its name wood sorrel, which we may take to be a corruption of its older name of wood sour, it was called "Cuckowes meate, because either the Cuckow feedeth thereon, or by reason when it springeth and flouereth the Cuckow singeth most." It also bore the name of stabwort, gowk-meat, and several other names of more or less local employment.

The Solomon's-seal is another early flower that we are glad to welcome in our rock-garden, and when it is once established it gives us no further anxiety, but with each rotation of the seasons is ready to step into its appointed place. It is a plant of the woods, and throws up its graceful flowering stems during May. The foliage is slightly glossy and of a rather bluish green. The veining tells somewhat conspicuously, and this feature, together with the undulating character of the leaf and its waved margins gives a marked individualism. The pendant groups of flowers are found on the under side of the stem. They spring in clusters of two or three blossoms from the axils of the leaves. are of a delicate creamy white, and of somewhat waxy texture, and terminate in a pale green, about the lower quarter or fifth of the blossom being of this tint, but all so delicately gradated that no suggestion of a dividing line between the two colours is at all felt. The flower-bearing stems are some

two feet long. The plant is found throughout almost all Europe and Northern Asia, but is in Britain decidedly local. It is sometimes called Lady's-seal. Why it should be called Solomon'sseal is not quite obvious. Two or three explanations are given, and we need scarcely remind our readers that when a boy makes two or three excuses for some lapse, it is because he feels that not one of them on its own merits is quite good enough to serve, and in the same way multiplicity of explanations indicates weakness. Solomon, we know, wrote a Flora that embraced everything, from the lordly cedar to the lowly hyssop on the wall. In this probably he dealt with the healing virtues of the plants; at all events, such men as Gerard, Parkinson, and the other old herbalists, who took this ground themselves, naturally assumed that their prototype did so too. Gerard says: "The roots are excellent good for to seale or close up greene wounds, being stamped and laid thereon: wherefore it is called Sigillum Salomonis, of the singular vertue that it hath in sealing or healing vp wounds, broken bones, and such-like. The root of Solomon's Seale, stamped while it is freshe and greene and applied, taketh away in one night, or two at the most, any bruise, blacke or blew spots gotten by falls or womens wilfulnesse in stumbling upon their hasty husband's fists. That which might be written of this herbe as touching the

knitting of bones, and that truely, would seeme vnto some incredible: but common experience teacheth that in the world there is not to be found another herbe comparable vnto it for the purposes aforesaid." If, then, we can assume two things—that the plant is of immense healing and sealing virtue, and that Solomon in his wisdom discovered this and made it known, or was at least held to have done so, we may be content to let them serve as our explanation. It seems very possible that the latter half of the word was suggested by the bunches of seals that were sometimes worn, pendant like the flower clusters.

The stitchwort, one of the most characteristic flowers of May, will ordinarily be found in profusion in the hedgerows. It is of a very light and delicate nature, yet it seems well able to hold its own in the general struggle for existence. Its flowers are of a pure white colour, and are hence very conspicuous, as they star the verdant banks with their abundant blossoms.

In Tusser's "Fiue Hundred Pointes of Good Husbandrie" many plants are commended for cultivation. Some, as "lettice, cresies, sorrell,"

¹ Another old writer declares that for the staunching of blood it is sufficient to hold some Solomon's-seal in one's hand till it grow warm there, or longer if need be." This latter stipulation would probably frequently be of necessary employment.

are for "sallets": others, as "beanes, cabbagis, goordes, parseneps," are "herbes and rootes to boile": others are "strowing herbes" for the chamber floor, and these include such fragrant plants as "bassel, baulme, sweete fennell, and lauender." Others again are for the still, or "necessarie herbes to growe for Physick," while yet another section is devoted to "herbes for windowes and pots," and these, though many of them were held of medicinal value, were clearly in this particular connection primarily chosen for their attractiveness. Amongst these appeals to the æsthetic we find "collembines, cousleps, daffadondillies, panncies, lillium cum valium," and many others, one ambition set before the reader being to grow "holiokes," a rather formidable undertaking as a pot-flower for one's window-sill.

The lillium cum valium, often called by old writers the lily convally and the May lily, is the plant we nowadays call the lily of the valley, but to see this at its best we must seek it in its woodland home. It is abundant enough in some of our counties, though rare elsewhere. Gerard, we see, writing in 1633, says that "it groweth upon Hampstead"

The sweet lily of the lowly vale, The queen of flowers."

KEATS.

² Botanically it is the *Convallaria majalis*, the generic name signifying a dweller in the valley, the specific name indicating May as its flowering season,

heath, foure miles from London, in great abundance," but the ever-growing metropolis has long since filled up this intervening space, and any search for May lilies in this direction is now a quite hopeless quest. The flower is a good deal forced by the florists in these latter days, but these larger blossoms, with the sickly green attendant foliage, lack the charm of those grown naturally, and, possessing a noble mass of them in a sheltered corner, we are well content to wait until such time as Nature gives the impulse, and the fragrant blossoms peep forth from the sheathing and protecting leaves, to be followed in turn by the crimson berries.

Our ancestors held the flowers a specific for "the paine and griefe of the goute," a decoction of them being outwardly applied. This one mediæval enthusiast declared to be "most excellent," while another calls it aqua aurea—golden water; others distilled the flowers with wine, for the restoration of speech "vnto those that have the dum palsie and that are fallen into the apoplexie"; while the flowers being dried and burnt, either by the fume or the scattering of their ashes, were of magical potency to drive from the dwelling all evil spirits.

To the Nature-loving wanderers far away from home the sight of some well-remembered plant of the old home is a great delight. Sometimes one encounters specimens that are only strongly re-



SALSIFY and OX-EYE.



semblant of those of the English country-side, but at other times the real thing. What we call our English plants are naturally often found over a considerably larger area than that of these little British Islands, and some, in fact, are cosmopolitan. We have lately seen a list of plants that was compiled by a traveller on the Amoor, and not only did he encounter an abundant store of things wholly unknown in England, but such familiar wild flowers as the lily of the valley, strawberry, dandelion, daffodil, celandine, snowdrop, ox-eye, and the red and white clovers, while in another far-away locality-Baluchistan-we find amongst other flowers well known to us at home the columbine, watercress, shepherd's purse, stork's-bill, the red and white clover again, blackberry, hawthorn, fennel, chicory, sowthistle, toadflax, pimpernel. henbit, and round-leaved mallow.

In many lands the plants we recognise as British are not indigenous; their arrival has been one of the unintended results of colonisation or commercial intercourse. When railways were first introduced into Japan it was found well to sow grass seed imported from England to bind the soil together on the embankments and in the cuttings; with this came the seeds of various wild plants, and many of these, as the daisy, buttercup, dandelion, have settled down quite happily in their alien surroundings. In 1837 the botanists of the

United States recognised one hundred and thirtyseven plants as introductions from foreign countries, principally from England, but this number has now more than doubled. Chickweed was introduced by a bird-fancier: in ten years it had spread in all directions over fifty miles from the little hamlet in South Carolina where it started, and is now hopelessly irremovable. It is rather striking, too, that these British plants often attain to a greater vigour in congenial foreign countries than at home, the imported thistles in Australia and America thriving with an excess of vigour that the unsympathetic landowner bitterly regrets. A New Zealand correspondent tells that he has seen thistledown lying in some places a foot in depth on newly cleared forest land, while the watercress and brooklime seriously threaten to divert the courses of the rivers. Furze, broom, sweetbriar, blackberry, all plants that we can here keep well under control, are in the Southern Hemisphere very expensive to keep down. Shepherd's purse, horehound, willow herb, ox-eye daisy, mouse-ear, chickweed, and numerous other plants are all settling down, while the English wild flowers, such as the

¹ A friend near Sydney asked us to send him some dandelion seed, as he had had the plant so highly commended medicinally, but we declined the responsibility of starting millions of dandelion seed-heads blowing over Australia.

daisy, primrose, harebell, cowslip, and hyacinth are, for old association's sake, welcomed in the gardens of many a New Zealand home.

It may appear to our readers that to cultivate a daisy is driving a hobby rather hard, but happily the point has never arisen in our experience, for the simple reason that the fair wildling comes unbidden, but is none the less welcome. The "wee, modest, crimson-tipped flower" may seem a blemish to the martinet gardener, as it gems his verdant turf, I but we do not grow that sort of gardener, and those who come into our domain must accept us, hobbies and all.

The daisy is pre-eminently the flower of the poets. Burns sings of the "Sheets o' daisies white," and over and over again dwells on their charm. Wordsworth compares the daisy to "a silver shield with boss of gold," to "a queen in crown of rubies drest," to "a little Cyclop with one eye," to "a nun demure of lowly port," while both Milton and Shakespeare write of the "daisies pied." ² Pied in the old writers is a word used to express a sharp contrast of colour, as in the

" "Daisies, ye flowers of lowly birth, Embroid'rers of the carpet earth, That stud the velvet sod."

CLARE

^{*} Thus Shakespeare in the "Tempest" uses the epithet "pied-ninny," as being equivalent to jester or fool, from the gay parti-coloured clothes of the professed fool.

black and white plumage of the magpie. Shakespeare sees the contrast in the bright yellow boss as contrasted with the pure white rays that surround it, while Milton sees it in the verdant mead besprinkled over with the daisies.

The name daisy is a corruption of the original day's-eye—a name bestowed upon it from the expansion of the flower-heads in the daytime and their closing at night. Chaucer's love of nature is manifested everywhere in his writings, and the lowly daisy was to him—

"Of all floures the floure, Fulfilled of all vertue and honoure, And ever alike faire and fresh of hewe, As well in winter as in summer newe."

He tells us that "when commen is the Maie" his delight is at early dawn to seek the meadows "to see this floure against the sunne sprede," having already noted how with the setting sun—

"This floure how it will go to rest,
For fear of night, so hateth she darkness."

Over and over again in his writings we see a very special regard for this little flower.

In France the daisy is the marguerite; hence it has been chosen by those of highest estate as an

" "The little dazie that at evening closes."—Spenser.

emblem. Louis the Ninth of France took this flower as his device in honour of his beloved consort Marguerite, wearing a ring of fleurs-de-lis and daisies entwined, with the inscription, "What we cherish," the fleur-de-lis standing for his devotion to la belle France, the daisy his affection for la belle Marguerite. Margaret of Anjou, the wife of our King Henry VI., also bore the daisy, little as it suited her imperious nature, as her device. Drayton tells how the nobles thronged to meet her when she landed at Southampton, and how each and all wore her cognisance—

"Of either sex who doth now delight To wear the daisy for queen Marguerite?"

Prosaic as it may appear after sentiments so poetic, associations so regal "the iuyce of the leaves given to little dogs with milk keepeth them from growing great." Victims "to all kinde of paines, but especially in the ioynts," gouty folk, people troubled with "naughtie humours" (of physical, not moral, origin), bruises I or swellings of all kindes, all resort in earlier days to this little plant for alleviation of their various ailments.

Readers of Chaucer will recall his delight to sally forth on the bright May mornings to see the opening daisies unfolding in the sunlight, and this

Hence an old name was bruisewort.

reminds us that amongst our ancestors the gathering of the May-dew was another reward for early rising, as it was supposed to be of special virtue. A quite other chronicler, the gossiping Pepys, tells us in his Diary, under the date May 11, 1669: "Troubled about three in the morning with my wife's calling her maid up and rising herself to go with her coach abroad to gather May-dew, which she did, and I troubled for it, for fear of any hurt, going abroad so betimes, happening to her, but I to sleep again, and she home about six." The journey was so far a success that a fortnight afterwards we find Mrs. Pepys "away down to Woolwich in order to little ayre, and to lie there to-night, and so gather May-dew to-morrow morning, which Mrs. Turner hath taught her is the only thing in the world to wash her face with, and I am contented with it." It was held that special virtues attached to that gathered from particular plants; thus, for example, Sir Hugh Platt 1 tells us that the dew that was collected from fennel or celandine was specially good for brightening the eyes.

The ox-eye is another plant that we gladly cultivate. It is, as most of our readers know,

[&]quot;" Delights for Ladies, to adorn their Persons, Tables, Closets, and Distillatories; with Beauties, banquets, perfumes, and Waters." The book was "dedicated to all true lovers of Arte and Knowledge," and was published in 1602.



PINK BINDWEED.



a magnified version of the little daisy that we have been dealing with, having the same golden central boss, the same pure white surrounding rays. It will be found figured on Plate XIII. It is common enough in the long grass of the meadows before hay-making time, and on the railway embankments, but its abundance makes it none the less welcome. Pechey, we see in his "Compleat Herbal," 1694, declares that "a Decoction of the Herb cures all Diseases that are occasioned by drinking cold Beer when the Body is hot," so that the injudiciously bibulous, and those numerous folk who have the troublesome habit of asking what is the good of everything-to whom the beauty of the plant is not a sufficient end-may regard it now with greater interest and favour. The ox-eye was held to be an excellent healer of wounds, and a very present remedy of difficulty of breathing. It is a particularly easy plant to grow, and when planted in a goodly clump the large radiate flower-heads tell out brilliantly from the midst of the surrounding verdure. The name ox-eye is one example the more of the popular desire to trace a resemblance between almost anything and some other thing that is really radically different in nature from it; thus in the great starry vault of heaven, in the midst of unfathomable, unimaginable space, Charles's wain may be seen, though who Charles was, and what his entirely incongruous wagon

is doing up there, nobody knows or cares, while a waterfall, sufficiently beautiful in itself, has to many people a greatly added charm when held to be reminiscent of a bridal veil. Most people like to feel that they are folk of rather exceptional penetration, and to detect that little Mary aged three is the very image of her uncle John, aged eighty-one, affords them an immense gratification: very naturally, therefore, plant-names dealing with comparison and suggested resemblance form a very large class. The man who first detected any likeness between the eye of an ox and the expanded florets of the plant before us, and saddled the flower with a name so barbaric, must either have been gifted with a specially strong imagination, or possibly we may decide on fuller consideration, a particularly weak one.

The two alkanets should find a place in our garden. The so-called common alkanet is one of our rarer British plants, and has but little claim to a place in our flora. It is the *Anchusa officinalis* of the botanist, and it is just this officinal character that has brought it to our shores in earlier days. It may be found on waste ground occasionally, and

"It is an herb under the dominion of Venus, and indeed one of her darlings, though somewhat hard to come by. It helps old ulcers, hot inflammations, burnings by common fire and by St. Anthony's fire, by antipathy to Mars: for these uses your best way is to make it into an ointment: also if you make a vinegar of it it helps the leprosy."—Culpepper.

more especially in our northern and eastern districts. Dioscorides and other venerable authorities held it good as an antidote against the bites and stings of noxious and venomous things. As our ancestors had a morbid terror of such attacks from the adder, shrew-mouse, spider, scorpion, and other creatures, the alkanet was held by them in high esteem. Its name is Greek in its origin, and refers to its supposed constringent power. The somewhat bitter root was, according to Parkinson,1 "thereby fit both to condensate the thinne humours in the body and to extenuate those that are thicke, and as well to cleanse the chollericke as to wash the salt humours therein." "The oyntment that is made with a pint of good sallet oyle, wherein two ounces of the rootes of alkanet and twenty earthworms hath beene boyled and afterward strayned forth and kept in a pot, is a singular good salve to use for any fresh wounds, made either crosse the flesh, or deepe thrusts thereinto, as also where nerves and sinewes are, to consolidate and knit them againe. Workemen of all sorts, that use sharpe and pointed tooles, ought to have it familiar among them, to use upon all occasiones of harme." The flowers are very attractive to bees and other insects.

Our second alkanet, the Anchusa sempervirens, which we have figured on Plate VI., is a particularly

^z Or according to a dozen other old writers, as they all copied from each other.

charming plant. We have it fully in flower in May and June; its stems, some two to three feet long, carrying a mass of brilliant blossoms. As the flowers are of a rich, pure blue, a somewhat unusual colour, it is a very desirable plant to have in one's rock-garden. It is one of our rarer plants, but once established it spreads freely, and springs up sturdily, year after year, without need of any attention. The evergreen character of its broad, ovate foliage is another feature in its favour. It appears to be truly wild in the south-western counties, but we have met with it in Sussex and elsewhere. Our particular plant came years ago from a kindly friend who dug it up for our benefit in a wood near Clifton, but it has increased mightily, and we in turn have had the pleasure of sending offshoots of it far and wide.

One may occasionally see in cultivation an allied species, the *Anchusa tinctoria*—a plant much grown on the Continent for the value of its root as a dyeing material. Many tons are imported into Britain each year for various trade purposes, one of the least legitimate being its use as a colouring material in the fabrication of so-called port wine.

CHAPTER IV

Museum facilities for the identification of plants—The Star of Bethlehem—Dame d'onze heures—The greater and lesser periwinkles—Live and let live—Sorcerer's herb—The "Historie of Plants, set forth from the Almaigne toong"—The columbine, or culverwort—Lion's-tooth—The "Paradisus" of Parkinson—Red valerian—The fragrant garlic—The mariner's defence—Our rampant stray-berries—The "Via Recta" of Venner—Our various geraniums—The Doctrine of Signatures—Celandine—The mystical vervain.

In some of our provincial museums it has become an excellent custom to make collections of living wild plants, placing them in bottles of water, and naming them. It is very pleasant to see the attention they receive from the visitors, some of whom bring with them fresh plants to add to the

¹ The Corporation Museum at Brighton has done this notably well for some years. There are museums and museums. In the museum of another popular seaside resort on the South Coast we saw exhibited in one glass case three Greek vases, the horn of a narwhal, the saucer used by Nelson on the morning of his death, a Babylonian stamped brick, and a mummified fish! The over-broad classification that can group together things so incongruous seems to call for reconsideration.

store, or to verify by comparison. It is, we need scarcely say, the essence of such an arrangement that it should be in the hands of a curator at once enthusiastic and accurate. In one museum which we have visited, the plants are in a corridor between the entrance and the main building, the result being that mischievous boys shift the labels about, and the educational value of the collection is hopelessly spoilt, it being entirely useless to make the acquaintance in the morning of what the label calls a poppy, to find that later on it is an ox-eye, and towards evening has become a foxglove. Plants can'be so readily sent in tin canisters or boxes that we give ourselves the pleasure of forwarding to curators specimens for their water-bottles, thus introducing the alkanets and such-like scarcer plants to hundreds who might otherwise never come across them. Another interesting Spring plant which we welcome in our rock-garden is the Star of Bethlehem-the Ornithogalum umbellatum. Though fairly established in pasture-land in some parts of England, it is not really a native. Its large white flowers, clustered together at the ends of the long stems, are very

¹ Amongst a number of gatherings that we took to one of these museum collections were specimens of chamomile and ox-eye daisy. Both were put by the curator into one bottle and labelled "Corn feverfew, Chrysanthemum segetum." They could not both be feverfew. They were neither of them feverfew. If they had been feverfew they would not have been Chrysanthemum segetum.



INULA MONTANA and INULA HELENIUM.

To face page 92.



conspicuous. The perianth segments spread out into a sharply pointed stellate form, the pure white of their general surface being varied by a central line of strong green. The leaves, all springing directly from the ground, are of the narrow linear form that we see also in its companions, the daffodils and hyacinths. The plant rises from a bulb that is somewhat deeply bedded in the ground, so that some considerable care is needed if we would dig it up; we have time after time found that we have sliced the bulbs in our attempts to move them. In France it is the dame d'onze heures, since it opens its blossoms considerably later than most flowers and in dull weather declines to expand them at all.

The two periwinkles must not be overlooked, though the larger one—the *Vinca major*—has great running powers, and asserts its right to overrun and suffocate everything it comes in contact with. It must therefore be placed where it can spread freely without depriving neighbours of the air, sunshine, and the other elements of their well-being in its too vigorous assertion of the survival of the fittest. The smaller periwinkle—*V. minor*—is more amenable to fair play—the live and let live principle and may be welcomed where the other would be

¹ A quaint illustration of this principle may be seen in the case of two neighbours of ours—fishmongers. The smaller man, in danger of being swamped by the other, painted over his dwindling stock of little dead fishes this inscription: "Live and let live."

out of place. In each kind the flower is of a lilac-blue, larger or smaller in size according to the species. Chaucer and other old poets call the plant pervinke, the name, like our modern periwinkle, being from the monkish Latin pervinca, which in turn was derived from the Latin words per and vincire, to bind about. Some would tell us that the name arose from the use of the plant in garlands, but such an employment of the plant is scarcely monastic, nor is it a flower of sufficient brilliancy and attractiveness to suggest such a festal use. We may more readily accept the second explanation -a suggestion obvious enough to those who found a place for it in the herb-garden of the monastery, that its long stems, all-embracing, made its name of binding plant specially appropriate. In Italy it is true that at the present day it is called the flower of death—Fior di Morto—since it is used to deck the bier of dead infants, while in France it is the Violette des Sorciers, certain magical qualities being popularly ascribed to it.

[&]quot;Parvenke is an erbe grene of colour; In tyme of May he beryth blo flour. His stalkys are so feynt and feye, That never more groweth he h ye. On the grownde he rennyth and growe, As doth the erbe that hyth tunhowe, The lef is thicke, schinende and styf, As is the grene ivy leef."

We occasionally find the two periwinkles with variegated leaves, but this is either a natural sport or, more ordinarily, a not altogether desirable bit of interference of the florists.

In our copy of the "Historie of Plants" of Dodoens' edition of 1586, "set forth from the Douch or Almaigne toong into English by Lyte," we find several "vertues" ascribed to the "peruincle" from the healing of "the stinging of venomous beasts" down to toothache. Anything that was a specific for the poison of a tiger or the sting of a lion would clearly be of immense value to explorers, and if our home-grown pangs of toothache could be alleviated it would, on the principle of the greatest happiness of the largest number being of prime importance, be of even more value.

The two periwinkles have a certain astringency that has made them acceptable in the rustic flora medica, though they occupy no place in the professional pharmacopæia. An ointment from the leaves is largely used, the fresh tops of the flowering stems being chopped and set simmering in a pipkin with some lard.

The columbine is a flower that we grow freely, as, whether we find it a mass of blossom or a rosette of foliage, it is alike pleasing, and even after the flowers have passed away the quaint seed-vessels that succeed them have an interest of their own. In the hands of the gardener it is a plant that has

proved itself very plastic, a great variety of colour being obtainable, while in some the spurs are developed to an extraordinary length. Gerard, in his "Historie of Plants"—our edition bears the date 1633—describes many varieties, "as nature list of to play," while Parkinson in his "Paradisus," published in 1629, declares that "there are many sorts of columbines, as well differing in forme as colour of the flowers, and of them both single and double carefully noursed up in our gardens, for the delight both of their forme and colours." The enterprise of the horticulturists in this direction is therefore no new thing. The columbine appears to be really a plant of the woods of Southern Europe, but it has for centuries been naturalised with us. Though popular as a cottage-garden flower and therefore at times under suspicion of being an escape from cultivation, we have found it in localities far remote from human dwellings, and where it was an undoubted wildling. The plant was sometimes held a symbol of grief. Thus, in Brown's "British Pastorals" we find the lines:-

> "The columbine, by lonely wanderer taken, Is then ascribed to such as are forsaken."

¹ Those who care to add these cultivated forms to their collection will find the following of value: Aquilegia chrysantha, A. californica, A. glandulosa, A. Skinneri. The first of these has bright yellow flowers; in the second they are

This would possibly be on account of the deep purple of the flowers, that colour throughout the Middle Ages being associated with the idea of mourning. On the other hand, Drayton crowns his lady fair, as a symbol of rejoicing, with "a goodly chaplet of azured columbine"; while Spenser cries, "Bring hither the pink and purple columbine." This flower is rather a favourite with Spenser. In his "Garden of Beauty," after dwelling on the ruddy cheeks and wondrous eyes of the fair one, he goes on to compare, though one scarcely sees why, "Her neck, like to a bunch of collumbines."

The columbine derives its name from the Latin word columba, a pigeon, as the flowers strongly resemble a cluster of birds, while its older name of culverwort is, in like manner, from the Anglo-Saxon culfre, a pigeon. In its botanical name this ornithological suggestion still obtains, but here it is Aquilegia, from the Latin word aquila, an eagle. It may at first seem strange that the familiar name of a common English plant should be derived from a Greek or Latin source, but it must be borne in mind that the ecclesiastics in mediæval times were not only the scholars of the period, keeping alive the knowledge of the classic tongues, but were also the "leeches" ministering through their knowledge

red and yellow; in the third blue and white, while in the last they are green and red. There are many other forms. of herbs to the bodies as well as the souls of their flocks. The patient learned the monkish name and adopted it. The French names are equally readily accounted for, as they are evident survivals from the days of the Normans and Plantagenets. A medicinal value was at one time ascribed to the columbine, as indeed to almost everything else, but this reputation, which was considerable, has not borne the test of experience.

The increased attention paid in schools to nature-knowledge in these latter days should presently bear fruit. We were rather startled awhile ago when a country child brought us what she called columbine, but which was really red-berried bryony. Perhaps she was aware that the climbing stems of the hop are popularly called bine, and, recognising that the bryony too was a climber, she concluded that it was the column-bine. Children go very largely by sound, and the result is not always a success.² The need

¹ Thus the dandelion is really the dent-de-lion, though why it should be called the lion's-tooth is not very apparent. In heraldry, no matter what colour the lion introduced in the arms may be, the teeth and claws should be of gold; hence some see in the golden heads of the dandelion, with their jagged florets, a sufficient justification of the name. Others tell us that the form of the leaf resembles the sharply pointed and curving teeth of the lion. Its older generic name, Leontodon, is derived from the Greek words for lion and tooth, and the plant bears a very similar name in most of the European languages.

² As, for instance, in a village class taking up nature-study,



WALLFLOWER.

To fuce page 98.



of this nature-knowledge was borne in upon us when called upon to adjudicate on some collections of wild flowers. The specimens sent in had to be named, free reference to books or teachers being allowed, the result being that woody nightshade was called dead nettle, betony became bugle pro tem, selfheal was re-named as mint, yellow rattle for the nonce was hop, valerian was called yarrow, and, perhaps most extraordinary of all, the bulbous crowfoot, the commonest of all our British buttercups, was transformed, so far as erratic nomenclature could effect the change, into a primrose. The spelling included such eccentricities as saxifridge, for-get-me-not, crainsbill, meadow-sweat, butercup, dandeloin, tormentle, and hycanth.

The columbine is depicted on Plate VII., the righthand flower being the normal wildling, and the lefthand one a double variety. The small size of our plate scarcely enables us to do justice to the beauty of the foliage.

The red valerian, the Centranthus ruber of the botanist, is another plant that thrives well on rockwork. It is really a plant of the Mediterranean basin, but has for centuries been thoroughly acclimatised, being found freely on old walls, cliffs, the sides of chalk-pits and railway cuttings, and, especi-

the answer to the question "What is a rodent animal?" was "One that goes on roads." "What is anatomy?" "That which tells us about gnats."

ally, near the sea. Most of our plants of it, which grow very luxuriantly in dense masses, and appear able to stand almost any amount of subdivision, sprang from one small piece that we dug out of the face of a cliff at Weston-super-Mare, and visitors to the Isle of Wight will recall how beautifully miles of the undercliff are decked with it. Its flowers, small in themselves, are grouped into large masses of rich colour, varying in different plants from deep rose-colour to crimson, or, occasionally, white. Its old English name is the setewale; thus Chaucer, writing in the reign of Edward III., tells how—

"Ther springen herbes grete and smale, The Licoris and the Setewale."

The idea of deliberately and of set purpose planting garlic in one's garden may be rather a shock to some of our readers, but, truly, there are few flowers of the early Summer more delicately beautiful as we see the white stars clustered together against a background of rock or foliage. The ways of the lover of wild nature appear to be often found perplexing to those other folk. We were showing our rock-garden with some little pride to one of these latter, and he presently espied some fine plants of the upright meadow crowfoot in full bloom rising amidst the great masses of fern. The companion of my walk looked at them dubiously and then said, "I suppose you will

not let those stay there?" with a considerable emphasis on the "those," implying that the whole thing was wild and uncared for, and he seemed somewhat astonished when we said that we had deliberately planted them there; a man, apparently sane, who would knowingly set wild buttercups in his garden, being beyond his comprehension.

An old herbalist tells us that "the leaves of garlick stamped are good sauce to eat with fish, and with butter in Aprill and May, being eaten by labouring men. It discusses the inconveniences caused by minerall vapours, and heals the jandice, cramps, and cold diseases." Its strong smell made it, according to Markham, in his book on "Husbandry," 1638, "an excellent waye to take Moles." One merely puts "garlic into the mouthes of the holes and they will come out quickely as amazed," while yet another old authority, Buttes, in his "Table Talke," published in 1599, declares that "Garlicke is of most speciall vse for sea-faring We concluded that this must be from some antiscorbutic quality, but we find it commended as "a most excellent preservative against all infections proceeding from the nastie sauor of the pump or sincke, and of tainted meates which the mariners are faine to eate for fault of better," the sickening smell of the bilge water or of putrid beef or pork being not removed but merely over-

¹ Lovell, writing in 1665.

powered by the yet more potent odour of the garlic. In like manner a yet earlier writer, Bartholomeus, says of garlic that "it overcometh al other strong smelles, and therefore men that must needes passe by foules places, or make them clene, arme and defend them selfe with strong sauce of garlyke." This is all very well, and at least serves to illustrate the theory that when a dog has lost his character he may as well be hung up at sight, but no one need fear to introduce the garlic into his garden on the strength of these extracts. If one chooses to bruise the plant it gives forth a strong onion-like odour, and if one does not choose to do so, which will probably be the case with most people, it is no more an offence to the super-sensitive nose than any of its neighbours. "It helpeth against the byting of an adder," and was held by our forefathers to be of abounding efficacy against all kinds of venom, the bite of a mad dog, the sting of a scorpion, and the like perils.

An excellent little plant to fill up any spare room is the strawberry, the only drawback being that it sets about the task with such hearty goodwill that we soon find it encroaching on the rights of its neighbours. The plant throws out many running stems from its crown, and these in turn root and repeat the process; hence we see the reason of its real name, the stray-berry. It is found in the woods, and seems equally at home in Surrey or

Siberia, the forest-clad slopes of the Atlas and the Himalayas. The flowers are sharply cut up into five pure-white petals around a central mass of yellow stamens, so that they tell out very effectively, and the crimson fruits that follow on are equally attractive and have the further recommendation that, whereas the blossoms appeal to one sense the fruit appeals to two. The leaves are of a somewhat deep green and often assume a greyish appearance from the silky hairs with which they are more or less covered.

Venner, in his "Via recta," bearing date 1650, declares that "the wild or voluntary strawberries are not so good as those that are manufactured in gardens, because they consist of a more terrene nature by reason whereof, as also of their styptick asperity, they soon offend." That they are more trouble to gather, on account of their small size, than the cultivated ones cannot be denied, but when, as in Switzerland or Norway, they are gathered by others and the first one knows of them is their appearance with delicious cream, terrene or not, they form a dish by no means to be despised. If Shakespeare tells of the good strawberries to be found in the Holborn Garden of my lord of Ely, Spenser, in his "Faerie Queene" introduces us to those who "together went to the greene wood to gather strawberries." The honest truth, without prejudice on either hand, we take it, is that wild strawberries are very good, and cultivated ones are yet better.

The various species of wild geraniums, or crane's-bills, will of necessity find a place in our rock-garden, since no plants possess a greater charm, though the various stone-crops and saxifrages run them hard. The commonest is the herb Robert, and it is as beautiful as any of them, its delicate pink flowers and richly cut foliage being a most welcome addition to our wild garden. While throughout the summer the leaves are of a bright green, in the Autumn they and the numerous and freely branching stems turn to a rich crimson. It seeds so freely that we may presently find our store growing too abundant, but it is very easily kept within bounds. Variation to white is one of the commonest colour changes in plants; we may see it in the hyacinth, bugle, violet, and various other flowers, and we have sometimes found the herb Robert bearing blossoms of a pure white. A variety may sometimes be found near the coast that has smaller leaves and flowers than the normal plant: this has been differentiated by some writers as the Geranium purpurem. On gathering the

¹ Those who would stray beyond the limits of our indigenous flora will find in the *Geranium argenteum*—Plate XXX.—a charming Alpine plant, with silvery foliage and pale rose flowers. *R. cinereum*, *R. armenium*, *R. angulatum*, are other excellent rock plants, and to these many others might be added,



YELLOW LOOSESTRIFE.

To face page 104.



herb Robert one is conscious that the plant gives forth a strong odour, which to some folk is an added attraction, while others entirely fail to confirm this. The name has been in use some hundreds of years, and various theories as to its origin and significance have been evolved. As written it suggests association with some person, and St. Robert, Robin Goodfellow, and other more or less mythical individuals, have been evolved, I but very possibly this Robert is but a corruption of rubwort, the red plant.

It was an article of mediæval belief that an allwise, all-merciful Providence had given in the wayside weeds remedial efficacy for all the ills of mortality: that it was man's duty to study and work out so great a boon, and that the plants themselves often bore not obscurely impressed upon them their service to suffering humanity. This belief is known as the Doctrine of Signatures, and is referred to as a matter wholly beyond cavil by the older writers. "Though Sin and Satan have plunged mankinde into an Ocean of Infirmities, yet the Mercy of God, which is over all his workes, maketh Grasse to grow upon the Mountaines and Herbes for the use of men, and hath not only stamped upon them a distinct forme but also hath given them particular Signatures whereby a man

¹ In France the plant is the Bec-de-grue Robertin, and in Germany it is the Ruprechtskraut.

may read the use of them." It is evident that a theory of this kind affords a noble opportunity for the play of the imagination. The foxglove derived its older name, the throatwort, from a belief that the spotted interiors of its tubular flowers indicated its use in ulcerated sore throat. The curling spiral form made by the buds of the forget-me-not was supposed to be suggestive of the tail of a scorpion, and in all the old herbals it is called the scorpiongrass and regarded as a potent preservative against the assaults of these creatures. The tormentil. from the red colour of its root, was called the bloodroot, and was therefore employed to relieve severe bleeding—a service to which the crimson leaves of the herb Robert were also put. These must indeed have been the ages of strong faith, and of powerful determination not to allow untoward facts to disturb belief. It seems strange that such a theory could have held its ground a week when brought to the test of practical experience.

The dusky crane's-bill, or *Geranium phæum*, is a very welcome addition to our rock-garden, as its curiously coloured large flowers are very noticeable, their dull, chocolate-red tint¹ being so unusual. A quaint local name for it is the mourning widow. The plant, too, stands boldly erect and flowers

¹ It is in France the Geranium brun, while the German name is even more precise—the Rothbrauner Kranichschnabel.

freely: we figure it in Plate VIII. The dusky crane's-bill may occasionally be found in woods and copses, and in some districts, and especially in the North, under conditions that militate against the idea of its introduction by human agency, but it is really at home in Central and Western Europe. While there is strong suspicion of the plant having originally been brought to these islands by the hand of man, it is now well established in many localities, and duly finds place in the lists of our British flora. The knotty crane's-bill, G. nodosum, the purple flower on Plate IX., is another Continental species, as is, too, the pencilled geranium, the smaller flower on Plate X. These are both cultivated in gardens, and occasionally stray outside or are cast forth. Both are at times found under conditions that justify at least the verdict of apparently wild. Both do well in our rockgarden, the latter especially forming large masses. It was gathered amidst the herbage on a grassy bank on the coast of Yorkshire, and at considerable distance from any human habitation.

The second plant on Plate X. is the blood geranium: the name none too happily or tastefully bearing record to the rich crimson of the blossoms. Though often, from the attractive colour of its flowers, and their large size, found as a garden plant, it is an undoubted wildling. It should be looked for on high-lying pasturage, and if this be

on limestone so much the better. It is curious that while in all the other crane's-bills the flowers are in pairs, in this one they stand singly on the long stems. In the other species one or two scales will be found at the forking of the stems, and these scales may also be seen on the stem of the blood crane's-bill, as a sort of concession to crane's-bill custom, though the second stem puts in no appearance. Those who have only seen it as a garden plant can form little or no idea of its vigour of growth and luxuriance under conditions fully favourable to its well-being.

The noble meadow crane's-bill, two or three feet in height, surmounted by its large purple flowers; the charming little shining-leaved geranium that, like the herb Robert, turns so rich a crimson in the Autumn, the dove's-foot, are all common species that must be by no means overlooked. The Geranium argenteum, the silver-leaved crane's-bill, figured on Plate XXX., is a foreigner. Its pale grey foliage makes a charming contrast with the surrounding verdure.

The celandine finds a welcome place in our rock-garden, partly from its golden blossoms, but more especially from the quaint form of its foliage. We figure the plant on Plate XI., but exigencies of space compel us to be content with a very small leaf; many of the leaves are really seven or eight inches long. The celandine is an ornamental her-

baceous plant that may be freely met with in the hedgerows, and abounds in an orange juice which flows freely when the stems are broken across. This juice is very acrid, and though it has in olden time had a place amongst the materia medica, its administration in any considerable quantity would probably be dangerous. There is little or no fear of accidental poisoning, however, as merely touching the juice with the tip of the tongue gives a pungent and burning sensation that lasts for a long time, and is so entirely nauseous as to render any considerable repetition of the experiment very improbable. This yellow juice was naturally held, in accordance with the Doctrine of Signatures, to be a specific for the jaundice. Many other uses were ascribed to the plant, but we need only mention one other, the application of this juice to the eyes to sharpen the eyesight—a remedy which, personally, we should be very chary of trying. The name of the plant is derived from the Greek word chelidon, a swallow, and the plant was so called from a belief that the young swallows were born blind, and that the parent birds gave them sight by

[&]quot;We omit to recite the many vertues and endlesse faculties ascribed unto plants, which sometimes occurre in grave and serious Authors, and we shall make a bad transaction for truth to concede a verity in half. To reckon it up were an imployment for Archimedes, who undertook to write the number of the sands."—Browne, "Pseudodoxica Epidemica," 1650.

rubbing their eyes with this herb, or restored their vision if lost by any mischance.1 Even before the Christian era Dioscorides called the plant the chelidonium, while Pliny says "the brute animals have been the discoverers of certain plants, and amongst them we will name the Chelidonia first of all," and he then goes on to narrate the popular belief that we have given. It was a most natural onward step to take to believe that what was of such miraculous value to the little swallows would naturally also be of healing power to mankind. As we see the hedge-banks bright with the golden rays of the hawk-weed florets, they recall to our minds another of these old Greek fancies, for these plants were so called two thousand years ago, from a belief that the hawks eat these plants to strengthen their eyesight.

Insignificant in appearance as the plant is, we must certainly find room for some vervain. It is not without a certain lightness and grace, but it is chiefly from its associations that one regards it with interest, since it was for centuries "the holy ver-

This belief is gravely set forth throughout the centuries, each author embodying it in his book as a matter of course. One example will suffice: "When as the Swalow adydeth and buildeth amongst vs this plant serueth to great vse and purpose. For if at any time by any mischance of fortune hir yong be hurt or perilled in their eiesight the dam goeth to this Herbe and presseth forthe his iuce, whiche being so done, she annoynteth it about their eies, and so restoreth them to the better, and their former state and case againe."—MAPLET, 1567.



GOLDEN SAXIFRAGE and SEA PLANTAIN.



vayne agaynst witchcraft much avayling"; a plant held in reverential regard. An outward application of the juice of the plant to the hands ensured, it was believed, the possession of one's heart's desire, gained the affections of all whose love was sought, turned aside the malice of one's enemies, healed all diseases. To gather a plant of such inestimable worth it was necessary that neither sun nor moon should be shining upon it at the time, and as atonement for the robbing of the earth of such a treasure an offering of honey was poured on the ground. The Greeks and Romans purified their temples by sprinkling water in their midst by means of bunches of vervain, I and ambassadors and heralds wore a crown of it on great occasions. Pliny tells us that the Druids, too, of Gaul and Britain held the plant in great veneration. To descend to more mundane considerations, we are told that "if the dining roome be sprinckled with water in whiche the herbe hath beene steeped the guests will be the merrier"-a receipt for good-fellowship as old as Dioscorides.

The vervain throughout the Middle Ages maintained its reputation as a medicinal herb. Gerard,

Lift your boughs of vervain blue,
Dipt in cold September dew;
And dash the moisture, chaste and clear,
O'er the ground, and through the air;
Now the place is purged and pure."

MASON.

for instance, reports it as "of singular force against the Tertian and Quartan Feuers," but cautions his readers to "observe mother Bombies rule, to take iust so many knots or sprigs and no more, lest it fall out that it do you no good, if you catch no harm." The "just so many" that Mrs. Bombey stipulated for being, of course, either three or four, according to the nature and recurrence of the fever. By Gerard's time, however, the belief in the supernatural and magical powers of the vervain had worn rather thin, as he goes on to say, "Many odde olde wives fables are written of vervaine tending to witchcraft and sorcerie, which you may read elsewhere, for I am not willing to trouble your eares with reporting such trifles as honest eares abhore to heare." Few plants were held, for centuries, in greater medicinal reputation than the vervain, while certainly few have been so completely disregarded in these later days. Its use in jaundice, gout, ague, the healing of wounds, ophthalmia, toothache, ulceration of the throat, and many other ailments, was warmly extolled; hence one old name for the plant was the simpler's joy, the demand for the plant in medicine making the gathering of it by the herbalist a highly lucrative business. Those who would seek it may find it readily enough in many localities in Englandthough it is a rare plant in Ireland and Scotland -its favourite spot being the roadside.

CHAPTER V

Woodruff—La Reine des Bois—Ordinarily very little sentiment in the old plant-names—Goosegrass—Lavender—Strewing herbs—Sweet marjoram—The "Dyetery of Helthe" of Boorde—Bistort—Meadow-rue—The globe-flower—Goat's-beard—The salsify—Nap-at-noon—The speedwells—The sky-blue flowers of the borage—The herb of gladness—"The Art of Longevity"—Agrimony—Philanthropos—The bindweed of our hedges—Sea convolvulus—The much-encroaching yet welcome little field convolvulus—The yet more encroaching but less welcome buckwheat—The "Theatrum Botanicum" of Parkinson.

NE of the most graceful of wild flowers is the woodruff. It is also one of the easiest to cultivate, as it spreads with great freedom and speedily covers a large space with its offshoots. It will grow, too, beneath the shade of other things. Its charm of form and the delicate purity of its clustering cross-like blossoms of spotless white are points that at once attract. It is a plant of the woods, and flowers freely in the early Summer, though even well into August it may be found in blossom. Though each flower is very

8

113

small, the blossoms in the aggregate form a conspicuous termination to the slender stems. The leaves are given off in rings at intervals on the stalks, and this radiate effect is a very charming feature. On first gathering the plant the odour is but slight; but if we suspend a bunch of it in a room it will, as it dries, give forth a most fragrant and powerful smell. Tusser, we see, places it in his list of plants that the good housewife will seek "to still in Sommer," amongst the other herbs commended being "betanie, endive, eiebright, saxefrage, sorell, and suckerie." Woodruff is recommended by him "for sweete waters and cakes," while in Germany it is still a principal ingredient in the favourite beverage Maitrank. In the Fatherland the plant is the Waldmeister, or lord of the wood-a name that certainly seems to overweight with dignity a plant so delicate and unassuming. The French Reine des bois, though almost equally high-sounding, we may accept as a testimony to its charm. An older German name is Herzfreydt-heart's joy; and Gerard tells us that the plant "is put into wine to make a man merry and to be good for the heart and liver." 2

[&]quot;'Fiue Hundred Pointes of Good Husbandrie," by Thomas Tusser, originally published in 1557, but running through many subsequent editions.

² We must warn our readers that ordinarily there is very

Much difference of opinion has been elicited as to the meaning of the name woodruff: it has been spelt in a great variety of ways, as, for example, woodrowe, woodrowel, and, to quote the old rhyme—

"Double U, double O, double D, E, R, O, double U, double F, E."

In Anglo-Saxon plant lists it is the wudu-rofe, or wudu-reeve. The reeve, in Saxon days, was one in authority: our modern sheriff was in these earlier times the shire-reeve, and this brings the Saxon name woodreeve into line with the German Waldmeister.² Row in Anglo-Saxon signified sweet,

little sentiment in the old plant-names: heart's-joy, heart's-ease, forget-me-not, and such-like, did not originally carry the sentimental and poetic glamour that later folk would read into them. The reference, for instance, to the heart in these early names veils no allusion to the smart inflicted by the dart of Cupid, but to those much more serious cardiac troubles that the skill of the herbalist and leech of mediæval days or the modern specialist may perchance relieve, to the joy and ease of the patient, while the name forget-me-not was originally assigned to the ground-pine from its nauseous taste—a name borne for centuries, to be found in Lyte, Gerard, Parkinson, and other early authorities, and only lately transferred to the pretty little blue flower of our streams that now bears it, in consequence of a sentimental legend that has got tacked on to it.

² While the woodruff is a particularly retiring plant, and entirely exempt from all ambition of lordship over its fellows, it closely resembles the goosegrass, a plant botanically allied

so that we are thrown upon another track: the plant botanically is the Asperula odorata, and its early colloquial name may signify the odorous woodland plant, the wood-sweet. On the other hand, the plants of the genus have a certain roughness to the touch, hence asperula; and the Anglo-Saxon for rough is ruh, thence another theory is that the plant is the wood-rough. Others, again, remind us that the radiating leaves are strongly suggestive of the ruff that has from time to time appeared as an article of dress, but we may take it that such a derivation is of too modern a date; while yet others take the French roue, a wheel, as a base, and find justification for the idea in the spoke-like rings of leaves. The diminutive form is rouelle, a little wheel or rowel, and we are invited to see in the leaf arrangement a suggestion of the radiate star-like spurs of the olden days. Turner, for instance, writing in 1548, calls our plant the woodrowel, and says that its leaves "represent certaine rowelles of spurres."

The woodruff is found in woods and copses in

to it. This latter in olden days was the heriffe, from the Anglo-Saxon words haga, a hedge, and reafe, a taxgatherer—a name given to it from its grasping powers, hooking into anything by which it could sustain itself and rambling far and wide over the hedges and undergrowth. It may well be that in those less observant days the aggressive demeanour of the one plant caused the other that resembled it to be credited with an ambition quite foreign to its nature.



BLACKBERRY

To face page 116.



many places in Britain, as well as throughout Europe, Northern and Western Asia. Apart from its infusion in water or wine as an agreeable flavouring, the housewife may place it in the linen chest, like lavender, as a perfume, and also, kept amongst clothes, as a preservative from the ravages of insects.

Though the lavender has absolutely no claim to a place in our British Flora, being really a plant of Southern Europe, we are not so brain-bound as to exclude it from our rock-garden. It seems to have first found its way into our herb-gardens about the year 1568, and was originally held in high esteem, not only from its fragrance, but from its healing virtues. It will be recalled that in Shenstone's admirable description of the rural home in the herb plot—

"Where no vain flower disclosed a gaudy streak, But herbs for use, and physic, not a few, Of gray renown, within those borders grew"—

[&]quot;It is hot and dry, of thin substance, consisting of many airy and spirituall parts, so helps cold diseases of the head. The flowers picked from the knob, mixed with cinnamon, nutmegs and cloves powdered and drunk in the distilled water thereof helpeth panting and passions of the heart. The compound spirit clears the sight of aged phlematick or sanguine persons, good against dulness of wit and want of memory from a cold and moist distemper. It heals convulsions in children, being well allayed with waters of cowslips, black cherries, and lilly convally; with rue water it is thought to heal children bewitcht."—Lovell, 1665.

besides the "pun-provoking thyme" the euphrasy, the "marjoram sweet" and other plants, the lavender found a welcome, the herb—

"Whose spikes of azure bloom
Shall be erewhile in arid bundles bound,
To lurk amidst the labours of her loom,
And crown her kerchiefs clean with mickle rare
perfume."

It also occurs in various old lists as a "strowing herb," with "bassel, baulme, isop, tanzie, margrom" and other fragrant plants. The plant is botanically the Lavandula spica, the generic name being from the Latin lavare, to wash, from the plant being used in classic times as an unguent to anoint the body after the bath. The lavender grows very freely from cuttings, and its masses of pale grey foliage form a very welcome contrast to the vegetation, while its fragrance is an added charm. "It is of a strong smell, and yet pleasant enough to such as doe loue strong savours," writes more guardedly one of the old herbalists. It thrives best on a somewhat light and poor soil.

The "marjoram sweet" finds a welcome place in our garden, as its general colour effect is of a brownish crimson. It may not unfrequently be found on dry hillsides and bordering the roads, and more especially in a chalk or limestone district, and we must, as far as may be, reproduce this state of things in our rock-garden. The ground must be well drained, and we have grown it well in light sand. It is very fragrant, and is collected in large quantities for the sake of the aromatic oil that it yields on distillation: it is often cultivated too in gardens as a sweet herb. To harvest herbs properly they should be gathered on a fine dry day just as they are coming well into bloom. They must then be tied up in small bunches and hung in the shade to dry. When thoroughly dried they may either be wrapped up in paper and stowed away in some air-tight canister, or rubbed to a powder and then corked up in bottles duly labelled. They should then keep for almost any time.

Like most other things, the marjoram was credited with considerable medicinal virtue. "Drunk in wine it helpeth against all mortal poisons," dropped into the ears the oil was effectual against the bitings of venomous beasts, and the plant strewn on the ground drove away serpents. Gerard, we see, strongly commends a potion of it "unto such as cannot brooke their meate." In Lovell, amongst the various ailments of suffering humanity we find stupidity—marjoram, together with box,

[&]quot;It is a comodyous and a pleasaunt thynge to a mansyon to have an orcherd of soundry fruytes, but it is more comodiouse to have a fayre gardain repleted wyth herbes of aromatyck and redolent sauours."—Boorde, "Dyetery of Helthe," 1542.

fennel, melilot, thistle, sage, vine and several other plants being highly commended for this distressing complaint.

The meaning of the name appears to be completely lost, unless indeed we are prepared to accept the statement of an old writer that "it took its name of a certaine Kinges wayting Boy, whiche in fetching his Lord certaine oyntments at the Apothecaries, by chaunce whilest he bare them had a fall, and so by the spilling of euerie eche of them (meeting together by their flowing and by such confusion) a meruellous sweete smell was made, which as they say this marioram representeth."

The bistort, the central figure on Plate XXVII., is a gracefully growing and picturesque plant that we are glad to welcome, as its spikes of pink blossom standing boldly erect come well. It was held "a singular remedy to wash any place bitten or stung by any venemous creature, as Spiders, Toades, Adders and the like." ² It derives its name, bistort—the twice-twisted—from its convoluted roots: hence it was called adderwort, snake-weed, twice-writhen, and serpentaria by the old herbalists. These roots are highly astringent and possess real medical value, though they are now superseded by other material. They creep very freely, and by their means the plant rapidly spreads and takes possession of perhaps

¹ Maplet, "A Greene Forest," 1567.

² Parkinson, "Theatrum Botanicum," 1640.

more than its share of space. It thrives best where the ground is fairly moist. We have ordinarily planted it amongst ferns, the long spikes of flower rising amidst the fronds and giving a very pleasant contrast, while the degree of humidity that suits the one is equally grateful to the other. The leaves form a wholesome vegetable. The bistort is distinctly a local plant, and is commoner in the north of England than in the south. One finds it on the mountain meadows of Switzerland in glorious profusion.

Another interesting plant to cultivate is the meadow-rue-Thalictrum flavum. It derives its generic title from the Greek verb, signifying to be flourishing, and it is a very well-earned designation, for when once established the difficulty is not so much to preserve it as to insist that it shall give its neighbours a fair chance of being preserved too: it is a perennial. The plant attains to a height of some three feet, and, alike in its richly cut foliage and its masses of yellow blossom, is a welcome addition to one's garden. Though a wild plant, it is not at all commonly distributed. It should be searched for in low-lying moist meadow-land, osierbeds, and such-like aqueous spots, hence another name for it is the fen-rue. It was an old belief that if hung up in a room or tied round the neck of any person the plant preserved them from all danger; but this statement we merely pass on

without guarantee, as we have not ourselves yet tested it. Its heads of yellow flowers naturally suggested to our forefathers that the plant was of efficacy in the treatment of jaundice.

The handsome globe-flower must not be overlooked. It closely resembles a double buttercup, the ten or more broad sepals all turning inward and forming the globe that gives it its popular name. Hence, too, it has been called the cabbage daisy, though as daisies are white and this is yellow the name is not quite a happy one. Other popular names for it are the troll-flower, globe crowfoot, and, in Scotland it is the locken gowan. Botanically it is the Trollius europeus. Some would tell us that Trollius, or troll-flower, are equivalent in meaning to globe-flower, being from the old German word trol, a sphere or ball, while others see in it a reference to the acrid and poisonous nature of the plant, troll in the northern languages of Europe being a malignant supernatural being; and this brings us in sight of a clue to another of its Scottish names-the witches gowan. The globe-flower grows from one to two feet high, and its foliage is of buttercup type, the leaves being cut up into five principal segments, and these in turn divided. It is a decidedly ornamental plant, flower and foliage being alike attractive. It should be sought for in moist woods and

¹ Those who care to visit the florist will find many excellent globe-flowers in cultivation, varying from pale straw-colour to



DEWBERRY.



mountain pastures in the north of England and Ireland, in Wales and in Scotland. Gerard, we see, affirms that "it groweth in most places of Yorkshire and Lancashire, and other bordering shires of the north countrey, almost in euery medow, but not found wilde in these Southerly or Westerly parts of England that I could ever understand of." Our plants are growing within a few miles of the Metropolis, but they are, of course, importations, vigorously as they are thriving.

As our globe-flower reminds us of pleasant rambles in North Wales, so our goat's-beard recalls experiences no less pleasant amongst the sand-dunes of Northern France, where we collected the seeds that stocked our rock-garden. It is a common plant in England, and assuredly one need not travel outside our own borders to find it, but the whole point of such a garden as we seek to commend is that the plants, common as they may be, should have a twofold interest—that inherent in themselves, and that accruing from the associations that have clustered around them. These associations may sometimes deal with the folk-lore that has become attached to them, or they may recall the kindly friends who sent them to us, or bring to our minds our own enjoyable experiences in the localities that contributed to our store. In the present case the sight deep orange. Desirable varieties to obtain are the T. Gibsoni, T. giganteus, T. altaicus, T. napellifolius, and T. americanus.

of our goat's-beard recalls a delightful holiday in and around Ambleteuse, so that we see not the quaint goat's-beard alone but live anew in the glorious sunshine, shared with the pleasantest of companions, return again the kindly greetings of the villagers, wander afresh by the margin of the sea, or along the highways and byways of that pleasant land. The idea of needing in such surroundings to whet one's appetite, bodily or mental, seems entirely superfluous, but we see in one of our old authors that when such necessity arises some score of plants, including the barberry, broom, elder, cowslip, samphire, mint, and woodruff, may be tried, and amongst these we find the goat's-beard commended.1 The flower-head of the goat's-beard is, in colour and size, much like that of the dandelion. Below the mass of florets is a ring of bracts, and these often extend far beyond the central yellow mass, standing boldly out in star-like fashion. We may see this quaint feature very clearly in the purple flower—the salsify—an allied species, on Plate XIII. The goat'sbeard is the Tragopogon pratense of botanical nomenclature. The generic name is composed of two Greek words, and is identical in meaning with its popular English name, and suggested by the fluffy character and grey colour of the globular head of

[&]quot;The roots boiled in water till tender, buttered and eaten, they help the appetite, and strengthen those that have been sick of chronicall diseases."—LOVELL, 1665.

fruit that succeeds the flowers. This is very similar to the globe that is so familiar to all in the dandelion, in each case the central seeds having attached to them these feather-like hairs by which they are dispersed for miles over the country-side. The flowers have a very curious habit of closing up by midday, hence the plant has received the rustic name of jack-go-to-bed-at-noon. In rainy weather it declines to open at all.

The purple flower on Plate XIII. we have seen is the salsify, the Tragopogon porrifolius. The generic name we have met with in the preceding paragraph, the specific is from the Latin word porrum, a leek, the leaves of the salsify being rather suggestive of those of the leek. The plant stands nearly a yard high, and its blossoms have the same curious property of early closing and sensitiveness to dull weather as those of its relative, the goat's-beard. The plant is a very doubtful native, though the particular plant from which our illustration was taken was found under entirely wild conditions in a field near Scarborough, being sent to us thence by one of the kindliest of nature-lovers, themselves a most kindly race. As it throws up several flower-crowned stems from its tap-root it is a striking-looking plant and one well deserving a place in our garden. The

COWLEY,

The goat's-beard, which each morn abroad does peep, But shuts its flowers at noon, and goes to sleep."

flowers are so sensitive to sunlight that they close almost directly one brings them indoors, but when we desired to sketch them for our illustration we stole a march upon them by standing them in water on a table in brilliant sunshine, when under its welcome influence they temporarily forgot their severance from the plant, reopened, and gave us the opportunity we needed. An old name for it is nap-at-noon. Its more familiar name, salsify, is a corruption from the herbalist's solsequium, because its flowers, like those of the sunflower were reputed to do, followed the sun. Those who have grown a patch of sunflowers will speedily have detected that the great flowers are by no means unanimous in the direction to which they turn, and the flower-heads of the salsify are no more of one mind than they.

The salsify is really a plant of Southern Europe. It has long been cultivated in England for culinary purposes, but has now in various localities, in moist meadow-lands, and especially in the south of England, established itself as a wildling and gained recognition as a member of our Flora. The long, tapering roots have a sweet taste, and were formerly in request in England, as they still are on the Continent as a substitute for parsnips or carrots, and the young stems are cut and eaten as one would eat asparagus. The salsify's companion on the Plate is the ox-eye, or moon-daisy that we see in

such abundance in the meadows before haymaking, and on the railway embankments, and which we have already referred to.

The Veronica spicata, one of our rarer British speedwells, is the subject of Plate XII. It may be sought for, which is not at all the same thing as finding it, in limestone districts, and in dry pasturage on the chalk, but it is exceedingly local, and its discovery is a decided "find." Cambridgeshire, Norfolk, and Suffolk appear to yield it more freely than other parts of England. The arrangement of the flowers in a terminal spike will at once identify it amongst its fifteen fellow speedwells found on British soil. Almost all the species should be acceptable in the wild garden; I many of them are trailing, and quickly cover the rock-work or hedgebank with a handsome tapestry, while the erect species form very pleasing masses, and as the flowers in the various species vary from pale to deep blue, they form very welcome spots of colour amongst other herbage. While all are of interest those which best repay us for cultivation are two of the commonest, the brooklime and the germander speedwell. The former we must plant in the

Those who care to supplement the wild species by a visit to the florist will find the following plants very serviceable: Veronica amethystina, V. aphylla, V. corymbosa, V. latifolia, V. gentianoides, V. taurica, and V. sibirica. All have flowers of varying tints of blue.

dampest place we can compass; its flowers are of a particularly clear blue. The latter needs no special consideration; it forms large tufts of slender stems and foliage in our rock-garden, and flowers freely, so freely, indeed, that at a little distance all that catches the eye is a mass of azure blue. It is sometimes called bird's-eye. The buxbaum speedwell is a very handsome trailer; its blossoms are large and of a bright but light blue, the lower lip being almost white. It is very hardy, and will flower almost throughout the year. It is a foreigner, having only been observed here since the year 1826, but it is spreading rapidly throughout the country. It probably came over with clover or other agricultural seeds.

Another very welcome blue flower that we must by no means omit is the borage. The plant is so thickly covered with short stiff hairs that they give it a greyish appearance, while the flowers are large, acutely fine-pointed, and of a beautiful sky-blue, the dark purple anthers rising in a cone in the centre. The borage is really indigenous in such parts of Europe, Asia, and Africa as fringe the eastern portion of the Mediterranean, and was probably introduced into England by the monkish herbalists. However that may be, it has now thoroughly established itself, and may from time to time be found on rubbish-heaps and waste ground.

^{* &}quot;The floures be of a gallant blew colour."—GERARD.



MONK'S HOOD

To face page 128



The plant grows from one to two feet high, its stems being stout and freely branching. Though but a biennial it propagates freely from the seeds it sheds, and so, once established, maintains its position.

The borage was held in high esteem for many centuries as a cordial, though modern investigation has decided that it is of little or no medical value. Pliny called it the euphrosinum, from a belief in its joy-yielding qualities, while in Wales it is still the llawenlys, the herb of gladness. A very venerable old testimony declared on its behalf "Ego Borago gaudia semper ago," and this has been passed on through the centuries as "I Borage bring alwaies courage." Burton, in his quaint "Anatomy of Melancholy," commends the borage as a preservative from the ills of which his volume treats, affirming it a—

"Sovereign plant to purge the veins
Of melancholy, and cheer the heart
Of those black fumes which make it smart";

while Bacon declares "it hath an excellent spirit to repress the fuliginous vapour of dusky melancholie." As all through the Middle Ages every writer on plants appropriated the ideas of every

[&]quot;The vertue's eminent; have you no Courage?
At any time revive your soul with Borage."

GAYTON, "The Art of Longevity," 1659.

other writer, we find always a striking unanimity of testimony, copying being so much easier than independent investigation, and if the patience of the reader could bear the strain we could fill pages from the various authorities in praise of the borage. As samples of the bulk we may quote from Boorde's "Dyetery of Helthe," 1542, the declaration that "Borage doth comfort the herte and doth ingender good blode, and causeth a man to be mery," and the statement of John Pechey in his "Compleat Herbal of Physical Plants," 1694, that "the distill'd Water and the Conserve of Borrage Flowers doth comfort the Heart, relieve the Faint, and cheer the Melancholy." Lovell, 1665, gives a section of his treatise to "Mirth Causing Herbs," and here again our plant finds honoured place.

An old name of the borage was the corago, from a belief in its value in affections of the heart, and we are invited by divers authorities on plant nomenclature to believe that the more modern name is a corruption of this. Others have it that the name is a Latinised version of some Oriental name that came with it on its introduction from the East, while yet others declare that the hairy nature of the leaves and stems makes the Italian word borra, the hair of a goat or flock of wool, an obvious derivation. These are not the only suggestions brought forward, but they will suffice to show that the meaning of the name is hopelessly obscure,

The leaves are still sometimes put into beverages, claret-cup and the like. A little lemon, sugar, wine, water, and a borage leaf or two swimming on the surface are the constituents of the old-fashioned drink known as "cool tankard." The leaves, too, have been boiled and eaten as a vegetable, so that the plant was cultivated not only for its medical but its domestic use. Even the domestic side in these old recipes of herb-teas, cooling drinks, and the like, is rarely entirely divorced from the medicinal, for while Buttes, in his "Table Talke," 1599, strikes a somewhat convivial note in his assertion that "borage laid in wine strengtheneth and cleareth the heart, putting merry conceits into the minde," the general tone is rather that exemplified by Venner in his "Via Recta," published in 1650, where he says that "it appeareth that the custome of macerating the fresh leaves of Borage in wine is very good, and chiefly to be frequented of students, and suche as are subject to melancholy." He declares too that "the leaves boyled and eaten in manner of a Spinach tart, are very wholesome, for they engender good humour." It is rather sad to reflect that all this mass of testimony rests on no solid substratum

² This good humour bears a different meaning in these old writers to that we now associate with the words. The old physicians ascribed much of health or disease to what they termed humours, conditions, good or evil, in the economy of the body.

of fact; that thousands of folk have imbibed decoctions of borage seeking for an exhilaration that, if it came, was vinous in its origin rather than boragic.

The agrimony, the egremoine of Chaucer and other old writers, may well occupy a corner somewhere, as its graceful vigour of growth, its terminal spikes of small yellow blossoms, and the beauty of its foliage give it full claim. It grows boldly erect to a height of some two feet or more, and is a perennial. The calyces harden as the plant matures, and become covered with hooked bristles, forming small burrs "which when they be ripe doe catch hold upon people's garments," and thus aid in the distribution of the plant. The agrimony is decidedly astringent and tonic, and is used in rustic pharmacy as a gargle for sore throats, and a tea made from the leaves is commended as a purifier of the blood. In former days the virtues ascribed to it were much more numerous, so that by the old writers it was called philanthropos, though some prosaic souls in these latter days would have us believe that a title so honourable had no such origin, and that its love for mankind was only shown in its clinging burrs as they attached themselves to the rambler who brushed against it. One remedy, or rather recipe, includes it in a mixture of pounded frogs, human blood, and other choice ingredients as a specific for internal hæmorrhage, while another authority declares that "the decoction or his pouder

dried is an excellent remedy against the oppilation of the Liver and Splene by reason of flemme, and is taken either the Herbe it selfe or else sodden among with Wine." It might after all well be that the oppilated could be advantageously philanthropolated, since, while it is easy to deride our forefathers for believing that almost every roadside plant was a specific against multitudinous ailments, we must be careful not to go to the opposite extreme and strenuously deny the possession of any healing virtues in our native Flora. Botanically our plant is the Agrimonia Eupatorium; and as agrimony is a corruption from argemone, the name given by the ancient Greek physicians to a plant supposed to cure cataract, while the second name is from Mithridates Eupator, who, according to Pliny, was a great medical authority, some people, at all events, believed pretty strenuously in the plant, the only weak point in this and many other such cases is as to whether the plant we now call agrimony is identical with the plant so called centuries ago, botanical description and illustration being often inadequate even in much later days to the identification of any given plant.

Any one who has seen in the Summer or early Autumn one of our grand old country hedges one mass of the white blossoms of the bindweed, or a strip of waste ground starred over with the delicate pink flowers of its little relative the field con-

volvulus, cannot have failed to have been struck with their charm, and will, we imagine, desire to introduce them within their own domain. We have many yards of it, and there is scarcely anything more beautiful that one grows than the long festoons of it, laden with countless blossoms expanded in all their purity of tint in the early morning. Though ordinarily having these beautiful campanulate flowers of spotless white, it may at times be found yielding blossoms of a delicate pink. Of these we have had specimens sent to us from Sandown, Cranbrook, and elsewhere by kindly fellow plant-lovers. As each flower lasts but a day the French name for the plant, the belle d'un jour, is very expressive. In America it is the morning glory.

The bindweed spreads freely, and admirably serves to ramble over any bit of rough fencing, but both species require watching, or they will take possession of more ground than we may be willing to spare. In the names bindweed and convolvulus we have the hint that both the plants are quite ready in their own interest to lay hands on any neighbour and flourish at its expense. The bindweed may sometimes be seen running riot over the gooseberry and currant bushes in some old neglected garden, and under such conditions

¹ It has several names in France: the manchettes de la Vierge, our Lady's sleeves, grand liseron, and others.



TUBEROUS COMFREY and PURPLE COMFREY.



becomes a mere nuisance. As the roots creep very extensively they render the plant, where once established, difficult to eradicate. These roots contain very strong medical properties, but the results obtained by their use in rustic medicine are far too violent and uncertain to make it at all advisable to have anything to do with them.

Botanically the bindweed is the Calystegia sepium. The generic name, Greek in its origin, refers to the quaint enwrapping of the calyx, and its appropriateness will be recognised when we note how the five sepals are almost entirely hidden from sight by the two large heart-shaped bracts that enclose them. Hence one of the old names of the plant is the hooded bindweed. The specific name refers to the habitat—the hedges. Other old popular names are the bell-bind, withy-bind, hedge-bell, and campanelle. In one part of our garden we have the bindweed and the hop entwining together, and one may there readily note the difference of direction in the embracing stems, the former always twining upwards from left to right,

¹ Maplet, writing in 1567, declines to see any good at all in the plant. He declares that "Bindeweede, of some Withweede, is an herb verie noysome and hurtfull to the other fruits of the Gardaine. It hindreth their growth and troubleth them with the inwrapping and circumplication about ye other their stem or stalk." Another old writer equally emphatically denounces it as "an vnprofitable weed, and hurtfull vnto each thing that groweth next vnto it."

and the latter always in the reverse direction. The gardeners have developed many beautiful varieties: one of these we figure in Plate XIV. It rambles gloriously for yards, and in one corner of our garden we have this and the white-flowered bindweed growing together, and each in consequence adding to the charm of the other.

The sea convolvulus—Convolvulus Soldanella—is another beautiful species, with numerous large rose-coloured flowers and rounded fleshy leaves, but this, though common enough as a maritime plant on the sand-dunes, apparently declines all cultural blandishments unless the conditions absolutely reproduce those of nature, and this problem at fifty miles from the coast is entirely hopeless. We have tried again and again, but only to fail.

The small convolvulus—Convolvulus arvensis—thrives on light soils and has a perennial root which penetrates so deeply that it is next to impossible to get rid of it. One may sometimes find that it has gone down over three feet into the ground. We may say parenthetically that one scarcely realises, without actual experiment, how deeply many plants do penetrate. We had a great clump of mallow that grew rather out of bounds, and moreover each year surrounded itself with a vigorous crop of seedlings, and at last, after several ineffectual attempts to dispossess it, we determined that we would literally go radically

into the matter, the result being that one plant that we at last dug up had a root thirty-nine inches long! The stems of the field convolvulus are many and far-reaching, spreading in all directions and often prostrate on the ground, though quite prepared to ascend when opportunity offers. It is a plant that is often to be found in cornfields, and there it freely twines round the wheat or other crop. We planted at intervals some fifteen feet of an earthen slope, that was about four feet high, with the roots of this convolvulus, and in a very short time they dominated the whole thing and nothing but absolutely pulling the bank down would have got rid of them. Personally we were entirely content to see the slope a mass of beautiful pink blossoms, but it is entirely well that any one before giving the plant a welcome should know what they are committing themselves to. The convolvulus is a lover of the sun and quickly droops when brought indoors. Our mound, some five feet wide at base and tapering to a foot or so, faced north and south, and the whole of the plants faced the one way—the sunny aspect.

Lest our proceedings in deliberately planting wild things when we might have had the choicest flowers of the florist on our bank should suggest an inquiry into our sanity and subsequent litigation amongst our heirs, executors, and assigns, we may set on record that we have just found

with some satisfaction the following paragraph in the "Flora Londinensis" of William Curtis, a delightful book full of the most beautiful and lifelike illustrations, published in 1777 and following years: "Tempted by the lively appearance which I had often observed some banks to assume from being covered with the blossoms of this convolvulus I planted twelve feet of a bank, in my garden, which was about four feet in height, with roots of it," and his story ends as ours does-"they quickly covered the whole." Uncharitable people may, however, still say that this happened over a century ago, that the world should be wiser now, and that his planting forty-eight square feet with hedge trash in no way condones our planting sixty feet in like manner. "In things essential unity, in non-essentials liberty, and in all things charity."

There are certain things that we need scarcely plant, as we may feel assurance that they will in any case look in on us. The red and white archangels will certainly be of the company when once the news spreads that there is a bit of wild garden, and the pimpernel, and many others, will soon appear. In addition to this the mere bringing home from the countryside of certain things that we have desired will probably end in our unconsciously bringing others. Another plant that is fairly certain to appear is the climbing buckwheat. It is often called the black convolvulus, though

it has no botanical affinity with the *Convolvulaceæ*. It is a great climber and not without a certain charm, though it is very troublesome in the garden. Its small but very numerous seeds are very acceptable to various kinds of birds.

other things whereon to clime it riseth up but a little, and leaneth downe againe unto the ground, otherwise meeting with fit things, it will winde his long slender threddie branches about them, to the height of three or foure foote or more, perishing every yeare, and rising of the fallen seede every spring, unlesse it be continually weeded out of the garden," declares Parkinson in his "Theatrum Botanicum. The Theater of Plants," published in the year 1640.







YELLOW IRIS and CORNFLOWER.

To face page 141.

CHAPTER VI

The unexpected springing-up of plants in most unlikely places

—The botany of a London stable-yard—Distributing
agency of birds—The Adonis-flower—Our various violets

—The sweet violet as a medicinal herb—A flower
beloved of the poets—Miss North's "Recollections of
a Happy Life"—Broom—The fragrant wallflower—The
erratic spelling of our forefathers—Stone-crop—Blake's
"Compleat Gardener's Practice"—Snapdragons—Toadflaxes—Curious competition statistics—Saxifrages—
London-pride—Moisture-loving plants—Grass of Parnassus—Sarracenia—Moneywort, the reputed healer of
one hundred diseases—Various un-grasslike grasses of
popular nomenclature—Loosestrife—The cinquefoil and
its allies—Ground ivy.

THE way plants unexpectedly spring up is often very curious. We saw some little time ago a very interesting record of a botanical "find" in Whitehall, of all places. The Commissioners of Woods and Forests pulled down a house on the eastern side of the street, as the site was required for some improvements that were projected. It had no garden attached to it, the only open space being a paved stable-yard, and on the

demolition of the house the leading features were brick-rubbish, mortar, and the like. On this very unpromising site so much rosebay sprang up that a botanist procured permission to pass the hoarding and examine the various growths that were freely blossoming in this strange position. In addition to the conspicuous masses of rosebay that had first attracted his notice he found thirty-four other flowering plants, besides numerous grasses and considerable patches of bracken. The agency of birds probably brought the larger number of the seeds to Whitehall, while others would be conveyed by the wind. From a ball of clay taken from the foot of a partridge, Darwin-one of the greatest of experimentalists, and therefore one of the greatest men of science—grew eighty-two plants belonging to six different species, so that it is evident how potent a means of distribution such unconscious transport may be. Amongst the plants thus found growing wild within this quarter of a mile from Charing Cross were the charlock, hedgemustard, shepherd's purse, chickweed, pearlwort, clover, great willow-herb, spear-plume thistle, burdock, May-weed, groundsel, colt's-foot, dandelion, corn sowthistle, common sowthistle, gipsywort, ribwort, knot-grass, thyme-leaved sandwort, creeping-thistle, cat's-ear, orache, and climbing buckwheat.

Perhaps one of the happiest of these accidentals

in our own garden was the upspringing of the Adonis-flower—the Adonis autumnalis—one of the most beautiful of the many striking plants that, like the deep blue cornflower, the brilliant yellow marigold, the poppy of intensest scarlet, adorn the fields of ripening corn. We had never seen it in the district before, as it is a very local and by no means common plant. The petals are of a brilliant and deep crimson, forming a cup-like corolla, while the foliage is very finely divided and very rich in character. This rich crimson of the flower, with its darker centre, has given meaning to the alternative name of the plant-the pheasant's-eye. Gerard tells us how he saw the plant growing, to his delight, amongst the corn in the west of England, and "from thence I brought the seed and have sowen it in my garden for the beauty of the flower's sake." The Adonis-flower derives its name from the legend that tells how the favourite of the goddess Venus received a mortal wound from a wild boar and, according to classic lore, was changed into the memorial flower I that still bears

" "When the flower was shed,
A flower began to rear its purple head."

OVID

"In his blood, that on the ground lay spill'd, A purple flower sprang up."

SHAKESPEARE.

Despite two such authorities, the flower is not purple at all, but rich crimson,

his name and by its vivid crimson recalls his sanguinary fate. The flower is in France l'Adonide, in Germany die Adonis blume, in Italy the fiore d'Adono.

Several of our plant-names have classic associations. Thus the pæony is so called from Pæon, a physician, who by its means cured Pluto of a wound inflicted by Hercules. The centaury is in like manner called after the Centaur Chiron, who was famous for his knowledge of medicinal herbs, and who instructed mankind in their uses; while the yarrow, or achillea, derives the second of these names from the efficacy of the plant in the hands of Achilles in the healing of wounds.

We have in Britain some eight species, at all events, of violets, besides others, sub-species, that may serve scientists to dispute over as to their more or less good claims to full specific rank. Several of these, as the pansy or heart's-ease, the yellow mountain-violet, and the marsh-violet, we may well find a little space for, but the sweet violet — Viola odorata—is a sheer necessity. It is curious that while this latter is not uncommon in England in the woods and hedge-banks, it is a choice rarity in Scotland. When once established it extends in all directions, like the strawberry, cinquefoil, and other lowly plants, by means of the runners that it so freely throws out. Its flowers are ordinarily

dark bluish-purple, but at times reddish-purple, and not infrequently white, and, whatever their colour, they are deliciously fragrant. It is curious that these flowers seldom mature their fruit, the seed-bearing capsules being produced by minute blossoms, almost devoid of petals, which come on afterwards. The leaves are very typically cordate, heart-shaped, and with toothed margins.

Many plants of the order have strong medical properties, and the roots of our little English violets have powers so pronounced that they have been used as a substitute for, or an adulterant of, the potent Ipecacuanha, which is also one of the Violaceæ. A syrup is also made of the petals, and the flowers and leaves had a great vogue in earlier days as remedies for a great variety of ailments, but their various "vertues" have proved more or less illusory, and the chief value of the plant now is as a colouring agent and the yielding of a fragrant perfume. A conserve in the proportion of one part of the flowers to two of white sugar is used to pleasantly modify the flavour of medicines unpleasant to the taste or to render insipid and mawkish ones somewhat more agreeable to the fanciful invalid. Boorde, we see in his "Dyetery," published in the year 1542, gives a recipe for what

[&]quot; "Purpled o'er with violets."—HOMER.

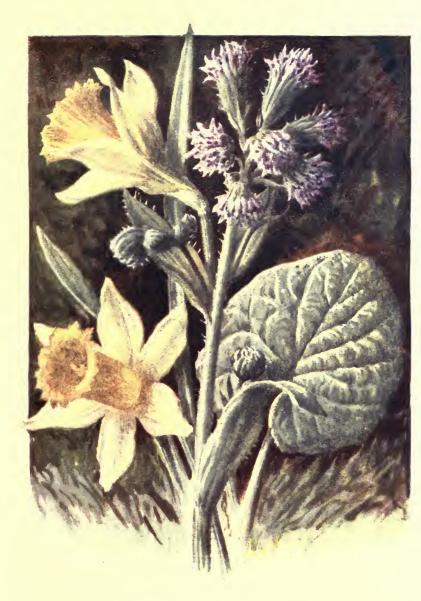
[&]quot;As purple violets scent the ground."-CLARE.

[&]quot;Violets darkly blue."—THOMSON.

he calls almond butter. "Almon butter," he tells us, "made with fyne sugar and good rose water, and eaten with the flowers of many Vyolettes is a commendable dysshe, specyallye in Lent when the vyolettes be fragrant: it reiayseth the herte, it doth comforte the brayne, and doth qualyfe the heate of the lyuer."

The violet was accepted by our forefathers as a symbol of constancy, humility, and lowly worth. Maplet, for instance, recites its "effectuous good in working" and points out that instead of its virtues making it conceited "so muche ye more it is saide to holde downe his head, and to bende and bow his bodie downward to the earth," while the poets unanimously sing its praises, as references to Barton, Carew, Clare, Spenser, Drayton, Shakespeare, Keats, Shelley, Milton, Scott, Wordsworth, and others will abundantly show, though we cannot spare space to reproduce them. If our readers, however, like to take, as an example, Shakespeare, and look through "Measure for Measure," "The Midsummer-Night's Dream," "Twelfth Night," "The Winter's Tale," "King John," "Richard II.," "Henry V.," and "Hamlet," they will, at all events, have made a start in gathering material for an interesting literary excursus on violet-appreciation.

Visitors to Switzerland in the early Summer cannot fail to have been impressed with the wealth of wild flowers on the mountain slopes, and will recall



FRAGRANT BUTTER BUR and DAFFODIL

To face page 146



amongst these the yellow violet—the *Viola lutea*—which we figure on Plate XLVII. From its associations, recalling pleasant holidays spent amongst the mountains, and from its attractiveness it has no difficulty in establishing a full claim on our regard.

Those of our readers who have visited Kew Gardens will no doubt have seen the fine collection of paintings of plants by Miss North, made by her in Brazil, India, South Africa, Japan, and other countries where beautiful and interesting flowers were to be found, and she finally sums up her "Recollections of a Happy Life" with her belief, founded on her wide experience: "No life is so charming as a country one in England, and no flowers are sweeter or more lovely than the primroses, cowslips, bluebells, and violets which grow in abundance all around me here," the "quiet home in the country" for which she sought being found at Alderley, in Gloucestershire. Here she spent the last five years of her life, and here she died.

The broom should find a welcome from its fragrance 1 and its wealth of colour, 2 since a plant in

" "Sweet is the broom flowre."

SPENSER.

"We sate us down
Amid the fragrance of the yellow broom."
Wilson.

² "The broom, Yellow and bright as bullion unalloyed." free bearing is one mass of blossom, and is conspicuous on a hillside a mile away from us. Chaucer, Shakespeare, Burns, Scott, Wordsworth, and many other Nature-lovers amongst our poets make appreciative references to the plant.

It was in Anglo-Saxon plant-lists the brom, and our ancestors, finding the long branches of the broom rather well adapted for sweeping purposes when bound up together, utilised it for this prosaic purpose, and called the manufactured article a broom in consequence. Gerard tells us that "that worthy Prince of famous memorie, Henry 8, King of England, was woont to drinke the distilled water of broome floures against surfets and diseases thereof arising." The flowers too, "being fully blowne, stamped and mixed with hog's grease, do ease the paine of the goute," while the housekeeper will gather the buds and "lay them in pickle or salt, which afterwards being washed and boyled, are used for sallads, as capers be, and be eaten with no less delight, and stir vp an appetite to meate." Broom tops, before the utilisation of the hop for the purpose, were added to beer to give it a bitter flavour, while the roasted seeds have been used in lieu of coffee berries. Though the broom, once established, grows sturdily, one may find that an extremely severe winter will suffice to destroy it. It can bear the searching sea-breezes better than most things, however, and is planted on the sanddunes to keep them, as far as possible, from shifting and encroaching inland.

"The rude stone fence with fragrant wallflowers gay,"

that gave such pleasure to Scott, will appeal no less to ourselves, and a wallflower-less rock-garden seems a thing well-nigh unimaginable. There are few more interesting hunting grounds to a plant-lover than a length of old wall, be it but a field-fence or some venerable castle, centuries old, slowly crumbling into ruin, fringed with wall-rue, decked with the waving stems of the dog-rose, bearing their wealth of dainty blossoming or the scarlet hips, giving shelter to the hoary viper's-bugloss, the quaint snapdragon, the patches of golden stone-crop, great masses of crimson valerian, and the fragrant blossom that amidst all is pre-eminently called the wallflower.

To ensure the successful growth of our plants, we may either sow the seed in crannies of our rockwork in August or in March, covering it over carefully with fine soil, or we plant in April the

" "Yon roofless tower,
Where wallflower scents the dewy air."

BURNS.
"Flowers of the solitory place

"Flowers of the solitary place Grey ruin's golden crown." seedlings that we have reared elsewhere. The seeds or seedlings must be well watered until a good growth is made, but when fairly established the plant has a most persistent vitality and thrives vigorously under drought, searching winds, and other hard conditions.

By the older writers the plant is often called the gilliflower, though this, in the erratic spelling of early days, may appear as gyllofer, gillofloure, gilofre, jereflour, jelliflower, goriofilus, and other strange variations, all yet having their origin in the Latin caryophyllum, a clove, from the rich fragrance of the flower. 2 'Gariophilus, his floure, of al other flowres is most sweete in smell," declares Maplet, 3 and though comparisons are generally regarded as being odious, we feel strongly inclined to agree with him. Venner, in his "Via Recta," tells us that "as gillow floures are in beauty and sweetnesse, so they are in vertue and wholsomnesse. They notably comfort the heart, delight the braine and

¹ Those who care to travel beyond the wildling, the wall-flower as nature made it, may obtain from the florist many excellent varieties. Amongst brilliant yellows will be found the Belvoir castle, Tom Thumb, or golden king. Ruby gem is a rich red, while harbinger has large showy flowers of orange and rusty red. Vulcan, eastern queen, and old gold are also very good.

² It will be recalled that one kind of carnation is called a clove, and from the same reason, its rich, aromatic odour.

^{3 &}quot;A Greene Forest," 1567.

senses and revive the spirits. They may be pressed in sugar, and so they are good against pestilential infections, the palsie, cramp, and such like infirmities of the braine and sinewes. The same floures infused in vinegar, and set in the Sun for certaine dayes do make a very pleasante comfortable vinegar, good to be used in time of contagious sickenesses, and very profitable at all times for such as have feeble spirits, and that are subject unto swounings." We illustrate the plant on Plate XVI.

The stone-crop, or wall-pepper, that we have already referred to as one of the attractive flowers of a rough old wall, though one of our smaller plants, is a brilliant addition to one's floral finds, since it is in its flowering season a mass of golden yellow, while at all other times it forms a beautifully verdant cushion. It is one of the easiest of plants to grow, as the smallest piece, either with a root or without it, if just dibbled into the ground, at once starts and spreads very quickly and freely. We tried it once as a bordering to a bed, and for a

[&]quot;" Of the slip it is propagated by setting it in dry banks or on stone wals, for there it delighteth most to grow, and will shift for itself wherever it be planted, for it neither careth for heat nor cold, but abideth its place alwaies."—BLAKE. The extract is from his "Compleat Gardener's Practice," published in 1664. He had great faith in himself, and tells us: "Search the World, and there's not to be found a book so good as this."

while it was charming; but it never knows when it has done enough, so that we repeatedly had to cut it back, and every little piece that by inadvertence fell outside the line quickly started afresh. One of the best places for it is along the top of an old wall, the mortar joints finding it a sufficient accommodation, but nothing to spare, and it has then perforce to keep within reasonable bounds. The leaves are small and very succulent, and so biting to the taste that we entirely realise how the plant came to be called the wall-pepper. Bryant, in his "Flora Dietetica," tells us that the leaves in some parts of Europe are often a component of salads. Botanically our little plant is the Sedum acre, the generic name referring to its close adherence to the rock or wall, from the Latin sedeo, I sit, while the specific name refers to its acrid nature. In France it is the pain d'oiseau, or bird's-bread, a by no means happy title. A much happier name for it is an old English local one-the golden moss. The common name stone-crop explains itself when we recall the favourite habitat, though the plant may also be found flourishing on dry, sandy banks. We have some ten or eleven species of the genus Sedum amongst our British wild flowers; the S. Rhodiola, or rose-root, the S. Telephium, or orpine, with its noble head of crimson flowers, and the S. rupestre, or rock stone-crop, should all find a place in our garden; the latter is the yellow-flowered plant



EDELWEISS.



we figure on Plate IX.¹ It is one of our rarer species. The white stone-crop, *S. album*, is another desirable rarity. In a florist's list before us we find fifty-three kinds of stone-crop catalogued, having flowers white, yellow, pink, blue, purple, and orange.

Pliny recommends the wall-pepper as an excellent means of curing insomnia, two precautions only being essential to its success—that it should be wrapped in something black before being put under the pillow, and that the patient should not be aware of its presence. From the days of Galen and Dioscorides it has been held in medical repute, dropsy, epilepsy, fevers, and divers other ailments being supposed to yield to its healing power, though the modern pharmacopæia knows it not.

Another excellent plant that thrives on old walls is the snapdragon—the Antirrhinum majus; we have figured it on Plate XI., in company with the celandine. It is wonderful that with so light a holdfast and so meagre an amount of nourishment the plant does so well. We have measured one of our plants and found that the central shoot—out of several that clustered around it, and were nearly as fine—was over a yard in height, or, to be precise, forty inches and a half, and this was growing from a mere

¹ The centre flower on Plate IX. is the *Geranium nodosum*, already referred to in discussing various crane's-bills, while the left-hand plant is the *Spiræa tomentosa*.

chink in the mortar between two bricks, and maintained its position throughout the year in broiling sunshine, rough gales, and anything else that was going. Galen declared that the snapdragon was useless in medicine, but, as a valuable set-off to this extraordinary state of things, the plant being hung around a man's neck-if we may credit Dioscoridespreserved one from all the evils of witchcraft, and gave the wearer a special grace of manner amongst his fellows. The snapdragon is really a native of Southern Europe, but it has been long cultivated in gardens, and has strayed thence so effectually that it has now become entirely naturalised, and takes its place, without question, in our lists of wild plants. The flowers, though ordinarily crimson, vary at times considerably in colour, through various shades of red from almost scarlet to purple, and some being a delicate lemon-yellow or pure white. We grow them by scores on our old wall by planting the young seedlings, when an inch or so in height, in crevices in the mortar, just adding, to give them a start, a little more earth. Many of our plants decline our help, being self-sown.

Our second wild member of the genus is the A. Orontium, or lesser snapdragon; it is the central figure in Plate VII. It is an annual, and may occasionally be found in dry, gravelly cornfields in the south of England, growing to a height of a foot or so and very slightly branching. Our plant

came from Seaford, in Sussex. The flowers are small, rose-coloured, and only found near the ends of the stems. A notable feature is the great length of the sepals. It is really a plant of South Europe, but as a weed of cultivation, the seeds being originally bought with corn or other things, it has found a home with us. Gerard, writing in 1633, merely states that "it grows wilde amongst corne in divers places," and accepts it as frankly as a wild plant as any other in his book, so that it has for centuries been in our midst.

A near relative of the two snapdragons, and a plant that grows equally well in one's rock-garden, or on an old bank or wall, is the common toadflax, *Linaria vulgaris*, throwing up a compact head of brilliant sulphur-yellow flowers with bright orange lips and long spurs, and that grows fairly freely in most country districts.

Some little while ago we had to adjudicate and award prizes on the best collection of wild flowers, and after we had done this we took at random the sets of twenty-four competitors and analysed their contents, and the results were very curious. We suppose, for instance, that most people would imagine that such plants as the daisy or dandelion would recur most frequently, but the only plant that occurred in every set was the bird's-foot trefoil, the hop trefoil—a good second—being in twenty-three sets out of the twenty-four, and the toadflax, red

clover, and white dead-nettle coming third, each with twenty-one as their total. The moral is that as all these plants had to be named, and as an enormous number of people entered the competition, we may take it that not a few folk know the toadflax when they see it, and to know it is to appreciate its charm.

A popular alternate name for the toadflax is butter and eggs, the lighter portion of the flower suggesting by its colour the first simile, while the deep orange lower lip is very suggestive in form and colour of the yolk of an egg. The generic name, Linaria, is derived from linum, the Latin name for the flax, the leaves of the toadflax and of the true flax being very similar in appearance. Though not used by the regular practitioner, the toadflax has long enjoyed a reputation in rustic circles, applied internally or in the form of a plaster or poultice, in the curing of various ailments.

We have in Britain seven species of toadflax, while an eighth may be included perhaps at a pinch, since it approaches us so nearly as Jersey. Those that are best worth cultivating in our rock-garden, after the commonest of them all—the one we have just been dealing with—are the pale Linaria and the

¹ As we have named the daisy and the dandelion, we may add that the former was absent from seven out of the twenty-four sets we analysed, while the latter was missing from eight.

ivy-leaved. The first is distinctly rare and very charming in its delicacy of form and colour; the flowers are white, tinged and lined with purple and pale yellow, and slightly scented. It seems to prefer a chalky soil, and if in the neighbourhood of the sea so much the better; we have had it for awhile, but failed to make it feel at home with us. ivy-leaved toadflax was originally an introduction from South Europe, but has now thoroughly settled down with us. It thrives on old walls, and those, preferably, in a rather damp situation, down which its long and slender stems trail freely. It may be readily identified by its little ivy-like leaves, dark green above, often purple beneath, and of a rather fleshy texture. The flowers are of a pale lilac colour, the palate, the part that closes the tube, being yellow. Though small it is one of the most attractive of wall-plants.

A rock-garden without a liberal sprinkling of saxifrages is scarcely thinkable. The British species are some fourteen in number, and almost all of them available, but if we like to stray further afield an enormous number of species is at once at our service. They are, as a rule, plants that form compact cushions of finely cut foliage some three or four inches high, sometimes bearing flowers that rise little if at all from the mass of leaves, and at other times borne on footstalks that project distinctly from the tuft or rosette of foliage. They frequently

grow with great freedom, quickly covering large patches of rock, and veiling all its structure beneath a soft padding of verdure, so that if one has successfully stored one's garden with divers kinds of saxifrage the day is not far distant when one has to curb their aggressions and relegate somewhat of their exuberant energy to the rubbish-heap. They are ordinarily very freely flowering plants, so that in their flowering season the foliage becomes almost invisible beneath the wealth of blossom. The greater number of the species have their blossoms white or of various tints of yellow from a pale sulphur to a strong, deep colour. In a florist's catalogue before us we see that one hundred and sixty-one species of saxifrage are set forth. some of these cultivated varieties the foliage is of a delicate silvery-grey.

Though we have described the saxifrages as being chiefly white or yellow, one of our British species, the *S. oppositifolia*, has its blossoms purple; these are large and ordinarily very numerous, so that it is an excellent plant to try and introduce into one's garden. The whole plant seldom rises more than an inch from its rocky bed, but, loving as it does, the pure mountain air, it is scarcely a plant that under other circumstances we can hope to successfully and permanently rear, as it presently dies away under such conditions as we can only give it. Its true home is amidst Alpine



SOLDANELLA and CYCLAMEN NARCISSUS.

To face page 158.



surroundings. It is common, however, in Scotland and in Northern England at high elevations, and on the Snowdon range and other Welsh mountains, and it is in precisely such localities that all our British saxifrages best prosper. The meadow saxifrage—S. granulata—is, however, abundant in many parts of England, and is an easy and satisfactory plant to cultivate.

We have grown very freely the kidney-shaped saxifrage. It is a plant of the mountains of South Ireland, but specimens sent to us have flourished well within a few miles of the metropolis. The leaves are reniform and toothed, and of a somewhat dull green, while its flowers are inconspicuous, and as it grows somewhat rampantly, repression rather than encouragement has been its fate at our hands of late years. The best known of the saxifrages is, undoubtedly, the one popularly called the Londonpride, a native again of Ireland, but so thoroughly domesticated in cottage gardens almost everywhere that one has no difficulty in getting a slip to start with, and its exuberant energy of growth will soon supply us with as much as we want, and, perchance, even a little more. Like the stone-crop and some few other standard favourites, it will more or less flourish in smoke-laden air, so that one finds it well content to adorn the scanty plot or window-box of the artisan immured in a far-reaching environment of bricks and mortar, yet anxious to rear and tend

some little patch of greenery as a reminder that outside these squalid surroundings lie green fields, and country lanes, and the singing of birds, a pure untempered sunlight, a sky of cloudless blue. The idea naturally suggests itself that its name of London-pride bears allusion to the willingness of the plant to share the hardness of metroplitan surroundings—hence the pride felt in it by the metropolitans themselves; but the real truth is that its proper name should be London's pride, after a famous gardener, who first brought it into notice something like a century ago.¹ In its native country it is called St. Patrick's cabbage.

For the saxifrages and many other such rock plants the best soil may be compounded of about three parts of good loam and two parts of fine lime rubbish, the sort of thing one gets on pulling down an old wall, and if when the gardener is tidying up the garden

The Timothy grass, so called from having been introduced from abroad to our agriculturists by one Timothy Hudson, affords us another good example of this class of name: a title deriving its significance as being commemorative of the introducer of the plant that bears it. The cudbear, in like manner, derives its name from a Dr. Cuthbert Gordon, who first found out its value as a dyeing plant. These honorary names are more especially found, not in popular but in botanical nomenclature. As examples we may instance the *Begonia*, named after the French botanist Begon; the *Lobelia*, after Lobel; the *Fuchsia*, after Fuchs; the *Dahlia*, after Dahl, a Swedish man of science; and the *Magnolia*, after Professor Magnol.

paths a bit he sifts his sweepings and adds some of these to his mixture he will get about the best preparation going for his Alpines and such-like rock plants.

The saxifrages are especially plants of the mountain regions, and if we go in search of them outside the limits of the British Isles a great choice is open to us. Amongst those that we have cultivated we have the S. Rhei, a charming pink-flowered species, figured on Plate XLIII., and, companioning it on the same Plate, the delicate little S. Cymbalaria. Every plant-lover knows and appreciates the ivyleaved toadflax—the Linaria Cymbalaria—that festoons our old walls, and will recognise the similarity of form in the foliage of these two plants. The following Plate, XLIV., brings before us two other members of the genus, the S. Wallacei and the S. Tombeanensis. A great charm of all these plants is the way they form dense tufts or cushions of foliage, from whence rise the very numerous flower-bearing stems. On Plate XLIX. we have another charming little species, the S. aizoides, the yellow mountain saxifrage. is abundant in the mountains north of England and in Scotland. It grows to a height of some seven inches, and we are bound to confess that our attempts to cultivate it in a Surrey lowland have been attended with but very poor success.

On Plate XVIII. we find figured the golden

saxifrage-Chrysosplenium alternifolium-a plant to be found on boggy ground fairly commonly in Scotland and much more rarely in England. The golden saxifrages—we have two of them in Britain—are closely allied botanically to the other saxifrages, though one or two differences in structure suffice to place them in a separate genus. The second golden saxifrage, C. oppositifolium, is very similar to the plant we illustrate, and it is a plant of more frequent occurrence. The distinction that at once enables us to discriminate between them is conveyed in their specific titles, the alternateleaved and the opposite-leaved: in the plant we figure, the leaves being arranged singly on the stem, while in the other they are always in pairs. The generic name, Greek in its construction, was bestowed on the plants by Linneus, and signifies the golden plant that is a medicine for the spleen. Gerard, we see, says that "the vertues of the golden Saxifrage are yet vnto vs vnknowne, notwithstanding I am of this minde that it is a singular wound herbe, equall with Sanicle." Why he should be "of this minde" he gives us no inkling of. It would appear to be what schoolboys call a "shot," not even rising to the dignity of a happy guess.

The two golden saxifrages are each great lovers of moist ground, and those who would cultivate them must give good heed to this or they will find them quickly perishing. We have had both, and lost both, from want of a sufficient realisation of their insistence on abundant moisture. always groweth," quoth Parkinson, "in moist places by Well sides, or other standing and sometimes running waters, and sometimes also in moorish grounds. It flowreth in May, but abideth greene all the rest of the yeare, and perisheth not. It is called Saxifraga aurea of most writers, from the forme of the leaves and colour of the floures, scarce anyone well knowing whereunto better to referre it. Tabermontanus calleth it chrysosplenium." ¹ This passage from Parkinson's "Theatrum Botanicum," 1640, is interesting, showing as it does that either one of the species being so much rarer he was not conscious of it, or that the two species being so alike he failed to recognise the difference, and therefore writes all through in the singular number.

The grass of Parnassus—Parnassia palustris—is another of the bog-loving plants that specially has its home on the mountains and moorlands, and is therefore chiefly found in the northern half of Britain. Its sturdy growth and large white flowers give it great distinction. We have had it for some

¹ Linneus, the father of modern scientific nomenclature, did not necessarily destroy the work of his predecessors. Tabernœmontanus, in his "Icones Plantarum," published at Frankfort in 1590, calls the plant Chrysosplenium, and Linneus, in his "Species Plantarum," published at Stockholm in 1762, confirms and retains the name.

time successfully under cultivation, but only by ceaselessly giving it the aqueous conditions under which alone it will prosper, and even then it appears to presently miss the pure ozone of the wind-swept mountain slopes, and succumbs in spite of our efforts to make it believe that a suburban garden is practically the same thing as a Yorkshire moorland or a spur of Ben Nevis. In our rockgarden it finds its home with the royal ferns, forgetme-nots, yellow iris, Impatiens fulva, and such-like lovers of abundant moisture. The plant is hopelessly misnamed; it has no botanical association with the grasses, no special connection with Parnassus; to call it Fungus of Filey would be an equally appropriate alternative title. Amongst our moistureloving plants we reared for some time several plants of Sarracenia purpurea, a bog-plant that a friend brought us over from Canada, but presumably our English winter was too uncertain and changeable for its well-being. At all events, to our great regret, it presently tired of us, for it was an interesting plant to possess.

Many plants commend themselves to us from their utility as creepers or climbers, the first rambling over the ground or lower rock-work, the second ascending tree-trunks or other available means of support. The two convolvuluses that we have already dealt with are admirable representatives of these two sections, but there are



CAMPANULA PUSILLA, BISTORT, and ONONIS FRUTICOSA.

To face page 164.



many others no less available, no less acceptable. As we have been dealing with moisture-loving plants, we may commence our consideration of various creeping plants with the moneywort, as it may well companion these.

As we wander by the banks of some stream we may find from time to time a rich tapestry of the vivid green of the foliage of the moneywort, liberally besprinkled with its golden star-like blossoms. The prostrate stems travel in the soft, moist earth some two feet or more, and, as they throw out roots very freely at intervals along their under surfaces, and branch equally freely, they take a firm hold of the ground and quickly cover a large area. The difficulty in the garden is not so much cultivation but repression, the keeping of its exuberance within due bounds, as a piece of stem, two or three inches long, deposited on the damp ground will quickly throw out roots and start an independent existence. The leaves are almost circular and in pairs, hence one popular name for the plant is the herb twopence. The perhaps better-known name we have first used carries with it the same suggestion of resemblance to money. "We in English," says Parkinson, "call it Herbe Two Pence or twopenny grass,"

¹ We have already seen in the case of the grass of Parnassus how a plant of quite different nature may yet be called a grass in the popular nomenclature of mediæval and yet earlier days. Other examples are the glasswort, called

but more usually Moneywort." It is botanically the *Lysimachia Nummularia*, the specific half of its title again reverting to this suggestion of money. From its trailing habit it is also sometimes known as creeping Jenny.

The moneywort is a plant that bears removal from its sweet rural surroundings to the murk of town better than most things, and many a windowsill, amidst very grey and depressing surroundings, is brightened by its long trails of living verdure and golden blossoming, while its name Lysimachia, the restrainer of strife, may be taken as of most happy omen, for the men or women who retain a love of Nature in their hearts are scarcely likely to be the bullies and brawlers of their court or alley. As Lysimachia was a plant-name bestowed by Dioscorides nearly two thousand years before our readers were born, its identification with the moneywort, and other plants of the genus to which it belongs, may be regarded as at least doubtful; but it is certain that this, or possibly some entirely different plant, was held in great repute in those far-off days as a peace-bringer and healer of bodily and mental suffering. Hence, too, in the mediæval by our forefathers the crab-grass; the vervain, or pigeon's grass; the plantain, or rib-grass; the forget-me-not, or scorpiongrass; the cinquefoil, or five-finger grass; the hemp, or gallows-grass; the rue-leaved saxifrage, or whitlow grass. These by no means use up our possibilities of reference. Our list is intended to be illustrative, not exhaustive.

herbals it was called serpentaria, since men in peril of venomous creatures wore it for safety: and centum-morbia, for it was held to heal one hundred diseases.

We have in Britain four members of the genusthe present species, the common yellow loosestrife, the tufted loosestrife, and the wood loosestrife-and all will well repay cultivation. The first three are lovers of moist situations, while the last is a little plant to be found trailing in the woods and looking very like a yellow pimpernel. The common yellow loosestrife grows by the sides of our streams to a height of some three feet, the stem terminating in a noble bunch of large yellow flowers. We figure, in Plate XVII., an interesting variant of this, the spotted loosestrife; the lobes of the somewhat larger and more saucer-shaped corolla are edged with minute glandular hairs, the sepals too are narrower than in the normal form. It is found more especially, and in association with the typeform in the north of England and the south of Scotland, though it is always a rarity. It is very similar in general appearance to the common form, and requires much the same treatment, though we have seen it flourishing and bearing abundant blossom some distance from the water's edge. While the L. vulgaris does best in the open sunshine, the L. punctata may be sought in shady places under trees.

The cinquefoil is a charming plant for the wild garden. Its flowers are as large and as golden as any buttercup, with a refinement of form and silkiness of texture that those popular favourites might envy. The leaf of the cinquefoil—hence the name of the plant—is composed of five radiating leaflets, and is like a very diminutive horse-chestnut leaf. The plant is a notable trailer, and roots as it runs, so that it quickly covers a large surface of ground, and may possibly prove a little too rampant for the peace and well-doing of other plants, unless every now and then thinned out a bit. We have employed it as a bordering to a flower-bed, letting it run freely along, but suppressing any lateral developments that would tend to stray over the bed or path, the result being a charming wealth of glowing blossoms and delicate foliage. An alternative name for it is the five-leaved grass, and "of some it is called pentadactylon," while in Germany it is the Fünffingerkraut, and in France the quintefeuille. Botanically the cinquefoil is the Potentilla reptans. The generic name is from the Latin potens, powerful, in allusion to the medicinal properties of this and some other species in the genus. The root of the cinquefoil is strongly astringent, and was formerly much used in the treatment of ague. Turner I quotes the practice

¹ The author of "A new Herball, wherein are conteyned the names of Herbes in Greke, Latin, Englysh, Duch, French,

of Dioscorides, but adds, "methynk that it smelleth of superstition that in a quartayn the leves of four stalks should be taken; in a tertian the leves of three; and in a quotidian the leves of one." Hippocrates, centuries before the Christian era, declares the efficacy of the plant in intermittent fever. Though now discarded, all the mediæval herbalists were loud in its praises. Tusser, for instance, we see in his "Fiue Hundred Pointes of Good Husbandrie," includes "cinqfile" amongst the "necessarie herbes to grow in the garden for Physick." The unanimity of these authors is not altogether surprising, since they brought little or nothing to the test of actual experiment, but pinned their faith on the statements of Pliny, Dioscorides, and other ancient writers, borrowing copiously from them and from each other.

The tormentil—Potentilla Tormentilla—is "of like vertue with cinquefoile, but of greater efficacy; it is much used against pestilentiall diseases, resisting putrefaction, so it expels poyson and preserveth from infection. The decoction of the leaves or the juyce thereof healeth all wounds. It also

and in the Potecaries and Herbaries Latin; with the properties, degrees, and naturall places of the same." The first part was published in London in 1551, a second part was added in 1562, and a third in 1566, these latter being issued from Cologne. In 1568 these were gathered into one goodly volume, of which Queen Elizabeth graciously accepted the dedication.

healeth the lungs and cureth the jaundice. The root powdered and mixed with the white of an egg, and eaten, heals choler and melancholy." While the cinquefoil favours moist situations the sister plant, the tormentil, is more commonly to be found on heath-lands and open, dry commons. The flower is cruciform and of a bright yellow, and the foliage richly cut into fine segments.

The silverweed—Potentilla anserina—like the cinquefoil, is a great runner, and may possibly require to be checked at times, though one will hesitate long before ruthlessly tearing up its masses of silvery-grey foliage. The graceful form and curl of its long leaves has caused it to receive, in some parts of the country, the name of prince's feather. In very luxuriant surroundings the plant grows somewhat grossly, and the leaves become flaccid and green, losing altogether the beautiful silky texture and delicate grey tint that make so welcome a contrast to its verdant surroundings. This silverygrey naturally suggested its popular name of silverweed, and its less common title argentina. Why it should be called anserina or, to quote another popular name for it, the goosegrass, scarcely appears. One could naturally suggest that these names arise from the plant growing on open commons, beloved of geese, but the old writers discard this idea and declare that the geese when feeling a bit out of sorts value it as a medicine for



STONE BRAMBLE and CLAYTONIA PERFOLIATA.

To face page 170.



anserine ailments, and that the name is a recognition of this remedial service. It is a plant equally at home in Lapland, the United States, China, Chili, New Zealand, and, in fact, most other places.

In our miniature bog, the home of our water-loving plants, we must not omit another British species—the *P. Comarum*, or marsh potentil. Its flowers are of a dull purplish brown—a feature which gives the plant a curiously distinctive look, and as it is some eighteen inches high it commands attention. From some slight peculiarities of botanical structure that we need not here particularise, it is sometimes placed in a closely allied genus by itself and becomes the *Comarum palustre*. Theophrastus many centuries ago named a plant Comaros, but it is impossible to declare that that plant was the marsh potentil—in fact, we have pretty conclusive evidence that it was not.

The strawberry-leaved potentil—the *P. Fragarias-trum*—is a very pretty little species, its leaflets in threes, and its white five-petalled blossoms being very reminiscent of the strawberry. The hoary potentil too—the *P. argentea*—will claim a place in our collection: it is a yellow-flowered species. Nine of our British species have blossoms of this colour, while three have them of a pure white.¹

¹ If instead of taking tin box and trowel and searching out for ourselves Nature's wildlings, we put a few shillings in

Another trailing plant that we are willing to find space for is the ground ivy. It is a plant of almost every country hedgerow or roadside, yet one well worthy of a place in our collection. Like the cinquefoil, it is a great runner, and will require some little controlling, or it will make itself even too much at home, but one will gladly run the risk of that to add its rich mass of foliage and heads of purple flowers to our collection of wildling beauties. If we have a little extra good fortune we may find a plant of it having its blossoms pure white instead of the normal purple. The whole plant is frequently tinged with dull purple. gives forth a strong odour when bruised-an odour that is described by some writers as aromatic, though others prefer the word unpleasant. The ground ivy was esteemed by our ancestors a valuable tonic and vulnerary herb, and sufferers from pulmonary trouble, dropsy, dyspepsia, and divers other ailments were duly dosed with it. The leaves were also infused in water as a substi-

our pockets and call on the nurseryman, some thirty or more of this charming potentilla family may be at our service, the majority having white or yellow flowers, but others crimson, dark purple, copper-coloured, orange, or pink. Thus P. atrosanguinea has blossoms of a deep blood red; P. crocea of a copper colour; P. maculata, orange. P. nivalis is particularly attractive, having white flowers and its foliage silvery-grey. Many of the florists' potentillas have their blossoms large and double.

tute for tea, the decoction being sweetened with honey or sugar, though some rustic connoisseurs held that liquorice was the correct thing to add. Others held its bitter foliage an improvement to the flavour of their home-brewed beer, but in any and every form it would, we imagine, be a rather nauseous brew. It was also formerly added to ale to clarify and preserve it, or, to use the older word, to gill it, so that alternative names for the ground ivy in the old herbals are ale-hoof and gill-run-byground, the latter portion of this later name being clearly allusive to the creeping habit of the plant. The hoof in the former name was probably from the Anglo-Saxon hufa, a garland or chaplet, and this in turn reminds us of the old Latin name of the plant, the corona terræ, "because," as Parkinson tells us, and observation shows us, "it spreadeth as a garland upon the ground." Another old local name of the plant is cat's-foot, its rounded leaves being supposed to be suggestive of the feline paw, and in old herbals it is called the horseshoue. A

a name that in aristocratic circles would be Julia or Juliana, but that in humbler life was contracted to Gill. It will be recalled how in nursery-lore Jack and Jill wandered off together in the journey that ended so disastrously, and how the rustic saying anent the old, old story is that "every Jack must have his Jill." This introduction of the feminine element in the name of the plant seems to need some little elucidation. Another old name of the plant is hedge-maid,

rose by any other name would smell as sweet, and whether we plant ground ivy, ale-hoof, or cat's-foot is immaterial, so long as in one guise or another we allow its verdant garlands a modest share of space in our wild garden.

CHAPTER VII

Blackberry—Poole's "English Parnassus"—The stone-bramble—Dewberries—Hop—Tremendous vigour of growth—Hedge-reared asparagus—Royal command to abstain from using hops in brewing beer—The two bryonies—A "Lynyment to beautifie the Chynne"—The "Toilet of Flora"—The fragrant honeysuckle—Ivy—Destructiveness to ancient buildings—Evening primrose—Parkinson's "Garden of Pleasant Flowers"—Thorn-apple — The henbane — Lupton's "Thousand Notable Things"—A salve to render one elf-proof and goblin-free—Green hellebore—The purple and yellow-flowered monk's-hoods—Necessity of caution in dealing with poisonous plants.

FEW plants make a more attractive background to one's wild garden than the common bramble, or blackberry. A small plant, barely a yard in length, that we put in three years ago, now covers over sixty feet of wall and trellis, or about three hundred square feet. The blackberry throws out long, arching suckers, and these presently touch the ground and root afresh, so that from this

¹ Against dysentery take a bramble of which both ends are in the earth; take the newer root, delve it up, cut up nine

banyan-like growth there seems no apparent reason why, given time and wall-space, these sixty feet should not presently become sixty miles. neither more nor less than a common wild blackberry, but having a southern aspect, and being entirely unmolested by impatient youngsters the fruit ripens to perfection. While we have no hesitation in declaring our plant the common blackberry, we must not forget that there has latterly arisen a section of botanical students who have turned their keen analysis with such vigour on the plant we once all recognised as Rubus fruticosus, that while some tell us there are ten really differing species, one enthusiast we see goes so far as to discriminate forty-eight, all duly marked and named, while one of our greatest authorities, a neighbour of ours, tells us that this has now grown to over a hundred! Our plant is depicted in Plate XIX. It has this year yielded us nearly eighty pounds of delicious fruit.

chips into the left hand, and sing three times the Miserere and nine times the Pater noster. Then take mugwort and everlasting: boil these three, the worts and the chips, in milk, then let the man sip fasting and at night a good dish full some while before he taketh other meat."—ANGLOSAXON MS., Brit. Mus., about 1040.

A clergyman of our acquaintance having escorted a large number of children to Epping Forest, found one of his boys, in the absence of ripe fruit, getting the berries while still quite red, but on remonstrating with him on the uselessness of the



CLAYTONIA SIBIRICA.



Some would have it that the generic title is from a Celtic word, reub, signifying to tear; however that may be, we find the name Rubus applied to the plant by Pliny and other venerable writers. Its power of laceration is a very obvious property, as hands and clothes testify readily enough after an afternoon's energetic blackberrying. Poole, we see in his "English Parnassus," a book published in 1657, applies to the bramble the following epithets: scratching, sharp-hookt, idle, cumbrous, prickly, entangling, briery, bushie, bristlie, biting, catching, holding, rough, twisted, tearing, and rending-a formidable list. The book is a sort of mechanical assistant to the poet in search of ideas, giving alphabetically some hundreds of words and then tagging to them what the author deemed appropriate prefixes.1 Many of the noble blackberry bushes that we find in the country hedges were no doubt planted there, their prickly character being their commendation. Thus Tusser, in his advice to the farmer, tells him that he must in February "ad bremble and hull" where he finds

proceeding the boy defended it, declaring that his mother would make raspberry jam of them.

¹ Thus the poet desirous of referring to the frog, if a little rusty in his natural history, has at his option any one or more of the following descriptive adjectives to give the necessary vraisemblance: sprawling, croaking, loathsome, fulsome, querulous, complaintful, noiseful, yellow, hoarse, fen-haunting, shrill, babbling and gurgling.

his hedges not trespass-proof. Hull, or hulver, are old names for the holly, a plant no less prickly than the bramble, and a quaint old black-letter treatise tells us that "this bushe hyght Rubus groweth in barreyne londe, and is beste to close gardens, for the thycknes of multytude of pryckes letteth 2 and holdeth out men and beastes." Small boys intent on bird's-nesting will no doubt also have noticed that "it defendeth foules that make their nestes therein, as it were swerdes." To grow the blackberry successfully in one's garden the ground must not be enriched with the ordinary dressings, but the sucker should be planted in good mould and decayed leaves.

The gardeners here and in the United States have taken the blackberry in hand. The kind known as Wilson, Jr., grows very strongly, is extremely

- ¹ Melton, in his "Astrologaster," published in 1620, moralises on divers plants he encountered, and tells us how "the Bramble, as I walk'd by, scratcht me by the Legges, which put mee in minde of a griping Lawyer that never meetes with Clyent but hee will be sure to fleece him, if hee doe not flea him."
- ² This letting is the old sense of the word and diametrically opposite to its modern use. It is equivalent to hindering. Thus the Prayer Book speaks of those who are "sore let and hindered," and our old author goes on to describe how "Rubus also is darke and shadowy by reson of hys thyckenes and lettethe the passage in of the sonne beame by the thicknes thereof." One inconvenient result of this is that "it is therefore frende to adders and to other creeping wormes."

productive, and bears very large fruit of delicious flavour. Another kind, the "Ancient Briton," yields very freely, while the "First and best" is not only a very prolific bearer, but begins fruiting very early. The "Mammoth," too, is an excellent variety. Another valuable plant is the "Crystal white": this gives a fine crop of creamy-white fruit. Another variety, known as the "Iceberg," also bears white fruit, and is held in high regard. Others, again, have double flowers or very richly cut foliage, while the loganberry, a true and permanent hybrid between the blackberry and the raspberry, has undoubted merits, and is a distinctly valuable addition to the fruit-bearers of our gardens.

The dewberry, the plant we figure in Plate XX., is a very near relative of the blackberry. Botanically it is the Rubus cæsius, the specific name signifying bluish-grey, in obvious reference to the colour of the ripe fruit. The popular English name has no real reference to dew, but is a transformation of the Anglo-Saxon word duua, a dove, another obvious allusion to the purple-grey or dove-colour of the matured berries. As contrasted with the blackberry the branches are slender and more or less covered with a greyish bloom, and rarely arch; the flowers are few in number, and the narrow calyx segments close in in much more cup-like form; the leaves are of a paler green, and the prickles are by no means so much in painful evidence. The berries too, while

often larger than those of the blackberry, are built up of fewer granules, and have not the glossy appearance of those of the bramble. In a wild state it prefers open fields and waste ground rather than hedgerows, and it has, with ourselves at least, not proved itself so amenable to cultivation as its relative.

The stone bramble, another member of the blackberry family, is more especially a plant of the mountain slopes of the north, and we have failed to grow it very successfully in our Surrey garden. The leaves are thin and slight in texture, and generally made up of three nearly equal leaflets. The flowers, as our illustration shows—Plate XXVIII.—are very small, while the fruit is built up not of numerous small parts, as in the blackberry, but of a few large ones. A reference from this figure to that on Plate XIX. will at once show how marked is the difference in appearance. The whole plant is barely a foot in height: botanically it is the *Rubus saxatilis*, the specific name signifying that which dwells amongst stones.

The hop makes a noble show, and when well laden with its masses of pale green clustering cones is distinctly attractive. It has immense powers of running, and grows with phenomenal rapidity. To test this we, on May 25th, took one sprout under careful observation, recording each morning at nine o'clock its growth. On the 26th it had gained four

inches, while on the 27th it had put on another four. The next day it made an additional six and a half inches, while next day it was somewhat idle and had increased but another four and a half inches. The more or less propitious weather would of course tell; what our old gardener calls "growy weather" is at once the cause of more rapid developments. The succeeding daily movements were 5, 3, 4½, 4½, 6, 7, 6. It had grown four feet seven inches in the eleven days we were observing it. For a plant to grow a yard in eight days is rather startling, and this vigour was not confined to a single shoot by any means; dozens of others were exhibiting a like energy. A plant that we have trained against our house reached, last season, a height of thirty-seven feet, and spread out laterally twenty-six. This, there or thereabouts, is what it is prepared to do for us, without any trouble on our part, year after year, closing its career each Autumn with the arrival of the Harvest Festival, when its long, trailing, fruit-laden stems are a very welcome contribution to the adornment of our church.

Beautiful as it is in its wild state, clambering over the hedgerows, its dense masses of large leaves and constricting stems are rather destructive to other plants, and when the Autumn fall of the foliage takes place we see clearly enough the mischief it has done them.

¹ Good hop hath a pleasure to climbe and to spred."—Tusser, 1580.

The very vine-like form of the leaves and the far-extending growth of the plant led some of the older herbalists to call the hop the Vitis septertrionalium, or northern vine, and probably the fact that it supplied the northerners with a beverage as acceptable to them as was the juice of the grape to the southern folk, tended towards the acceptance of the name. Parkinson, discoursing "on Hoppes," tells us that "these are more frequent in these colder than in the hotter countries, which sheweth the goodnesse of God unto us, to provide for every Countrey such things as are fit for the sustentation of life: for where Vines grow not, and the water too cold and rawe to drinke simply of it selfe, there are these Hoppes chiefly bred to make drinke to serve in stead of wine or water."

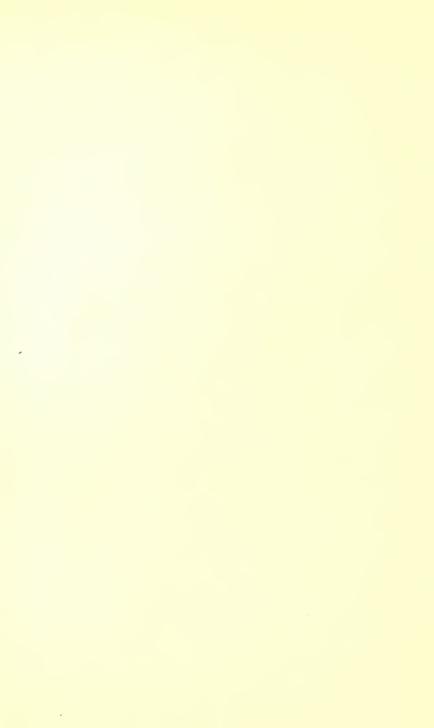
The hop is what is botanically termed diœcious, that is to say in one plant all the flowers are stamen-bearing, and in another they are all pistillate, and it is these latter plants that produce the cones.

Our forefathers used to eat the young shoots of the hop in the Spring, "after the same manner," Parkinson tells us, "that the buds of asparagus are, and with as great delight to the taste, yet they have little nourishment in them." Pliny, too, tells us that the ancients made no use of the plant, except to ornament their gardens, but that in his time they ate the young tops as a vegetable. As he was born



CAMPANULA PULLA and GERANIUM ARGENTEUM.

To face page 182.



A.D. 23 he has by now considerable claim to be regarded as something of an ancient himself, and it is interesting to note that as we so regard him he in his time looked back to those unfortunate folk who centuries before had failed to realise the culinary value of the plant. The leaves of the hop were made by our forebears into a kind of tea, being held to purify the blood and to be of efficacy as a remedy for ague. A decoction of the cones was held "to expell poyson and the diseases of melancholly and choller," but the use of these cones in the brewing of beer is the application of them that at once occurs to one's mind and is the great cause of their cultivation in these latter days.

Before the use of hops as a flavouring and preservative of beer, I ground ivy, milfoil, and various other plants were employed, and there was for a long time a considerable feeling against the substitution of hop. It was supposed to dry up the tissues of the body and to produce melancholy. In a MS., time of Henry VIII., entitled "Articles devised by his Royal Highness with Advice of his Council for

Tusser, "Fiue Hundred Pointes of Good Husbandrie," 1580.

[&]quot;The hop for his profit I thus doo exalt,
It strengtheneth drinke, and it savoureth malt,
And being well brewed, long kept it will last,
And drawing abide, if ye drawe not too fast."

the Establishment of good Order and Reformation of sundry Errors and Abuses in his Household," one stipulation is that the brewer is not to put any hops or brimstone into the ale supplied, and we find that in the reign of James the First their use was thought to be so deleterious that their employment was forbidden by an Act of Parliament. Bulleyn (1562), on the other hand, declares that "this Beere is very good for flegmatike men," and Gerard (1597) protests that "the manifold vertues of hops do manifestly argue the wholesomeness of Beere, for the hoppes rather make it a physicall drinke to keepe the body in health than an ordinary drinke for the quenching of thirst."

The use of hops in England for brewing seems to date from about 1500, but there is no doubt that for culinary or medical reasons the plant was in esteem centuries before. In mediæval days one way of raising money for ecclesiastical purposes was the church house of the parish. This, at fair and festival time, was often let to merchants, showmen and others, and the ale brewed and sold there also brought in a considerable revenue. In the churchwardens' accounts we find such items as "Received for the hye cross ale xxxs iijd.—Hoppes for last brewing, iiijd.—Made with our ale at Wytt Sonday xls." These items date 1512, 1513, and 1514. Another item is: "Received of the Egypcions for the church house xxd." These visitors were a band

of wandering gipsies arriving at fair-time to tell the country folk their fortunes.¹

It is sometimes stated that the hop was brought to England from the Netherlands, but there seems no reason to doubt that the plant is indigenous. The first English writer on hop-culture was one Scot, who in the year 1574 published "A Perfite Platforme of a Hoppe Garden." Our supplies until then had been mainly drawn from the Netherlands, and he patriotically points out that there was no necessity for bringing from abroad the hops that we could quite easily grow ourselves. Flemings," he declares, "envie our practice herein, who altogether seek their owne profite, to cramme us with the wares and fruites of their countrie, dazeling us with the discommendation of our soyle, obscuring and falsifying, and sending us into Flanders for that whiche we may finde at home in our own banksides." On reference to Harrison's "Description of England," a book published in 1587, we find that Scot's appeal had borne good fruit, since we find him declaring that, "Of late

Egyptians, using no craft or feat of merchandize, have come into this realme, and gone from shire to shire, and place to place, in great company, and used great subtil and crafty means to deceive the people, bearing them in hand that they by palmistry could tell men's and women's fortunes, and so many times by subtilty have deceived the people of their money" (Portion of Act of Parliament fulminated against these wanderers in reign of Henry VIII.).

yeares also we have found and taken vp a great trade in planting of hops, whereof our moorie hitherto and vnprofitable grounds doo yeeld such plentie and increase that there are few farmers or occupiers in the countrie, which have not gardens and hops growing of their owne, and those farre better than doo come from Flanders vnto vs. Certes the corruptions vsed by the Flemings, and forgerie dailie practised in this kind of ware, gaue vs occasion to plant them here at home; so that now we may spare and send manie ouer vnto them. And this I know by experience that some one man by conversion of his moorie grounds into hopyards, wherof before he had no commoditie, dooth raise yearelie by so little as twelue acres in compasse two hundred markes; all charges borne toward the maintenance of his familie. Which industrie God continue! Though some secret freends of Flemings let not to exclaime against this commoditie, as a spoile of wood, by reason of the poles, which neuertheless after three yeares doo also come to the fire, and spare their other fewell."

Hartlib, in his "Complete Husbandman" (1569), demolishes anew the trade-born myth that "it is one of the great deficiencies of England that hopps will not grow," and sums up triumphantly—"whereas it is now known that they are the best in the world"; a complete rehabilitation of our homegrown produce.

The two species of bryony must certainly find a place in our wild garden. They are distinguished as the white or red-berried, and the black. Though so similar in name they are entirely different plants in appearance and botanical affinity. Both are climbing plants bearing a large number of richly coloured berries.

In the white bryony the foliage is quaintly angular and somewhat vine-like, and the plant supports itself by numerous tendrils, so that the stems, wandering for yards, take entire possession of the hedgerow. As the root-stock is perennial the plant is to the fore each year, so with each recurring season it clothes with welcome regularity a long piece of our trellis with abundance of beautiful foliage, with rich clusters of berries, first green, then yellow, presently orange, and finally crimson; the fruit in all these varying tints, consequent on varying degrees of ripeness, being found together on the plant. The white bryony grows with great rapidity, as its name, Greek in its origin, testifies. The flowers are small and pale green in colour, some being stamen-bearing and others pistilliferous: the latter alone yield the fruit.

The white bryony is common enough in most parts of England, but Scotland and Ireland would appear to know it not. The root is very large, so that it is somewhat difficult to transfer the plant from the hedgerow to the garden. We have hopelessly damaged several in the attempt to do so, so that when we have once safely transplanted it, it should not, without weighty reason, be shifted again. Like most other things, the bryony was held by our forefathers in esteem as a remedy—"those that have the dropsie, the falling sickenesse, and dizzinesse of the brain, that is long continued and hardly to be remoued," looking to it for relief. Pechey, in his "Compleat Herbal," 1694, advises to "take what quantity of the Rootes of red beried Briony you please, slice them and press out the Juice: this being kept in Vessels unmov'd will in a few hours deposit the Lees, which being separated by pouring the Water away gently, must be dried in a glass vessell. They are used in a Dropsie." Great caution is necessary in using the root: deaths have been several times recorded in the medical books from its employment by village herbalists. The French call the plant the navet du Diable, which sufficiently testifies to their belief in its violent and dangerous properties.

Mizaldus, a very venerable author, appeals to those who would "beautifie the chynne with fine heaire" to "take butter without salt, the iuyce of a redde onion, the grease of a Badger, the rootes of Briony, of Beetes, of Radysh, and of whyte Lyllies." These various ingredients they are to make into a "Lynyment, and annoynt the chyn often therewith, being shauen." In a popular book, the "Toilet of



CAMPANULA REINERI, DIANTHUS DELTOIDES, and RHODODENDRON HIRSUTUM.

To face page 188.



Flora," published in 1784, we find the bryony root again in demand, this time "to dye the hair of a flaxen colour." As the prescription includes also vine-twigs, lily, celandine, and saffron roots, the flowers of mullein, broom, and St. John's-wort, it is, perhaps, a little difficult to assign to each ingredient its share in the total result.

The mediæval carvers of the fourteenth century were fully appreciative of the charm of the redberried bryony, and introduced it very effectively: we remember seeing in the Cathedral of Rouen a particularly charming example, a running moulding, where the berries, tendrils, and foliage were introduced with evident appreciation of their artistic value.

The black bryony, no less admirable a climber, may be readily recognised by its large heart-shaped and glossy leaves. The flowers are small and greenish-white in colour, and growing in long clusters, each plant bearing flowers of but one sex. The berries are large in size, and dark red in colour, and remain in conspicuous bunches after the leaves have decayed. The young shoots have sometimes been eaten, dressed like asparagus, and the root,

¹ "A Collection of the most Simple and Approved Methods of Preparing Essences, Pomatums, Powders, Perfumes, and Sweet-Scented Waters, with Receipts for Cosmetics of every kind that can smooth and brighten the Skin, give force to Beauty, and take off the Appearance of Old Age and Decay. For the Use of the Ladies."

bruised, is reputed to have done good service in asthmatic and paralytic cases. It is a near relative, botanically, to the yam that is eaten so freely in tropical countries, but we must not too hastily assume that because certain plants in a botanical order are harmless, the others are equally open to our use. The carrot and the hemlock are closely related, but are by no means interchangeable when culinary matters are under consideration.

In the introduction of all climbers we must pause to consider how far we are prepared to go on their behalf, what amount of sacrifice we are willing to make. Whether it be convolvulus, clematis, bryony, hop, or honeysuckle, its first and only thought is self-interest: the survival of the fittest and it will make very strenuous efforts to be the fittest. We have seen a tree, some twenty feet in height, a mass, to the eye, of bryony, and very beautiful it looked; and one may see yards of hedgerow in the close embrace of the bindweed, and very charming the long festoons of great white bell-flowers look; but both tree and hedge are much the worse for playing host, and when Summer is over, and the long trails of creeper have withered away, what remains is often but a sorry sight.

Another climber that it is essential we should make room for is the honeysuckle, or woodbine, its grace and delicious fragrance I rendering it a general favourite: a visit to some rural woodland will readily place us in possession of healthy young plants, and these will quickly establish themselves and cover a large surface, anything up to a run of twenty feet or so being a pleasant probability. The popular name, honeysuckle, is a testimony to the wealth of nectar borne at the base of the fragrant tubular flowers, which any country child will teach us how to extract,2 while the name woodbine, perhaps less commonly used nowadays, was obviously bestowed upon the plants from the binding power of the stems. Shakespeare writes: "So doth the Woodbine, the Sweet Honeysucke, gently entwist," but one may often see the stems of hazel and other hedgerow trees deeply furrowed from the constriction that they have undergone-a vigorous compression that goes considerably beyond the gentle adherence that is all that the poet admits. This twining is in the same direction around the support-

SHAKESPEARE.

BLOOMFIELD.

[&]quot; "O'er-canopied with luscious woodbine."

[&]quot;Round the young ash its twining branches meet, Or crown the hawthorn with its odours sweet."

² Those connoisseurs, the bees, ages ago discovered this wealth of sweetness, and with ready zeal and tireless industry rifle the flowers of their treasure. Thomson, it will be recalled, notes how "the bee strays diligent" and loads himself "with the extracted balm of fragrant woodbine."

ing stems as that of the hop or bryony, the reverse of that of the bindweed. One of our poets, in dwelling upon the charm of the woodbine, describes how—

"With clasping tendrils it invests the branch, Else unadorn'd, with many a gay festoon And fragrant chaplet; recompensing well The strength it borrows with the grace it lends."

The writer of these lines, less observant than was meet, falls into the popular fallacy that a plant that climbs necessarily does so by means of its tendrils, but the greater number of climbing plants—the honeysuckle amongst them—have no such aids, nor feel the need of them.

Another climber, an admirable background plant, is ivy. It has, moreover, the valuable property that it will grow well in situations too shady for most other plants, and will therefore clothe with verdure spots that might else be bare. As the gardeners who make it a speciality will supply us with over a hundred named sorts, varying in size, and form, and colour of leaf, the choice may well become bewildering, and it is clearly best to visit the nurseryman's

¹ Thus aureomaculata has mottled yellow leaves; aurantia greyish green foliage; marmorata large green leaves edged with creamy-white; luteola has its foliage green with a grey mottling and a broad edging of pale yellow. Digitata has its leaves cut up into deep fingers, while others are heart-shaped or triangular in form.

ground and select for ourselves from what we see before us rather than to run our eyes down long lists of names in his catalogue. Should we design to cover a wall surface or trellis a little nailing or tying will be necessary at first, or, if our ivy is intended to cover the ground, a little pegging down, but so soon as our plants are thoroughly rooted they will need no further assistance.

There is a sentimental objection to the removal of ivy from our venerable abbeys and castles: we are told that it forms a charming veil to the ruins beneath, Nature's kindly screen to shield from our eyes the mischief wrought by man or the ravages of time, but it is really an element of destruction, contributing its share, and that a very active one, to the downfall of the building, its stems, yearly increasing in stoutness, forcing the stones apart, making opening for the inlet of rain and the devastating action of frost, until presently the historic pile is disintegrated and becomes but a mere mass of stones. Even if no mischief accrued from the ivy growth it would surely be a better thing to preserve to the eye these ancient buildings, to cherish what remains in them of architectural interest, than to allow them to become mere masses of shapeless greenery.1

[&]quot; "The English Parnassus" was published in 1657, and, as we have already indicated, was intended by its author, Poole, to assist the would-be poet with a choice of epithets, so that

The garden-lover can scarcely fail to be something of a bird-lover too (though when the sparrows destroy his crocuses he sometimes dissembles his love), and he will rejoice that in the recesses of his ivy are sundry welcome nesting-places, while his entomological tastes will be gratified by the visits of the holly blue, a graceful little butterfly that finds in its larval stage welcome pabulum in the holly and ivy, and therefore selects these plants on which to lay its eggs. During the flowering season of the ivy many insects, butterflies, night-flying moths and others are attracted to its dull-looking blossoms and find welcome refreshment. While ivy, from its evergreen character, ensures us at all seasons a verdant mantling, it has the grievous disadvantage of being a great harbourage for snails, and these are terribly destructive. It is very trying when some friend has sent one a rather choice thing, and it is planted with every care, to find next morning that the stem has been eaten through when the divine afflatus failed the practical Poole might come to the rescue and set matters jogging on again by supplying the missing word. We find little or no suggestion of the destructiveness of the ivy, unless victorious or encroaching may be accepted, but if we desire to apostrophise the plant we have an abundance of choice left. To call it clasping, clinging, twining, embracing, flattering, fawning, amorous, ambitious, wriggling, winding, snakie, crawling, twirling, hugging, wandering, spreading, clambering, are but a few of the terms at our service. Some of them strike us as being

hardly up to Parnassian standard.



UPRIGHT MEADOW CROWFOOT and CHEDDAR PINK.



and the whole thing irretrievably ruined. On going out after dark with a lantern we may see the devastation proceeding gaily. We have night after night collected from eighty to a hundred snails and consigned them to destruction, but the task is a repulsive one, and, after all, not entirely efficacious, so that in self-defence a noble mass of ivy many feet high, many yards long, has gradually disappeared from our wall, much as we appreciated its shelter and beauty.

One great compensation to these nocturnal visits is that we find our evening primroses in all their splendour. As the shades of evening advance these flowers unfold with startling rapidity until the whole plant is lavishly decked with their delicate sulphur yellow.1 Originally a North American plant, it made its first appearance in Europe in 1619, the seeds being sent to Padua. The exact date of its arrival in England is uncertain, but it must have been very soon after this, as we find Parkinson, in his "Garden of Pleasant Flowers," published in 1629, referring to it as a well-known plant. He calls it the tree primrose of Virginia. Another name for it is the evening star. When once established it seeds very freely, and repression rather than cultivation becomes presently neces-

[&]quot; "You, evening primroses, when day has fled,
Open your pallid flowers, by dews and moonlight fed."

BARTON.

sary. While a plant of great beauty at night, it is somewhat less charming by day, as the flowers of the previous evening gradually wither as the sun gains strength, but it is a plant that we should be very sorry to lose from our garden, so the necessary eradication is as gently done as the interests of our other plants will allow.

An old writer declares the plant "the emblem of inconstancy and therefore seldom worn by the fair, excepting by those gay belles who love to coquet and teaze their smitten swains." How any one in presence of so beautiful a flower could devise an idea so vapid, a suggestion so nauseating, passes understanding. It is on a par with those more modern Languages of Flowers, where the victim of the tender passion is supposed to send to the fair object of his desire a flower that represents the state of his feelings, ardour, hope, jealousy, or what not, and she responds in like manner. As we are informed that there are several such compilations, and that they by no means agree in the significance assigned to various flowers, those who employ them would appear to run considerable risk of being entirely misunderstood.

One may occasionally find on rubbish-heaps and waste ground the thorn-apple, with its graceful white flowers and curious prickly fruits. It springs very readily from seed, and earns a welcome place in our garden. Like many other poisonous plants

it has a somewhat unpleasant odour, a feature, however, that it does not insist on forcing upon us unless we deliberately bruise and maltreat it. It was originally introduced into England from the East, but since its introduction by the herbalist Gerard, in the reign of Queen Elizabeth, it has fully taken up its abode with us. The plant is a powerful narcotic. The seeds produce dimness of sight and giddiness, or in large quantities delirium, and several cases are on record of fatal results to children and others who have incautiously eaten them. In India the plant has been criminally employed by assassins and robbers, while in Beverley's "History of Virginia" an interesting account is given of a party of picnic folk gathering the leaves as an ingredient in a salad. All who partook of it temporarily lost their reason and had to be placed under restraint, but in ten or eleven days they entirely recovered, not remembering anything that had passed in the interval. Fortunately for themselves they selected for their purpose only the young and tender leaves; had they chosen those fully grown, much more serious consequences would undoubtedly have followed.

The seeds are medically employed in the form of an extract or tincture, while the dried leaves, under the familiar name of stramonium, are sometimes smoked as cigars to afford relief in cases of asthma. Gerard speaks of having found the thorn-apple of

¹ Botanically the thorn-apple is the *Datura Stramonium*.

great service to him in his medical practice. "The iuyce of Thorne-apples," he writes, "boiled with hog's grease to the form of an vnguent or salue cureth all inflammations whatsoeuer, all manner of burnings or scaldings, as well of fire, water, boyling leade, gunpouder, as that which comes by lightning, and that in a very short time, as my self have found by my dayly practice to my great credit and profit." The properties of the thorn-apple are almost too powerful and uncertain for safe application, at all events in lay hands, though it has been employed in epilepsy, mania, and divers others of the ills of suffering humanity, and it occupies a place in our modern pharmacopæia.

In South America also the Indians use the plant in cases of illness, but in a somewhat different way to ourselves, as it is not the sick person who there takes it, but his nearest relation. As soon as this person returns to his senses, a matter of some days, a somewhat anxious time begins, as he is supposed during the interval to have discovered the person who has bewitched the invalid, and the whole family immediately endeavours to discover who it is that best answers to the description given. The unfortunate man who is pitched upon is then required to promptly remove the spell, or, failing this, to pay the penalty by his life.

It may be objected that a plant so potent should find no place in one's garden, but therein we think the objectors err. The plant is a very quaint and interesting one, interfering with no one who has the sense to let it alone. Those, needing a nurse or a keeper, who fear they could not refrain from eating its seeds or shredding up its leaves for a salad, will do well to keep clear of it, but we others who can enjoy its beauty need not surely be debarred from this enjoyment.

A like objection—its poisonous nature—may be taken to the henbane, yet it is a plant so marked in individuality that we have always welcomed it in our garden. The double rows of dull yellow flowers, veined with purple, that line the stem in such profusion, and the great enlargement of the calyx after flowering is over, are very interesting points. It is a strong narcotic.¹

Lupton, in his "Thousand Notable Things," 1595, highly commends "the roote of Henbane stampt and applyed warme to the payne of the Goute of the feete. It is sayde that it helpes maruelouslie because this herbe belonges to Jupiter,

"Here henbane, poppy, hemloc here,
 Procuring deadly sleeping,
 Which I do minister with fear,
 Not fit for each man's keeping."

The lines are from the "Muse's Elysium" of Drayton. They suggest the idea that the person speaking was that dangerous person, one who meddles with what he does not understand: into whose hands no one would knowingly trust themselves.

which is onely Lorde of Sagitarie, which governes the hucklebone, and of Pisces, whiche chalengeth the feete." The old author, Thomas Lupton, claims for this quaint little black-letter quarto much of value, declaring of those notable things that he gathered in, that "some are wonderfull, some strange, some pleasant, divers necessary, a great sort profitable, and many very precious." This is a very considerable claim to make, but so far as his book goes, and it goes of course no further than the knowledge of his day would allow, we find ourselves able to admit much of what he claims for it, for its contents are distinctly wonderful, while their strangeness is undoubtedly a strong feature. Many of his recipes are now superseded by others yet more profitable and precious; we do not nowadays, for instance, anoint our temples with "the gall of a Partriche" to strengthen the memory.

Two of Lupton's hints, which he would no doubt classify amongst the matters profitable, again concern the henbane. Would we catch hares—and that we know from the old cookery book to be the first step towards their appearance in the menu—we are told to take "the iuyce of Henbane mixt with the bloud of a Hare, and sodde within the skynne of a Hare." This we proceed to bury, and then bide our time, since "all the Hares wyll gather together which be within that tract where it is



CERASTIUM GIBRALTIACUM and DIANTHUS NEGLECTUS.

To face page 200.



buryed." If one feels growing unduly hirsute the henbane again comes to the rescue, for "if you wyll take the heair from any part of the body and woulde have it to growe there no more, stampe Antes egges with the iuyce of Henbane and Humlocke and annoynt the place therewith."

In an Anglo-Saxon manuscript, preserved in the British Museum, and some five hundred years antecedent to Lupton, we find the prescription for a salve against elves and goblins of the night, nocturnal disturbers of our peace, visitors that we might well desire to circumvent. To this end we "take hop, wormwood, henbane, viper's bugloss, garlic, hedgerife, fennel. Put these worts into a vessel, set them under the altar, sing over them nine masses, boil them in butter and sheep's grease, add much holy salt to them, strain through a cloth and throw the worts into running water. If an evil tempting come to a man, or an elf, or night goblin come, smear his forehead 1 with this salve and put it on his eyes, and cense him with incense, and sign him frequently with the sign of the Cross."

It may be objected that the henbane plays only a very subordinate part in this prescription; but this need not trouble our readers, since, if they have entered into the spirit of our herb-garden, their

¹ Presumably that of the man, though possibly that of the goblin!

gardens in turn will supply all the other plants, and they can proceed at once to take the needful herbal precautions against nightmare, which is about all that the matter comes to. Hop, wormwood, garlic, fennel, we have long cultivated appreciatively, while hedgerife ¹ comes unbidden.

The green hellebore is not a very common plant, but it may occasionally be found in woods and on waste ground. It is one of the few plants that have green flowers. These flowers are ordinarily few in number and drooping, while the glossy, dark green leaves are deeply cut into spreading lobes or segments. Like the henbane, the dwale, plantain, and divers other plants, it seems to find too in the society of mankind a special attraction, so that we may not unfrequently find it on or near ruins, or at the foot of old walls. Gerard declares that "it is good for mad and furious persons, for melancholy, dull, and heavy men; for those that are troubled with the falling sickness, for lepers, for them that are sicke of a quartane ague, and for all them that are troubled with black choler." Finally, it is no less good to plant in our rock-garden, its verdant flowers and beautifully cut foliage rendering it a very attractive feature therein.

The monk's-hood is another plant that some

¹ The *Galium Aparine*, but known popularly nowadays as goosegrass, though it has many other names, as cleavers, harif, catchweed, grip-grass.

people possibly might scout, from its very poisonous properties, but which is none the less a charming plant. We figure it in Plate XXI. We plant it liberally in the shaded portions of our rock-garden, and the rich masses of deep purple blossom rise amidst the ferns and form a very attractive feature. The monk's-hood, aconite, helmet-flower, or wolf'sbane—Aconitum napellus—though awarded a place in our British flora, has only a few stations assigned to it in our plant lists, and must undoubtedly be recognised as an introduction. It was, in fact, first cultivated in England about the year 1596, and any plants apparently wild can be but strays that have more or less thoroughly established themselves. Those who would see it at its best may encounter it freely enough in the woody and mountainous districts of Europe: we have seen it growing grandly on the Alps, up to an altitude of some six thousand feet. In Germany it is the Eisenhut or Munch cappen, names equivalent to our helmet-flower or monk's-hood. We also grow, to our great pleasure, the yellow monk's-hood—the Aconitum Anthora of the hotanists

If we may credit Ovid, the aconite first sprang

Thou shalt prove a shelter to thy friends,
A hoop of gold to bind thy brothers in:
That the united vessel of their blood
Shall never leak, though it do work as strong
As Aconitum."

SHAKESPEARE.

into existence from the foam of the infuriated Cerberus, when that cheerless brute was dragged, willy-nilly, by Hercules from the lower world. We are told by the poet how he—

"Backward hung, and scowling, look'd askew
On glorious day, with anger rabid grew:
Thrice howls, thrice barks at once with his three heads,
And on the grass his foamy poison sheds.
This sprung; attracting from the fruitful soil
Dire nourishment——" (The "this" being the aconite.)

Cases have from time to time occurred of fatal effects resulting from the substitution of the root of the monk's-hood for that of the horseradish, though the two plants when seen growing are as utterly different in appearance as one can well conceive. They agree in having large roots that are found to be white in their interiors, though even these in the two plants are not at all of the same form; I and in every other point—size, form, growth, colour of leaves and of blossoms—they are utterly diverse. It is necessary for crass stupidity to utterly ignore a dozen visible points of difference before digging up the plant at all, and laying bare the one hidden point of slight resemblance. And then the jury returns a verdict of "misadventure"!

¹ The root of the monk's-hood is two or three inches long and of a dark brown; the root of the horseradish is much longer and of a dirty yellowish-white. It is really scarcely fair to blame the aconite when things go wrong.

CHAPTER VIII

The dwale, or deadly nightshade—The mission of Atropos
—Chicory—The "Historia Mundi" of Pliny—Arab
lore—Lady's-mantle—The tuberous comfrey—Purple
comfrey—The yellow iris—Cornflower—The gentians—
Edelweiss—Chalet-made specimens—Soldanella—Grim
the Collier—The value of scientific nomenclature—The
two Claytonias—"Botanical Magazine" of Curtis—
Crimson rest-harrow—The various bell-flowers—The
not-to-be-improved-on harebell—Our pinks—Maiden
pink—Cheddar pink—Ruskin's Society of St. George—
Glacier pink—Cerastium gibraltaicum—Fool's parsley
—How distinguished from the gardener's parsley.

THE dwale, or deadly nightshade, is a plant of striking appearance, which is abundantly worth growing from its beauty and interest, but which carries swift death in its unwise use. No doubt this consideration has frequently had great weight, and has led to the plant being destroyed where it may probably have at one time grown in considerable abundance. It is found

¹ "The green leaues of deadly Nightshade may with great aduice be vsed, but if you will follow my counsell deale not with the same in any case, and banish it from your gardens,

more especially in the neighbourhood of villages, and it also grows freely sometimes around old ruins. It was in Gerard's time very abundant at Highgate and other localities around London. It is, we remember, found profusely, for example, around Furness Abbey. In such cases it is probably a survival from the monkish herbgardens of mediæval days. The plant grows bushily to a height of some four feet, and when thickly covered with its large black berries is a very noticeable and conspicuous plant.

Botanically the dwale is the Atropa Belladonna. The generic name is derived from Atropos, the Fate whose mission it was, according to classic mythology, to sever the thread of life—a sufficiently marked reference to the deadly properties of the plant. The specific name signifies beautiful woman, and alludes to the mediæval use of the plant in the preparation of a cosmetic, while the old English word "dwale" signifies trance or torpor. Another old name for the plant is the great morel, from the Italian morello, the diminutive form of Moro, a Moor, in allusion to its large black berries.

and the vse of it also, being a plant so furious and deadly. Banish therefore these pernition plants out of your gardens and all places neere to your houses where children do resort, which do oftentimes long and lust after things most vile and filthie, and much more a berry of a bright shining black colour and of such great beautie."—GERARD.



GOUTWEED.



The flowers of the dwale are of considerable size, bell-shaped, and of a dull purple. The plant is a strong narcotic, but the berries are especially potent in their operation. As they are somewhat suggestive of cherries, numerous cases of poisoning are recorded against them. By some astounding negligence a quantity of these ripe berries were sent up to London in the year 1846 as an article of food, and several persons fell victims to the experiment. This reminds one rather of the man who was seen gathering an assortment of poisonous fungi under the impression that they were mushrooms, or at all events their equivalents, for commercial purposes. On being warned that he would certainly kill himself if he ate any of them, he thanked his kindly informant, but said that he was not gathering them for himself at all, but sold them up at the hotel!

In medical practice the dwale is frequently employed to alleviate pain, but its greatest value arises from its curious property of causing a great dilation of the pupil of the eye when a little of the extract is painted on the eyelid—a property that is often of much service to the oculist in dealing with various diseases of the eye. Belladonna liniment often proves most efficacious in the relief of pains in the muscles, and a plaster of belladonna is often used to relieve the twinges of lumbago. The tincture too is employed to advantage in easing the

oppressive breathing of the unfortunate who are victims to asthma. We need scarcely add that all such remedies must be used under medical supervision. Our present duty is to commend to our readers a very interesting addition to their rockgarden, but we take no responsibility for little nephews or grandchildren. The time, we trust, will some day come when the spread of a knowledge of natural history will enable even the cottager's child to recognise the difference between a cherry-tree and a bush of belladonna, and to so far act upon its knowledge as to render an appeal to the burial club uncalled for.

The chicory, or succory, to give it its alternative though less-known name, is ordinarily a plant of the chalk districts and gravelly soils, but, if we can persuade it to grow, it should certainly find a place in our rock-garden, its long lines of pale lilac-blue composite flowers being very charming, while its bold, upright growth gives it distinction amongst its fellows. There is, besides, a distinctly practical value in its cultivation, if there be any truth in the old idea that "the body anoynted with the iuyce of Chicory is very available to obtain the fauour of great persons." In Tusser's "Fiue Hundred Pointes of Good Husbandrie" we note that suckerie is included amongst the desirable "seedes and herbes for the kitchen," together with "burrage,

¹ Buttes, "Dyets Dry Dinner," 1599.

oyneons, endive, malows, perceley," and many other herbs, some of which we still retain in use, though others have long since been superseded. The suckerie is included in this list from its value in "sallets," and elsewhere in his book it is one of the plants included in "good huswifelie physicke," for—

"Good huswiues prouides, ere an sickness doo come, Of sundrie good things in hir house to have some."

The chicory is a perennial. The leaves are still often used in salads, and especially abroad; they are rather bitter to the taste. In France the popular Barbe de Capuchin is produced by digging up the chicory and then placing the roots in sand in a dark cellar, when they throw out numerous leaves that become blanched and are then very acceptable. It has also been commended as a fodder plant, yielding on light soils a large amount of nutritious food; but this service will scarcely appeal to us, since one of the last uses we should dream of turning our hobby rock-garden into would be a grazing ground for cattle or sheep.

To most of our readers the association of chicory with coffee will be the first thought that suggests itself. The long tap-roots are roasted in a kiln and ground up. It is whispered that chicory, itself an adulterant, is in turn mixed sometimes with sawdust, dried horse-liver, and other delectable additions, so

that on the whole, though its use is now legalised, if confession be made of its introduction, coffee pure and simple would appear to be the preferable beverage. In Germany and France the roasted roots are sometimes used by themselves in substitution for coffee. Its use was well known by the ancients, Horace, Juvenal, Virgil, Pliny, and other writers referring to it.

At the bare mention of some few subjects certain quotations may be at once looked for. No writer, we suppose, on physical culture, no kindly chairman presenting the gymnasium prizes at any institution, could long resist the temptation to refer to the mens sana in corpore sano. In like manner no reference to plant-names without early reference to the well-worn deprecatory quotation, "What's in a name? A rose by any other name would smell as sweet" would appear possible. Words are too commonly regarded and employed as but arbitrary symbols that by some chance have become associated with certain things; yet, like the coinage we use in our daily transactions, each is stamped with a meaning and a history. In many cases the lapse of time may have made the significance obscure or beyond recovery, but we may safely assume that no matter how meaningless these names may appear to us, they will only be so because we have lost the key to their significance.

Before the Christian era Hippocrates Theophras-

tus, and Dioscorides had already published treatises on plants, and soon afterwards the great "Historia Mundi" of Pliny was written. We still use many of the names these ancient writers gave, though in many cases their descriptions of the plants cannot be followed, and the old names have at times been allotted on a very shallow foundation of probability. When, later on, the Western Empire fell beneath the incursions of barbarous invaders, the Arabicspeaking countries of India, Persia, Arabia, Egypt, and Morocco, were for centuries the home of culture and learning; poetry, mathematics, geometry, art, medicine, astronomy, chemistry, and botany, all being wonderfully developed. I Our English word jasmine is but a corruption from the Arabic name of the plant ysmyn. The saffron crocus derives its name from the Arabic zahafran; the alchemilla, or lady's-mantle, is so called from the Arabic alkemelyeh, while our beautiful blue chicory flower bears in its name an almost absolute identity with its Arab

¹ To this day many of the fixed stars are still marked on our celestial globes by their Arab names. Thus the seven most conspicuous stars in the constellation of the Great Bear are Dubhe and Merak, the pointers, and Megrez, Phecda, Alioth, Mizar and Alkaid. Elsewhere amidst the starry host of heaven we get Aldebaran, Deneb, and many others. The mathematician of to-day deals with algebra; the chemist of to-day deals with alcohol and the alkalies. Algebra is the Arab al-jabr, while al-kohl and al-kali are no less purely Arabic words.

title, chikouryeh. The Greeks adopted the name they found in use in Egypt, and the Romans followed suit; we find Horace, for instance, writing of the cichorea.¹

This lady's-mantle that we have incidentally referred to—the *Alchemilla vulgaris* of the botanist—is a very attractive little plant. It is by no means showy. It will not, poppy-like, compel us to see it whether we will or no: it, in fact, needs looking for. The flowers are in clusters, small though, and of a yellowish-green, but the foliage is very richly cut, and we gladly, year after year, give it a welcome in our rock-garden. Its generic name is bestowed upon it from its association with alchemy, it being held in bygone days of potent influence, the possessor of great and mystical virtues.

The reference to possible fodder plants reminds us of our noble clumps of comfrey. The various species of Symphytum are great lovers of moisture, and the fact must be by no means overlooked if we would grow them successfully. The common comfrey—the *S. officinale*—is abundant in most country districts, growing luxuriantly by the sides of streams, and attaining to a height of some three or four feet.

¹ A striking similarity is seen in the names by which it is now known throughout Europe, it being in France chicorée, in Italy the cicorea, in Portugal chicoria, in Spain achicoria, in Germany the chicorie, in Denmark the cicorie, while the Swede calls it cikorie, the Dutchman knows it as cichorei, while even the distant Russ recognises it as the tsikorei,



ROSE-ROOT and FOXGLOVE.

To face page 212.



The leaves are very large and, when young, form a good culinary vegetable, while the flowers are of a pale dull yellow ordinarily, but with a strong inclination to vary to purple. The tuberous comfrey -S. tuberosum—has its flowers somewhat brighter in their yellow; the plant, as a whole, is very much smaller. It is rare in England, but frequent in Scotland; our plants were sent to us from Leicestershire by a brother-botanist. It is the larger of the two plants that we figure on Plate XXII. We find by experience that the soil around it must be kept very damp. When this precaution is neglected the whole plant is quickly prostrate, but, fortunately, quickly revives when its need is supplied. The second plant on the Plate is the purple comfrey-S. peregrinum—a very handsome plant, and it is this and the common species that have been utilised as fodder plants. It is a point in their favour that they will grow luxuriantly on water-logged land that is good for little else. The only objection that we personally have is that they really grow too luxuriantly, taking up overmuch room. Our plants of purple comfrey are over four feet high and some six feet round.

The common comfrey is somewhat astringent, and has for centuries unnumbered been held in high esteem as a vulnerary plant. Its generic name is from a Greek word that signifies to unite, and its popular names, comfrey, consound, knit-

back, bone-set, are all testimonies to the belief in its healing efficacy.

The following rather elaborate preparation "for strengthening and comforting of the backe" we cull from Markham's book "The English Housewife's Household physicke," 1638. "Take a leg of beefe, a handfull of Fennel roots, a handful of Parsley roots, two roots of Comphry, one pound of Raisins of the Sunne, a pound of damaske Prunes, and a quarter of a pound of dates. Put all these together, and boyle them very softe with sixe leaues of Neep, sixe leaues of Clary, twelve leaues of bittany of the wood, and a little harts tongue. When they are sod very softe take them into the same broth againe with a quart of Sacke and a penyworth of large Mace, and of this drinke at your pleasure."

In association with our comfrey plants we grow that beautiful flower the yellow iris—figured on Plate XXIII., since this, too, is a lover of abundant moisture. Like those of the snowdrop, dog-rose, and divers other plants, the buds of the iris will open in water. If, therefore, we gather a bunch of this and bring it into the house, no matter how immature some of the buds may be, they will in turn expand into blossoms, and day after day ensure us a supply of beautiful fresh flowers.

Other popular names for the plant are yellow flag, fleur-de-lys, fleur-de-luce, sword-flag, and

water segg. It is the flower of Louis, since the seventh French king of that name introduced the device known as the fleur-de-lys into the arms of France, but it is exceedingly doubtful that this was based upon the present flower. In France to-day it is the iris des marais—the iris of the marshes while in Germany it is the wasser Schwertliliethe water sword-lily. The north country name segg is from the Anglo-Saxon sæcg, a small sword. The swords, obviously, are the sharpedged and acutely pointed leaves that rise around the yellow flowers that wave their sepals, flag-like, in the breeze, while iris is a name bestowed on the genus as a whole, since one finds so rich a variety of beautiful colours in the various species that it contains.

The second plant on the Plate is that generally known as the cornflower, since it is so distinctly a dweller in the cornfields, but so, no less, are the brilliant poppy, and the equally brilliant cornmarigold, the whole forming a grand trio of intense scarlet, pure golden-yellow, and deep blue. A less attractive but perhaps more definite name for it is the corn blue-bottle, the bottle being that globular

¹ In classic mythology Iris was originally the personification of the rainbow, as Selene was of the moon, and Eos of the dawn, but she later on became the messenger of the gods to man, the rainbow being, as it were, the bridge of communication between the upper and the intermediate worlds.

mass that our illustration shows us as a base from whence the azure florets spring. It is a plant so attractive that it has been transferred by the florist to his flower-beds, by the cottager to his cottage plot, and under the influence of cultivation becomes susceptible to a certain amount of colour-change, though nothing can exceed the simple beauty of the plant as Nature grows it. It seeds itself freely, and is a particularly easy plant to establish, its masses of flowers brightening up our rock-garden with a rich blue that is a rather scarce tint in matters floral. One can get abundance of yellow, white, pink, or crimson, but blue flowers are in a decided minority and therefore to be duly appreciated.

To realise what of splendour of colour a blue flower can compass at its grandest we must turn to the gentians. On Plate XXIV. we have figured two of these. The smaller one—the Gentiana verna—is included in our British plant lists, though it is to be found in but few localities within the narrow bounds of these islands, but it is one of the commonest species in the mountain pastures of Central and Southern Europe. To see it in its beauty one must visit the Alpine meadows in early Summer and see great stretches of ground thickly studded

¹ Tusser, writing in 1573, commends amongst the "herbes for windowes and pots" and the farmer's garden, "Botles, blew, red, and tawnie."

with its brilliant stars. The centre of each flower, when we look directly down upon it, we see to be pure white. The rather leathery leaves form dense rosettes on the ground, and from these rise the numerous flower-stems, rarely more than two or three inches high, and each bearing on its summit a single flower. The plant thrives best on moist loamy or peaty soil, and we must give it abundance of water and full exposure to the sunlight.

The companion flower on our Plate is the gentianella—Gentiana acaulis: this has no claim whatever to be British; would that it had! To see this, too, in its native home we must visit the Alpine districts of Europe, though fortunately it is in England most easily cultivated. Here again the leathertextured leaves form a radical rosette. We may sometimes find it without the green dashes in the throat—a variation known as the G. a. Clusii. The flowers, too, occasionally vary to rose-colour or white, but the normal condition of intense blue is all-satisfying. Should the critic, amateur or professional, suggest that such a foreigner should find no place within the limits that we have imposed upon ourselves, we hasten to protest that all we claim is that our flowers should have pleasant associations to us, things that we have ourselves collected, or that have been the gifts of our friends of like mind with us. We have before us a florist's list of over thirty gentians, and we see in it that G. acaulis may be purchased at from sixpence to a shilling, and many of the others for sums almost or quite as moderate, but then it will be seen that for this modest sum we should buy the mere plant. Charming, undoubtedly, but carrying with it no special associations of glorious rambles or break-neck scrambles, recalling no pleasant relationship with brother enthusiasts; a mere item in an invoice.¹

Having broken the ice—and so Alpine a simile may surely be allowed to us under the circumstances—we have much pleasure in introducing to our readers the edelweiss, the subject of our twenty-fifth Plate. This, though it grows freely enough in England under cultivation, must be sought elsewhere. Despite its grand name—the noble white flower—it is quaint rather than beau-

¹ A youngster we once came across was laboriously, but very happily, making a collection of the armorial bearings of the various colleges of Oxford and Cambridge, one old friend of the family supplying him with one, and presently another with another, and so by degrees his store grew; but in an evil day some one found out that these arms could all be purchased collected together in sheets, and wellmeaningly sent him the whole set. The series was at once complete, and all enthusiasm in it died out. It turned out to be after all but a question of paying some few pence—and any one could do that-and so the old zest was gone. Instead of being cut from college correspondence, letters of Uncle Tom from Balliol, of Cousin Harry from Trinity, of the old schoolfellow gone up to Pembroke, these arms were all drilled faultlessly, soullessly, into line, and were absolutely bare of association.



MARSH ORCHIS AND TULIP.



tiful. A sprig of it in the hat or pressed between the leaves of the guide-book may be a visible sign of the owner's daring and intrepidity; but this is not necessarily so. Our first introduction to the plant was distinctly unromantic. We scaled no dizzy height, hung over no awful abyss, to gather it, but simply looked out of the window of a lodging-house at Buxton, where we had gone for a bit of a holiday, and down in the area we saw a fine potful of edelweiss on the window-sill of some washhouse or something-an experience which brings one round to the point that, while a certain sentiment has grown around the plant from its occurrence in the most awful break-neck places, it is no less true that one may gather it freely on Alpine slopes that involve no more danger than gathering roses in one's suburban garden. Each

the Alpine flora, like the little pink androsace or the glacier ranunculus. Its range is from about 5,000 to 7,000 feet above sea-level—that is, over the zone of Alpine pastures—sporadically distributed, but almost universal. For instance, I have gathered it in every important valley in Canton Valais. It formerly grew—I should fear it has been extirpated—on a rough stony slope near the Triftbach, within half an hour of Zermatt; its occurrence in the Saas Thal I have mentioned. Wherever I have seen it in the valleys to the West, this has been on slopes of coarse, stony turf, as safe as Primrose Hill. The greatest quantity that I ever saw, when it was almost abundant as cowslips in an English meadow, was on a mountain within less than an hour's walk, so far as I

year the list of deaths amongst the Alps includes some fifteen or twenty folk who slip while gathering edelweiss and other flowers. Abundant as it would appear to be in many localities, the necessity of protecting this and other plants that grow at moderate elevations from the attentions of the ubiquitous and too enthusiastic tourists has arisen, and an association for the protection of Swiss plants has been set on foot. Local authorities, by direction of the central Government, are taking steps to protect the flora from the vandalism of the thoughtless tripper and the greed of the professional flower-vendor, while the Diet of the Tyrol imposes heavy fines on any one selling

remember, from the village of San Bernadino, on that pass. No doubt there was a precipice handy on one side for any one who wished to commit suicide, but so there is on London Bridge; the edelweiss, however, was upon the other, a rough, rather bare slope, where the grass grew in tussocks on the stony ground. So far as my experience goes, that is its favourite habitat, and I must have seen thousands of plants and found it in almost every part of the Alps."—Bonney.

¹ A botanical acquaintance of ours writes anent this: "Coming down from the Faulhorn last month I passed a young lady—I am afraid she was English—with a basket and handkerchief crammed with flowers, among which I could see gentians, forget-me-nots, androsaces, and a host of other characteristic plants. Now, if one such visitor ascended the Faulhorn every day during the season and brought away a like quantity, the botany of that mountain, varied and beautiful as it still is, would soon be despoiled of its chief treasures."

the edelweiss, since in the Austrian Alps it is threatened with extinction. Since the days of our first parents it has ever been a trait in human nature to endeavour to transfer to others any blame that may be going, and we are told that wrong as these professional flower-sellers may be, they are "séduits par les guinées de John Bull, pour les expedier en masse à l'adresse de l'un ou de l'autre horticulteur Anglais."

To supply the demand a curious manufacture has sprung up whereby all trouble of collecting or rearing the edelweiss is spared. The white felt tunics of the Austrian infantry are bought up when they have served their turn in the army and cut up into suitable strips. These are skilfully compounded into a very passable simulation of the edelweiss and affixed to any plant that will pass muster and then all is pressed and dried and ready for sale to the unwary tourist. To allay any uneasy feeling on the part of our readers we hereby solemnly declare that our drawing, like all the others in our book, was made with the living plant before us. The edelweiss on Plate XXV. has never passed through any parade-ground experiences or taken part in any great military function.

Another most interesting Alpine is the soldanella —S. alpina. It is in its mountain home the first plant in the early year to pierce through the snow, Our sketch was made, we see, on February 24th.

but this was from a plant nurtured in England. Our English-grown Alpines are at a great disadvantage as compared with their untravelled England we may have a fall of relatives. In snow that will rest possibly a week or so on the ground. Then a thaw supervenes and everything is drenched with almost icy-cold water, and to this succeeds a sharp frost, and then possibly a day so mild and balmy that even though it be but January we have splendid suggestion of Spring, while in the great Alpine solitudes, instead of this constant changefulness, the soft mantle of protecting snow rests undisturbed for months until such time as it passes away finally and the flowers spring into active life. We have in mid-July in Switzerland gathered the crocus flowers of Spring, since only at last in those high altitudes had come the melting of the snows that had enwrapped them through their lengthy winter rest.

Another charming plant to grow bears a most unpoetic name, being popularly known as Grim the Collier. The colour of the flowers, a rich orange-red, is unusual and in itself suffices to attract attention. It would appear to be an easy plant to grow; at all events with us it springs up in profusion, its down-covered seeds floating freely in the breeze and readily establishing themselves, while it also throws out creeping stems from the parent plant. It is alternatively known as the

orange hawkweed, or, botanically, the Hieracium aurantiacum. The plant is a native of the mountain ranges of Southern Europe, but it has long been cultivated in England and occasionally escapes. It thus finds its way into the British flora, though its position on our plant lists is a very precarious one and somewhat grudged. The hairs upon the involucre and stem are, on examination, seen to be black at their base-hence the origin of its popular name. "The stalkes and cups of the floures," Gerard notes, "are all set thicke with a blackish downe or hairinesse as it were the dust of coles; whence the women, who keep it in gardens for noueltie sake, have named it Grim the Colliar." In the reign of Queen Elizabeth of glorious memory a very popular comedy was entitled "Grimm the Collier of Croydon," and this grimy hero of the populace evidently stood godfather to our plant.

Parenthetically one may remark how great was the blessing when the system of botanical nomenclature formulated by Linneus became established, each plant then receiving two names and no more. One, the generic, placed first, assigned the position of the plant in a group of more or less similar plants, while the second, the specific, individualised it from the other members of its genus. Previous to this the names given were most unwieldy in character, our present flower, for instance, being

the Hieracium latifolium peregrinum phlomoides of one old herbalist, the Hieracium hortense floribus atropurpur ascentibus of another.

We have in England a goodly number of hawkweeds, most of which may well find a corner in our rock-garden, varying as the flowers do in colour from deep orange to pale lemon-yellow. On Plate XLVII, we have an illustration of one of the still more numerous hawkweeds of Switzerland. the Hieracium intybaceum. Its companion plant is the dame's violet, the Hesperis matronalis. The popular title is wholly a misnomer; the flower has nothing violaceous about it, but stands revealed a most obvious crucifer. It may be found in hilly pastures in several localities in Britain, but is probably almost always as an escape from cultivation. It is flowering during May, June, and July, and forms in the rock-garden a rather diffuse mass, spreading freely, but of no great height. The flowers, often lilac, as our illustration shows, are sometimes white, with more or less of the lilac streaking them in erratic apple-blossom fashion.

They are both North American species. The Claytonia perfoliata, figured on the right-hand side of Plate XXVIII., is a particularly inconspicuous plant, but quaint withal. It derives its generic name from one Clayton, an American botanist, while its specific name bears witness to the per-



FLAX-LEAVED GOLDILOCKS and PERENNIAL FLAX.



foliate character that is so striking, the stems appearing to grow through the leaf. The plant may now be found in various parts of the country, our own specimens being derived from Richmond Park.

The other Claytonia, figured on Plate XXIX., is the C. sibirica, and this, too, is getting gradually naturalised in Britain, though only just finding recognition in our text-books. This, therefore, is distinctly an interesting thing to possess, and we have given ourselves the felicity of sending seedlings of it to brother plant-lovers in Surrey, Sussex, Essex, Wiltshire, Nottinghamshire, Yorkshire, Somersetshire, Staffordshire, and elsewhere. It seeds very freely, the position of a last year's plant being this year indicated by a dense mass of young successors, so that one has abundant means of doing a little pleasant distribution amongst one's friends. As an American plant it has, of course, long been known. It is included by Linneus in his "Species Plantarum," issued in 1753. It is referred to in the "Hortus Kewensis" of 1811, and may be found figured in the "Botanical Magazine" of Curtis in the year 1821. The plant

[&]quot; "Or Flower Garden displayed, in which the most ornamental Foreign Plants cultivated in the Open Ground, the Green House and the Stove, are accurately represented in their natural Colours. A work intended for the use of such Ladies, Gentlemen, and Gardeners as wish to become scientifically acquainted with the Plants they cultivate,"

seems to have been first noticed in a wild condition in Britain by Sir Joseph Paxton in 1837, who found it in a large plantation near Chatsworth. It may sometimes in plant lists be met with as *C. alsinoides*, but the specific name, *sibirica*, has the priority and is therefore now accepted. The flowers occasionally vary to white. Each plant forms a large clump and tells to the eye as a mass of pink, star-like blossoms. When the young seedlings are once pricked out the plant gives no more trouble. It is bound to grow.

Harking back awhile to Plate XXVII., we find that not only does it yield us an illustration of the bistort—a plant that we have already referred to—but that this bistort is flanked on either side by a companion blossom. The larger of these is the *Ononis fruticosa*, the crimson restharrow. The common restharrow has its flowers of a pale pink and is worth cultivation, but the present plant is richer in tint. Some authorities tell us that the name should be given as wrest-harrow, declaring that the tough branches and compact growth of the plant wrest the harrow aside, while the advocates of the common form of the word

¹ It may seem strange that a plant so generally recognised as North American should be ascribed to Siberia, but the plant is no less at home in Northern Russia. Linneus, who called it *sibirica*, was, we must remember, a Swede, and at least as likely in 1753 to receive plants from Russia as from America.

assert that this hindering does no more than cause a temporary delay, or rest. It is a point scarcely worth contesting. An alternative old country name is stay-plough.

No rock-garden can afford to ignore the charm that a liberal sprinkling of bell-flowers imparts. The species of campanula available are very numerous and vary in colour from pure white to pale or dark blue, lilac or deep purple, but are ever graceful and desirable. If we limit ourselves to British species what can possibly be more charming than a tuft of Campanula rotundifolia, the graceful harebell? The clustered bell-flower, C. glomerata, with its mass of terminal flowers, or the creeping bell-flower, C. rapunculoides, with its long line of pendent flowers, are equally desirable denizens of one's garden, while the graceful little ivy-leaved campanula, C. hederacea, is especially charming. The harebell and the clustered bellflower are at home on dry hill pasturage and roadside banks; the creeping bell-flower prefers a damper and shadier situation, while the ivyleaved campanula asks for yet greater moisture, and if we would grow these various plants successfully these preferences of theirs must be carefully considered.

We recall with a shudder how our gardener once pointed to our noble tufts of harebells and remarked, "I've often wondered nobody has ever thought of improvin' 'em!" The harebell emphatically stands in need of no such extraneous help. If one dreamt some night that Messrs. Meddle and Muddle, unlimited, the eminent florists, had brought out an improved harebell, the flowers thrice as large as those of the wildling, erect instead of drooping, double and frilled at the edges, of all shades of colour and growing compactly on a two-foot stem, with what a sigh of relief should we wake to find that the Campanula rotundifolia versicolor grandiflora splendens was but a bygone terror of the night, that the delightful little harebell still remained to us, fresh as ever in its delicate beauty.

The creeping bell-flower, from those same creeping qualities that the popular name emphasises, grows with us almost too successfully, and it becomes necessary to presently give it a gentle hint that it is overdoing it. Like most of its genus, its flowers vary sometimes to white. It is one of the larger specimens, reaching a height sometimes of two feet. Many of the campanulas, and especially the Alpines, form more or less dense, low-lying tufts from whence spring in profusion the masses of tender blossom.

The very delicate little bell-flower that we figure on Plate XXVII., though it grows readily in English rock-gardens, is one of these Alpines, and may be found freely enough on rocks, old walls, and elsewhere in Switzerland, alike on the Alps and on the plains. From the closely tufted rosettes of foliage rise the stems, each bearing three to six flowers. It is the *Campanula pusilla*, and a very near relative to our English harebell. It is the C. gracilis of some of the older writers, and no name could more accurately describe it. The whole plant is ordinarily but about three inches high.¹

When we once stray away from our native flora a wealth of campanulas is at our service. In a gardener's list before us we find seventy-nine species set forth. Those who care, therefore, to do so can at once, by means of a small cheque and a trowel set themselves up abundantly in the item of bell-flowers. We ourselves name and illustrate but two more of these, as it is our hobby not so much to write cheques as to accumulate those plants that we have ourselves dug up or collected the seeds of, in Britain or anywhere else, or that by gift or kindly exchange come to us, bearing with them pleasant memories of those friends from whom they came.

The Campanula pulla that figures on Plate XXX. comes under the latter condition of our preceding paragraph, carrying with it happy thoughts of the

¹ The specific name *pusilla* is bestowed on the plant from its small size. In France it is for the same reason the petite campanule or campanule naine.

source from whence it was derived, the kindly donor from whose noble rock-garden it came, and our never-to-be-forgotten rambles in flower-decked Switzerland. Not being a British plant, we can but give it its botanical name. The specific title is Latin in its origin and signifies dark-coloured, a title that the deep purple-blue of its blossoms entirely justifies. When in full bloom it tells out splendidly as a colourmass, and when seen in large groups the general effect is charming. The stems always bear but one flower, a terminal bell that is more or less pendent. In Switzerland, or wherever else on the Alpine range we find it, it is always partial to damp situations, and flowering from June to September. Our own drawing we see, on reference to our diary, was made on June 21st, when the plant was well in blossom. It spreads rather freely in soft soil, throwing up numerous flowering stems, but one pauses long before grudging it any claims it may make on our hospitality.1 Our remaining campanula is the C. Raineri, a very charming and decidedly rare Swiss bell-flower. Its vigorous upstanding and broadly-open flowers and their richness of colour are striking features. It is the left-hand flower in the group on Plate XXXI.

The numerous kinds of dianthus are no less ac-

¹ The C. rhomboidalis is another very common Swiss plant; one finds it in profusion on the mountain slopes throughout the summer. It is figured on Plate XLVIII.



HARE'S EAR and PEARLY CUDWEED.

To face page 230.



ceptable to the rock-gardenist than the campanulas, the one supplying us with as charming tufts of foliage crowned by their pink flowers as the other do of varying tints of blue. The contrast between the grey foliage and the delicate pink or rich crimson of the blossoms is an additional charm. The first of these pinks that we describe and figure will be found occupying the central position in our group on Plate XXXI. The botanist knows it as the Dianthus deltoides, while in popular parlance it is the maiden pink, or meadow pink. One might readily build up a pretty theory that its slender growth and dainty grace have been the obvious reasons of its association in name with fair maidens, but stern etymologists demur, and tell us that the first popular name we quote is but a corruption of the second. We nowadays rarely use either the words maid or mead, but our forefathers, from whom these plant-names descend, we know freely used both, and so by some hocus-pocus, mead and maid become interchangeable, and so maid pink and mead pink, maiden pink and meadow pink are all one. This may be as correct as it is prosaic, but for ourselves we shall revert to the more poetic theory. The botanical name,

¹ The critical judgment of commentators is at times at fault, while their explanations, though learned and ingenious, fail on occasions to explain. As an illustration we may quote the example of the critic who, on reading "As You Like It," saw at once that Shakespeare had got his ideas a little mixed when he wrote—

dianthus, implies no less than that the pinks were from their beauty specially dedicated to great Jove himself, and were the prime floral favourites of Olympus, the special adornment of the rock-gardens of the Elysian Fields. Charming as these flowers are, one feels that it is really setting too high a value on them when one recalls the graceful lily, the fragrant rose, and many another floral beauty. It is not quite a case of the pink being supreme beyond compare. The name was bestowed by Linneus, and when we consider the hundreds of plants to which he stood godfather it would be hypercritical to require that all their names should be above criticism. Some folk have even gone so far as to declare that a meaningless name is even better than one carrying some sort of more

"And this our life, exempt from public haunt,
Finds tongues in trees, books in the running brooks,
Sermons in stones, and good in everything."

It was evident that it was absurd to look for books in a brook; in such a position the driest volume would succumb and fall to pieces; while no one could get sermons into stones or out of them. After pondering the matter light dawned, and the thoughtful critic cleared all up by the new reading—

"And this our life, exempt from public haunt, Finds stones in the running brooks, Sermons in books, and good in everything."

In spite of this happy blend of erudition and inspiration men have been found so conservative as still to prefer the older reading! or less cogent significance. All that is wanted, they declare, is a distinctive title, and so then Trianthus or Antrithus would be equally acceptable.

The maiden pink is a perennial; when we have once started it, if we have reasonably good fortune, we shall find it springing up year after year. The leaves form a tuft from which the flowering stems ascend. Unlike most pinks the flowers are scentless, occurring either singly or in pairs. It is a plant of the dry banks throughout much of Europe and Western Asia, and is generally distributed over Britain, though in many localities it is unknown. It occasionally varies to white flowers.

The Dianthus casius, or Cheddar pink, figured by us on Plate XXXII., has noble flowers of a rosyred tint, and of fragrant odour. The lower leaves are thickly crowded together, glaucous in tint, and only an inch or so in length, while the flower-stems may be anything from five inches to a foot, the latter, however, being an unusual length. The stems often bear but a single flower, but at times, as in our example, throw out laterals. The plant is found, and that but very locally, on limestone rocks and old stone walls, in South, West, and Central Europe, while in England we have, in its truly wild state, but one station for it—the magnificent mass of limestone of the Cheddar cliffs in Somersetshire. Names implying geographical distribution, as a rule, are not very happy. Few plants or insects, such as

the Camberwell beauty or the Bath white of the entomologist, are so very local as to bear assigning to a special district. In many cases the earlier botanists or entomologists bestowed the name from the place where the species first appeared, but the lapse of time soon renders such a limitation of area in most cases ludicrously inappropriate, though the name often gains a certain historic interest thereby. The case of the Cheddar pink does not come within this criticism: the name is absolutely beyond cavil.

On visiting Cheddar one is waylaid by importunate folk desiring to sell to the visitor roots of this pink, and the thought will no doubt cross the reader's mind that such a proceeding must necessarily end in the total destruction of the plant; but a contemplation of these grand cliffs, in many parts entirely inaccessible, brings comfort on that score. The extensive sale is nevertheless greatly to be regretted, and we may say, in self-defence, that our plants did not come from Cheddar at all. Such plants, bought often by cheap-trippers and one-day excursionists, as something to take from Cheddar, in the same way that, for some occult reason, they drag home mugs from Margate, are almost certainly doomed to perish. I

¹ There is evidently room there, and by no means there alone, for a local branch of Ruskin's Society of St. George, one of the rules of this Guild being "I will not hurt or kill any living creature needlessly, nor destroy any beautiful

Nature-lovers, fearful of the gradual extinction of the Cheddar pink, in view of this relentless uprooting, and the extensive blasting and quarrying that are gradually reducing the available area, have successfully intoduced it into other localities. Even away up in far Stirlingshire, some five hundred feet above the sea, we know of a locality where seeds sent from Cheddar have germinated in the crannies of an old stone wall, and have taken most kindly to their new home. At Castle Cary, Shepton Mallet, Bath, and elsewhere the same thing has happened, so that even if the Cheddar pink should presently disappear from its original locality, we may fairly hope that it will not thereby be wholly lost to Britain.

The Cheddar pink was, we find, referred to by Ray in the year 1680, and from time to time afterwards by other writers. Hudson, in his "Flora Anglica," published in 1762, calls it the *Dianthus glaucus*—a name suggested by the grey-green of its foliage, and its popular names in France, Belgium, Switzerland, and Germany are all based upon observation of this glaucous tint.

The right-hand flower on the following Plate, XXXIII., is the *Dianthus neglectus* of science. Its popular name, the glacier pink, sufficiently indicates to us that we have again a souvenir of glorious days thing, but will strive to save and comfort all gentle life, and guard and perfect all natural beauty upon earth."

amongst the mountains, and that our plant has no claim to a place in our English flora. Indications of glacial action may be found clearly enough with crossing the Channel, but our glaciers have departed, and with them, very possibly, *D. neglectus*. This pink has the usual dianthus character, the leaves, glaucous in tint, in tufts close to the ground—looking like short, wiry grass—and rising from this compact mass the slender, flower-bearing stems.

The petals of the glacier pink have a firmer character than we ordinarily find in this genus, and, while a brilliant rose-colour above, are of a creamy-white beneath. When seen in masses, the effect of the rosy, star-like blossoms rising in profusion from the midst of the grey-green leaves is charming. Its fellow-plant on the Plate is the Cerastium gibraltaicum—an attractive little foreigner to which our figure does but scant justice, as here, again, the real effectiveness of the plant is brought out when we have a considerable tuft of its silvergrey foliage and pure white flowers in the midst of the surrounding verdure. It is rather specially choice as, though cerastiums of one species or another are common enough in England and elsewhere, this particular species appears thus far to have only been found on the great mass of Nature's rock-work from whence it takes its specific name.

The fool's parsley—the Æthusa Cynapium—will



APPLE.



probably spring up whether we will or no, as it is a plant essentially delighting in cultivated ground. Personally we encourage it, as it is very graceful in its growth; but it must be borne in mind that it is one of our poisonous species. Even if we do not hang the dog with a bad name, it is at least well to keep him under observation. The fool's parsley is so called, with that simple directness which characterises so many of the old plant-names, from a belief that no one but a person to whom the disparaging epithet would fully apply could be so wanting in sense as to mistake it for the true parsley. The resemblance between the real and the counterfeit is, however, closer than in many plants that bear names suggesting resemblance, while the fact that the æthusa is particularly prone to springing up in cultivated land, possibly in close proximity to one's patch of parsley, makes it evidently a more dangerous plant than one which, however similar it might be to some culinary herb, was never found except in woods or wild moorlands.

The fruit and flowers of the fool's parsley are borne in little clusters, while the stems that bear these little bunches are themselves in like manner united in one point, like the ribs of an open and inverted umbrella. Where the secondary clusters of stems are given off three sharp and narrow leaf-like forms are seen pendent, and this marked feature not only distinguishes at once the plant

from the true parsley, but from all the other numerous species in the large order of plants, including the garden parsley, celery, carrot, fennel, samphire, parsnip, and hemlock, to which it, by botanical affinity, belongs. The foliage, too, of the fool's parsley is very glossy and of a dull bluish-green, while that of the true parsley is of a bright, clear green. When the leaves of the genuine parsley are rubbed or bruised they give out the fragrant odour with which we are all familiar; but the leaves of the wild plant emit an unpleasant smell when crushed, so that it seems in every way impossible for a cook who had ordinary eyesight or a reasonably good nose to chop up one plant for the other. We may with good conscience allow our æthusa to remain, for whatever of arrant carelessness of selection might happen in the kitchen garden, it is scarcely likely that the cook would visit the master's pet rockery and scramble over it in search of culinary herbs.

The name æthusa is derived from the Greek word signifying to burn, a name bestowed on our plant from its acrid nature, while the specific name, also Greek in its origin, means dog's parsley, an old equivalent of the modern popular name, and implying its inferiority to the real thing. Thus in another case we get the name dog-violet, a title

² Parkinson, in his "Theatrum Botanicum," calls the æthusa "The Foolish Hemlocke or Counterfet Parsley."

bestowed on a species that somewhat resembles the sweetly scented violet, but lacks its fragrance. In much the same way we find the names cow-parsnip, hog's fennel, horse-mint, bestowed on plants that somewhat resemble fennel, mint, or parsnip in some way or other, but are larger, coarser, or less useful than the plants they are named after.

We must not, however, too hastily assume that the use of the name of an animal of necessity implies inferiority in some way; for the cat-mint, for example, is not so called from any invidious comparison with the garden mint, but because cats were believed to be so fond of it, while the name sowthistle is a corruption of sprout-thistle, and points to a time when its tender shoots were an article of diet. A considerable amount of doubt has arisen as to the meaning of dog-rose: one botanical writer boldly affirms that the flower is so-called from its want of scent and beauty; but this is an atrocious libel on one of the most delicately fragrant and most graceful of plants. Pliny, centuries ago, called the plant the dog-rose in distinct allusion to the belief of his day in the efficacy of the plant in curing the bite of a mad dog. Dagge, the old English word for a prickle, has been pressed into the service, and we are invited to see in dog-rose evident and appropriate reference to the decidedly prickly nature of the shrub.



CHAPTER IX

Hemlock—Its medicinal service—Mediæval writers great plagiarists—Alexanders—Coles' "Art of Simpling"—Gout-weed—Herb Gerard—Plant-names based on supposed medical virtues—Herb Christopher—Rose-root—Foxglove—Plant-names based on colour—The mullein—House-leek—The flora of an old thatched roof—Marsh orchis — Wild tulip — The musk mallow and field mallow—Milfoil, or yarrow—Sneezewort—Other plants of the genus—Tansy—Tansy pudding—Cogan's "Haven of Health"—Wormwood—Honesty—The yellow and white melilots—Cockle—The corn marigold—Feverfew—The red and white campions—Flax-leaved goldilocks—Flax.

I T is, perhaps, unfortunate that such interesting plants as the dwale, henbane, foxglove, thornapple, and the fool's parsley should be poisonous, as thereby a prejudice is aroused against them. Hemlock is no less interesting, and no less in jeopardy of expulsion by most folk from any of their surroundings. It is a fine thing when well grown, and belongs to the same great botanical order as our last plant. Our umbelliferous plants are very numerous, and have a sufficient general similarity

16

24

to make them puzzling to identify; but, as the fool's parsley has its three pendent bracts that serve to differentiate it from its fellows, so the hemlock has, as its distinction, its spotted stem, a series of numerous irregular blotches of dull purple hue on the general green ground.

The name hemlock descends to us from Anglo-Saxon days, heam or healm being in Anglo-Saxon the word for straw, while leac¹ is a general name for a plant; the name was given to the plant from its hollow stems. Gerard and other old writers often spell the word as humlocke,² but this is but one vagary the more in the excessively free treatment that we find in almost all old spelling.

Our forefathers believed in the remedial value of the hemlock, though, considering that they believed in the remedial qualities of almost everything else with an equal sincerity, it is not so high a testimonial to the hemlock as would at first appear. "The leaves bruised and laid to the brow are good for their eyes that are red or swollen; as also to take a web growing in the eye: this is a tried medicine. Take a small handful of this herb, and

Thus Garlic, Anglo-Saxon gar a spear, and leac a plant, or house-leek, the leac that we so often find growing on old walls and cottage roofs in the country.

² "But cursed speaking set out in the image of godlynes, what is it elles than the poison of humlock myxed with wyne? So that the venome is more presently strong in that it is myngled with a most holsome matter."—UDALL.



SEA BUCKTHORN.

To face page 242.



half as much baysalt, beaten together and applied to the contrary wrist of the hand for twenty-four hours doth remove it in twice dressing. The "it," of course, is not the other hand; one rarely feels the need of parting with that! It is the membrane's growth on the eye that has to go. "If the root of hemlock be roasted under the embers, wrapped in double wet paper until it be soft and tender, and then applied to the gout in the hands or fingers, it will quickly help this evil." A quaint remedy "for the Head Ach" is "to take green Hemloc that is tender and put it in your Socks so that it may lie thinly between them and the Soles of your Feet." This is to be changed every twenty-four hours, though we should ourselves hope that the aching head would be a thing of the past long before even one of these somewhat lengthy periods had passed.

In the Middle Ages an anæsthetic, centuries before the days of chloroform, was highly commended. A mixture was compounded of black nightshade, henbane, hemlock, and some other ingredients, by no means forgetting the gall of a swine and a goodly quantity of vinegar. Then, the surgeon being ready, "let him that shall be cut sit near a good fire and make him drink thereof till he will fall on sleep, and then men may safely cut him, and when he hath been served fully, and thou wilt have him to awake, take vinegar and salts and wash well his temples and cheeks, and he shall soon awake."

One can only hope that this restoration to consciousness was as much a matter of course as the old writer suggests: the whole thing seems to us perilously near to manslaughter. Even so early as the days of Pliny (and they were very early days indeed—one must go back over nineteen hundred years to arrive at them) divers herbs were commended "to be given before incisions or punctures are made in the body in order to ensure insensibility to the patient." Drayton, in his "Quest of Cynthia," calls the hemlock "the poisonedst weed that grows."

The mediæval herbalists all quote from Dioscorides the tale that "if asses do eate much of Hemlockes they wyll be cast thereby into a deepe and dead sleepe, that they wyll seeme to be dead. Which hath deceyued the countrey men being ignorant thereof: for as they have bene fleying of theyr skynes (thynking that they were dead) the sely asses have sturred and wakened out of their sleepe: to the great terror of them that did flea

¹ Coles, in his quaint "Art of Simpling," issued in the year 1656, writes: "I find no word for a weed, either in Latin or Greek, yet because it is so common a word in England, I make that a kinde, and thereof are Chickweed, Horehound, Archangell, Cleavers, Groundsell, Nettles, Hemlock, Bindweed, Poppy, &c. This is a division (I confesse) I never met with in any Author, and some faults haply may be found in it, but herein you may perceive that I endeavour (as much as I can) to condescend to capacities of the vulgar, whose good I heartily wish."

them or cut of their skyns, and to the great laughing of them that dyd behold them." There is a tradition that no one has ever seen a dead donkey, and these unknown yokels of some unidentified country were entirely unsuccessful in their quest. That the asses should be held "sely" for objecting to be skinned alive seems a rather severe judgment upon them. All these old writers crib from each other and from the ancients. The tale as we give it is from Lupton, but even so sane a writer as Parkinson tells how that "asses by chance eating of the herbe did fall into so deepe a sleepe that they seemed dead, which when some came to flay them they flang from them in the doing it, to their amasement and merriment." It is really, therefore, scarcely worth while in many cases to quote one's authority, as the same recipes or marvels are found in a dozen writers, each man, unless quoting from Pliny or other venerable writer, telling the matter in his own words, to salve his conscience, and to escape, if it may be, a charge of plagiarism. It is needless to quote as from A or from Z when all the intermediate letters of the alphabet no less reproduce the same material dished up in a slightly different way.

The Alexanders—the *Smyrnium Olusatrum* of the botanist, and a near relative of the hemlock—is a noble growth that we may include in our floral belongings. It is of sturdy habit, attaining to a

height of some four feet, with broad leaves and several noble heads of yellowish-green flowers. is a plant of the waste grounds, and is often, no doubt, an escape or survival, as in mediæval days it was largely cultivated, and hence one finds it still amongst the ruins of old monastic buildings and in the neighbourhood of houses. It seems, too, to have a partiality for the neighbourhood of the sea. From its black seeds and esculent value it was known to the old herbalists as black pot-herb, and its specific name olusatrum is identical in significance. The English name is a somewhat curious one, as its terminal letter gives it what one may call a plural look. One could accept Alexander 1 as a much more likely-looking plant-name. We do not, for example, speak of a foxgloves or a thistles. Some tell us that the name is a corruption of Olus astrum, the monkish name, while others hitch on a theory that it is so called because the plant was supposed to have originally come, to suit this explanation, from Alexandria, while yet others would instruct us that it owes its name to the great medicinal benefit derived from the use of the plant by Alexander the Great. The plant is thus Alexander's herb. In other words nobody knows, and so we may all start any so-called explanation we please.

Like many plants utilised by our forefathers it has

¹ Cotgrave we note calls the plant "Alexandre, the hearb great parsley," though he also gives the name as Alisaunders

passed out of use, other things more palatable having been introduced. The young shoots were eaten raw, celery fashion, or were cooked as we now serve sea-kale, or became a flavouring ingredient in soups and stews. In Tusser's "Fiue Hundred Pointes of Good Husbandrie" we find it amongst "the herbes and rootes for sallets and sauce" that the good housewife will be careful to rear in her garden plot, in company with "cresies, lettice, endiue, spinage," and other useful herbs. Parkinson, writing in 1629, before the plant had passed out of use, declares that "our Alexanders are much used to make broth with the upper part of the roote, which is the tenderest part, and the leaves being boiled together. Some eate them either raw with some vinegar, or stew them and so eat them, and this chiefly in the time of Lent, to helpe to digest the viscous humours that are gathered by the much use of fish at that time." A further great recommendation of the plant to our ancestors, who seem to have been always in a mortal fear of meeting toads, shrew mice, serpents, dragons, and such-like perils of the country, is that "the seedes if they be boyled in wine, or taken in wine, are effectuall against the bitings of serpents."

The goutweed—Plate XXXIV.—another umbelliferous plant, is one that, graceful as its verdant

The plant was earthed up, as celery is blanched for the market.

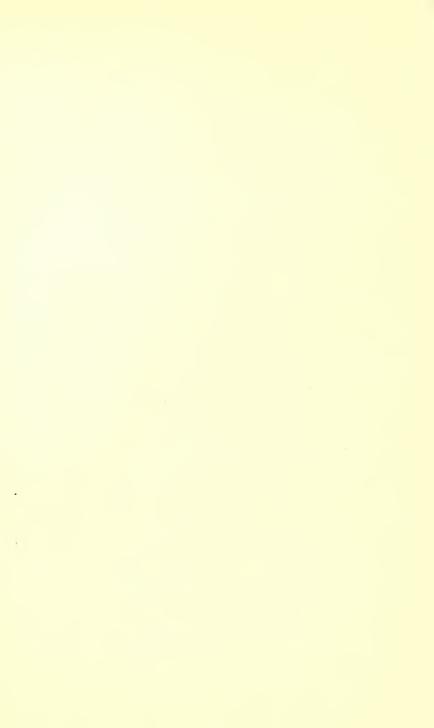
foliage is, we must be rather chary of admitting. When one gets a rather dark, damp corner of one's rock-garden thickly clothed with its foliage the effect is very charming, but when the long and freely creeping root-stocks begin to encroach outside this they are exceedingly difficult either to keep in order or to extirpate. It is, in short, quite possible to have too much of a good thing. "The roote runneth and creepeth like Quick in the ground, some occupying a great deale of roome. It groweth by hedges and wall-sides, and often times in gardens also, if it be not rid and weeded out." The plant was long cultivated for medicinal purposes, and it is probably not truly indigenous. Even to-day, when its medical utility is a thing of the past, it is still almost exclusively about houses and gardens that it may be met with. "Goutwort had not his name given as it seemeth at randome, but upon good experience to helpe the cold Goute and Sciatica, as also joynt aches and other cold griefes." The root was the part employed, and as St. Gerard was invoked by the gouty in their distress another old name of the plant is the herb Gerard. The leaves are in some parts of the Continent eaten as a vegetable, and especially in the Spring.

Such names as goutweed, wormwood, pilewort, sneezewort, all-heal, woundwort, indicate clearly the reputed virtues of these various plants, while fever-few, heartsease, eyebright, and the old monkish



IBERIS SEMPERVIVENS and ACHILLEA RUPESTRIS.

To face page 248.



name of the cowslip, the herb-paralysis, also tell their story clearly enough. The eyebright was also called the euphrasy, and we meet with an interesting reference to the old belief in the efficacy of the plant in the lines of Milton—

"Michael from Adam's eyes the film removed, Which the false fruit, that promised clearer sight, Had bred: then purged with euphrasy and rue The visual nerve, for he had much to see."

The Angelica was so called by the monks in mediæval days, their belief in its valuable medical properties being sufficiently powerful to cause them to regard it as an angelic gift to suffering mankind. The tutsan is a corruption of *toute saine*, and the herb-bennet, or avens, originally was the herba benedicta, or blessed herb. The reseda, or mignonette, was so-called originally by Pliny from its supposed soothing qualities, the Latin verb *resedo*

It has no reputation in the present day for possessing any healing power, but in the Middle Ages belief in it seems to have stood even the test of experiment. An old writer, for instance, commends it as "a singular remedie against poison, and against the plague, and all infection taken by euill and corrup aire; if you do but take a peece of the root and holde it in your mouth it doth most certainly driue away the pestilentiall aire, yea, although that corrup aire have possessed the hart yet it driueth it out againe. The root is auailable against witchcrafts and inchantments if a man carrie the same about with him. It cureth the bitings of mad dogs and all other venemous beasts."

signifying I calm, and in like manner squinancywort is based on the Greek word *cynanche*, signifying quinsy, this plant being held to be a specific for that disease.

The reference to herb Gerard suggests another plant having a no less saintly ascription 1 to which we gladly give welcome in our garden—the herb Christopher. Its leaves are very richly cut, and the stems, some one to two feet high, bear terminal racemes of small yellowish-white flowers. These are succeeded by little berries that are nearly black in colour. "It's thought to be of a venimous and deadly quality," says Lovell in 1665, but on venturing to taste the berries he declares that "by taste they seem not pernicious." It is a very local plant, and only found in the northern counties of England, but down south it flourishes happily enough with us, within a shilling return ticket to the heart of the Metropolis and back, and forms a very acceptable member of our floral fraternity.

The seeds are undoubtedly poisonous, as Lovell would have found if he had indulged in much more than a taste, and entirely justify the popular name, baneberry. How the baneberry got to be associated

There are many others, we need scarcely say, as the St. John's wort, and the cowslip, or herb Peter, the pendent flowers of the latter being held suggestive of a bunch of keys. The keys of the great Apostle are, however, when depicted in religious art always but two in number.

with St. Christopher it is impossible now to say. Curiously enough, it has several rivals in the field, the fleabane, meadow-sweet, betony, and one or two other plants being also dedicated to this very popular saint.

The plants we next figure—those on Plate XXXV.—are the rose-root and the foxglove, each of them charming plants in the decking of our rock-garden. It is, perhaps, scarcely necessary to indicate which is which, since few who feel sufficient interest in Nature to turn over our pages can require an introduction to the foxglove, and from thence they can travel from the known to the unknown, should the rarer rose-root not appeal so quickly to them.

The rose-root should be sought amidst the mountain crags of Scotland and Northern England, where it may often be found in profusion. Its grey and succulent foliage give the plant a very distinctive character. It is a lover of moisture—a point we must not overlook in transferring it from its mountain environment to our rock-garden. The root is large and woody in character, yielding when dried a strong odour that has been compared to that of roses: hence its popular name. It is a near relative to the house-leek, the beautiful crimson-flowered orpine, and the numerous species of stone-crop, all alike acceptable plants. Its old monkish name was Rhodia radix, while its modern specific name is rhodiola, each name testifying to the rose-like fragrance.

No flower makes a grander show in the rockgarden than the graceful foxglove, and one can scarcely have too many of them, since they make a noble background to the smaller things, towering some five or six feet above them in long columns of crimson or white. Botanically the plant is the Digitalis purpurea, but the flowers are much more crimson than purple, while its frequent variation to white makes the specific name a by no means happy one. Names derived from colours are often somewhat unsatisfactory, as nothing, perhaps, in a plant is more subject to variation. In the midst of a large patch of bluebells one may find that contradiction of terms a white bluebell, while in our gardens the various colours in our chrysanthemums make their name entirely inappropriate when we bestow a thought upon it, derived as it is from the two Greek words signifying golden and flower. Rose in like manner implies a red flower. A moment's reflection will show that in speaking of yellow roses, white lilac, white violets, pink chrysanthemums, we use terms that are really contradictory. The crimson orpine of our hedgerows derives its name from the Latin auripigmentum, golden colour, the name having got somehow transferred from a species where it was entirely appropriate to one where it is wholly misleading.

The foxglove has for centuries been held in medicinal repute, and, despite its charming attrac-

tiveness, is a dangerous thing to experiment with. The active principle, called digitaline, is found in the leaves. It is very potent; one grain dissolved in water will kill a rabbit within five minutes, and a dose administered to the human subject will often bring the pulse down from a hundred and twenty beats a minute to much less than half this. The leaves are gathered when the plant is flowering and gradually dried, and the medical infusion is produced by steeping thirty grains of these dried leaves in half a pint of boiling water for an hour or so, and then straining off. In a case of poisoning the patient becomes dizzy, staggers helplessly, becomes unconscious, and may very possibly never rally; but the best antidote is the immediate and free use of stimulants. Its great medicinal value is in diminishing the action of the heart and acting as a sedative, but it is manifest that it should only be administered by a qualified and experienced practitioner. In any case it is a rather dangerous remedy, unless very carefully dealt with, as its action is very frequently what the doctors term cumulative; that is to say, a number of small doses may be given with apparently very little effect, and then the whole will act suddenly upon the system at once and produce very alarming symptoms. It is therefore evidently not a plant for rural herb doctors or amateurs to meddle with.

In olden times the artist was his own colour-

grinder and the doctor collected his own herbs, but in these latter days the painter looks to others and gets wonderful chemical pigments much more brilliant, and some of them at least much less permanent than those used by the artists of old, while the doctor, far too busy to leave his round of patients for a day's botanising, trusts to others to collect the necessary raw material of the materia medica, the result having been known to have sometimes been a very considerable adulteration by the admixture with the foxglove leaves of those of the mullein and comfrey, equally common plants. While, however, these latter fill the collector's bag as rapidly as those of the foxglove we need scarcely declare that this is almost as reprehensible a proceeding as any going, since it is most important that all drugs should have a recognised and standard strength, and an infusion made from these spurious leaves intermixed with those of the true plant would necessarily be much less powerful and reliable. This would lead to an increase in the dose, when the medical man found that the first administration was producing no effect, and if this next preparation were produced from an unadulterated sample the infusion would be much more potent than it was at all supposed to be.

As the aim of our readers will rather be the growing of these plants for their beauty than for their medicinal virtues, the relative strengths of



BUCK'S HORN PLANTAIN.



these infusions will scarcely become a matter for much consideration, but we trust that—though not for the purposes of adulteration—they will, like ourselves, make room in their pleasaunce not only for the lordly foxglove, but extend a welcome to the scarcely less lordly mullein, and find suitable space, the damper in reason the better, for the comfrey too. The foxglove is a biennial, but when it has once established itself it seeds so freely, that there is little fear of our losing it.

Some half-dozen species of mullein are found wild in Britain, and all of them repay search and cultivation, but the finest, as well as the commonest, is the great mullein. This grows to some four feet in height, throwing up, like the foxglove, one noble, principal stem, which may or may not—and ordinarily the latter—have small lateral stems. This central stem attains to some four feet in height, and is clothed profusely with soft, grey hairs. The leaves, decurrent for some distance down the stem, are also conspicuously woolly, so that the whole plant has a soft, flannel-like look, which gives it a special individuality amongst other growths. The golden flowers form a charming contrast to their grey setting. This, too, is a biennial.

¹ Those who care to put themselves in the hands of the gardener may obtain several interesting cultivated mulleins, as, for instance, the Verbascum phæniceum, a plant bearing purple flowers having a considerable variation of tint.

The rose-root depicted on our last Plate—XXXV. -reminds us that we may not unfrequently meet, on old walls and cottage roofs, with the great fleshy leaf-rosettes of the house-leek, an allied plant. It is in reality a native of the great mountainous districts of Southern and Central Europe, but, as an introduced plant, has taken kindly to these northern isles. From the midst of the mass of succulent foliage rise the flower-stems, headed by their groups of pink and star-shaped blossoms. The generic name, Sempervivum, points to the abundant vitality of the plant under what would certainly appear to be hard conditions, while the specific name, tectorum, indicates that it is a plant to be found on roofs-sun-parched spots that would speedily wither up any ordinary plants not accustomed to roasting on a tile in the fiery glow of a July day. "House-like," Maplet tells us, "in Greek is called Acizoon, as you would say, alwaies alive. It is alwaies greene and well liking. It hath a fruitfull leafe in the thicknesse of a man's thumbe: in the end thereof it is sharpe or like a tongue. It is given to drinks, sayth Dioscorides, against the biting of the greatest kinde of spider. It growthe upon walles and tiled housen, and is many ways medicinable." Old country housewives have great faith in the plant as a remedy for burns or scalds, and this, no doubt, is one reason why we find the plant at home on their

cottage roof. The second half of the popular name, leek, is from the Anglo-Saxon leac, a plant. We must not be tempted by Maplet into the fatally easy suggestion that it is house-like because it likes to live on houses! An old name for the plant is the aye-green, a popular version of its botanical name. Several of the garden species of Sempervivum are well worth cultivation. In some, as in S. arachnoideum, the surface of the rosettes is covered with a light grey fibrous network like cobweb, giving a very curious and striking effect. A good florist will be prepared to supply some thirty species on demand.

One often admires in some old country village the beauty of the cottage gardens, gay with a profusion of blossom, but Nature's cottage-roof gardening is often no less interesting. Given an old bit of thatch, sinking in in places and thus

The plants we still know as the leek (in Anglo-Saxon days known as porleac), and garlic, Anglo-Saxon gar, a spear, a leac, from its sharp, tapering leaves, are other illustrations of the survival of the word. In Markham's book for Housewives, written in 1638, we have a recipe given "to helpe the stinging of a venomus beast, as Adder, Snake, or such like." In this we are told to take horehound, tansy, and other herbs as a preliminary, and amongst these we find porrets. These are leeks, so called from the Latin word porrum. It is curious that while the Anglo-Saxon is porleac, the leek plant, in modern usage we drop the first half and call the vegetable a leek, while Markham drops the second half and calls the same plant a porret.

holding moisture, the flying and bird-carried seeds will soon turn it into a garden well-nigh as gay as those that fringe the village street. On such roofs we have seen masses of poppies in their gorgeous scarlet, and wheat and oats ripening in the sunshine, to say nothing of mosses, fungi, ferns, and all sorts of other vegetable growths, many of which entirely puzzle us to account for however they got there.

As such roof-gardens imply decaying beams rotting beneath them, they are, from a sanitary point of view, to be regretted. The lady who comes over one fine afternoon with her paint-box to sketch so picturesque a "bit," and the old cottager who spends her life beneath these musty ceilings, regard the matter from different standpoints, and the æsthetic person must kindly stand aside while the man with prosaic piping, tiles, and so forth comes at last to the fore, the recurring outbreaks of fever, diphtheria, and the like having become somewhat of a scandal that has considerably smirched the good name of this Arcadian spot.

How some Chinaman first discovered the succulent charm of roasted pork has passed into history. It was afterwards found that a much simpler method was as fully efficacious, and in like manner we can grow in our rock-garden noble plants of house-leek, to make no mention of poppies, without importing a cottage roof to carry them. Would one achieve success, it is most important to consider the idiosyncracies of our various plants. We must adapt our conditions to them: they have little or no idea of adapting themselves to us. A noble tuft of our common harebell in the midst of rough rockwork is as graceful an object as one could desire to see. As it in a wild state prospers best on down lands and open heaths, we must see to it that its place in our floral fraternity is open to the light and air and in a position as dry as our general conditions will permit, while the transportation of our noble yellow kingcups to such a spot would mean almost immediate drooping and prompt dissolution.

The central flower on Plate XXXVI., the marsh orchis, is very much a case in point, as it is ordinarily found in very wet meadows. It will grow grandly if we are careful to plant it in a moist position, and will throw up a stem over a foot in height, its dense spike of rose-red, or purple, or more rarely white blossoms, making it a very attractive plant. In the "Flora Londinensis" of Curtis—a book published in 1798—we find that it was then growing abundantly in the Battersea meadows. Those meadows we well remember, though not at the time that Curtis visited them. They were very rough and irregular, and more or less deeply cut into by channels from the

Thames that filled them at high water—a noble hunting ground for all kinds of water plants, but now, alas! drained, intersected by formal gravel paths, provided with bandstand, refreshment-rooms and all the adjuncts that go to form a park of the most conventional type. The marsh orchis approaches the common spotted orchis that is so abundant in the Spring in pastures and open woods, and some botanists will tell us that it is but a variety of it. However that may be, we may well include both in our collection.

The wild tulip—the other flower on Plate XXXVI.—represents rather an aspiration of ours than a realisation. It has been sent to us, but somehow failed to respond to our attempts to make it welcome. It is common enough in some parts of the Continent in pastures and on waste ground, and is perhaps truly as indigenous in some of our English counties. It would be an interesting plant to add to one's store.

We have in Britain some four species of mallow, but only one of these will repay cultivation, the musk mallow—Malva moschata—a plant that is by no means difficult to grow. It is a perennial, and will, therefore, when once established give us no more anxiety. The plant is some one to two feet high, throwing up a cluster of almost erect stems. These bear richly-cut leaves, and at their summits numerous large rose-coloured flowers, or it may



SAXIFRAGA RHEI. RANUNCULUS AMPLEXICAULIS SAXIFRAGA CYMBALARIA.



occasionally be found bearing white blossoms, but this variation, though interesting and a good thing to possess, is not really so attractive as the normal pink-flowered plant. The musk mallow is found chiefly on chalk or gravel.

The common mallow—*M. sylvestris*—is abundant almost everywhere, and will, without invitation, find a footing in our garden if it can, and if it be once fairly in possession will prove a trouble, as it seeds very freely, and occupies a good deal of ground. It is difficult, too, to eradicate. We sympathise then with Tusser, who warns the farmer that, as part of the work of the Spring—

"Thy garden plot latelie well trenched and muckt, Should now be twifallowd, the mallowes out pluckt."

Hilman, in his "Tusser Redivivus," published in 1710, amplifies this in the additional caution: "In trenching, bury no mallow, nettle-dock, or briony roots." In another passage Tusser warns us to clear from our ground—

"Grasse, thistle, and mustard seede, hemlock and bur, Tine, mallow, and nettle, that keepe such a stur."

The marsh mallow one would gladly include in one's collection of interesting things, but its special fondness for marshy land in maritime districts debars its successful cultivation. Many kinds of

non-British mallows are to be found in gardens, of which the hollyhock is perhaps the best known.

The various species of mallow yield a large amount of mucilage, and have therefore been largely used as emollients in rural pharmacy, a decoction of the leaves being used to allay by its soothing nature throat, lung, and other troubles. The foliage macerated has also been found of great value as a fomentation for the eyes in ophthalmia, in cutaneous troubles and abrasions, and as a gargle. In France the marsh mallow is the guimauve, and in lozenge form the pâté de guimauve is a very popular medicine. The root is found to contain nearly half its weight in mucilaginous matter, while the leaves yield about a quarter. The French word means viscous mallow. The roots are preferably collected for medicinal purposes in the Autumn, and plants not less than two years' old should be taken.

Pliny recommends boiling the roots in sweet new milk as a soothing drink, while other old writers suggest that they may be boiled in vinegar as an external application for toothache. We also find other applications, sometimes with wine, sometimes with grease or turpentine, but all emollient in effect. Maplet, we see, suggests in his book, "A Greene Forest," published in 1567, that a preparation of "Malew lyquor or iuyce, contempred with any

clammy Oyle, being annoynted vpon any man's body he cannot be stung with Bees."

The mallows also yield a valuable fibre for papermaking and textile purposes, but as other plants, such as hemp and flax, are yet better, this use of the mallow scarcely comes to the fore.

The milfoil, or yarrow—Achillea millefolium—is one of the commonest roadside plants, and may therefore be deemed, by those whose tastes are not very catholic, unworthy of a place, if indeed it be not stigmatised as a rank weed to be ejected at sight; yet a plant or two springing up here and there amidst our rock-work may well be permitted, since the foliage is very distinctive in character and its long, flower-bearing stems have a wild freedom of growth that appeals. The foliage varies very considerably in colour effect, being sometimes of a dull green, and at other times so covered with little hairs as to give it a silvery appearance. The clusters of blossom, normally white, are not unfrequently pink, and both should be cultivated. An allied plant—the A. Ptarmica, or sneezewort with its groups of daisy-like flowers, should also be included. These are the only two English species of the genus, but it contains many attractive Alpine and other species, well adapted to culture, and those who desire to extend their experience of it will readily procure from their florist divers species of Achillea that will thrive in any ordinary garden,

some having white flowers, others rose-coloured, or various strengths of yellow. On Plate XLI. the right-hand figure is one of these fair aliens, the A. rupestris. It forms a charming addition to one's rock-garden. Another very attractive white flower that is equally desirable is the plant that companions it on the Plate, the Iberis sempervirens, one of the many species of candy-tuft. Yet another achillea may be found on Plate L. The particular plant from which our illustration was taken hailed originally from Switzerland, but the plant—the A. tomentosa—is also a member of the British flora. It is, however, but rarely met with, and can make no claim to be really indigenous. It was at one time much cultivated from a belief in its medical efficacy.

The tansy was one of the valued medical herbs of our forefathers, or perhaps, more especially, of our foremothers. "Tanzie" appears twice, we see, in Tusser's lists of plants to be cultivated. Amongst the "herbes for the kitchen," and amongst the "strowing herbes," these latter being in place of carpets as a floor-covering. Tusser's selection includes "Bassel, baulme, isop, lauender, sage,

¹ A. agyptiaca has its flower-heads of a pale yellow, while A. filipendula, A. aurea, or A. tomentosa are of a deeper yellow. They vary considerably, too, in the leaf-colourings. A. umbellata has, for example, very finely cut and minute leaves of quite silvery sheen.

penabriall," and many other fragrant herbs. These must surely have got terribly in the way, and when crushed there would be no slight risk of being thrown smartly down by them on the hard stone floors that our ancestors affected.

The tansy is bitter to the taste and tonic in its operation. Opinions differ so widely on odours that it will scarcely do to dogmatise, so we will content ourselves with pointing out that to some the plant is aromatic, while others would choose a less kindly word to define their opinion. On distillation the plant yields an essential oil, and it would appear that it is to this it owes such active medicinal properties as it possesses or is credited with. Like many other herbs its fame has dwindled in these latter days. Gerard and many other early writers are loud in its praise, but whatever its healing virtues our physicians now look elsewhere. The tansy was also largely introduced as an ingredient in omelettes and cakes in medical cookery, while tansy-pudding was a favourite dish for centuries. Cogan, in his "Haven of Health," writes: "Tansy is much used amongst vs in England about Easter, with fried eggs, not without good cause, to purge away the fleame engendered of fish in Lent season," while a much earlier authority instructs us to-

[&]quot;Breke egges in basyn, and swynge hem sone, Do powder of peper therto anone,

Then grynde tansay, the juse owte wrynge To blynde with the egges, withowte lesynge. In pan or skelet thou shalt hit frye In butter well skymm et wyturly.

In an old book called the "Footman's Directory," by one Cosnett, we find that one of the duties was to "put a sprig or two of Tansy at the bed head, or as near the pillow as the smell may be agreable in order that his master's rest might not be disturbed by those nocturnal visitors to whom the odour was an offence."

The tansy attains to a height of some three feet or so, the stems branching but little except at the top, where they support a large mass of bright yellow flowers. The leaves are very deeply cut. One may find the plant on the borders of fields and by the roadside on that broad fringe of verdure that borders so often our country highways, and more especially where the ground is of chalky or sandy nature, and, as it has very freely growing, creeping roots it quickly spreads and forms large masses. Our first ambition was to grow the tansy, and in this we experienced no difficulty, the subsequent trouble was when we sought to keep it within reasonable bounds.

The popular name is a corruption of the old monkish name Athanasia, a word meaning immortality. Ambrosinus tells us in his "Phytologia" that it was thus called because a dead body, if



PRIMULA FRONDOSA, SAXIFRAGA WALLACEI, SAXIFRAGA TOMBEANENSIS.



exposed to the preservative effects of the distilled oil, suffered no decay; but whatever this precise statement may be worth it does not indicate unending life. Others tell us that the constant recourse to the healing virtues of the plant preserves the health and life itself far beyond the allotted span of mankind who have neglected so great a boon; but after all there is a considerable difference between a centenarian and an immortal, while Lyte can give us no better explanation than that the tansy flowers in their blossoming last longer than most, which also does not take us very far on the road to immortality.

The wormwood is another plant to which we gladly extend hospitality, both for its own sake and for the associations that have gathered round it as a plant of great healing power. The flowers are small, of a dullish yellow, and inconspicuous, but the leaves are very pleasing in form and of a pale silvery-grey, so that the plant, as a mass, stands out with bold individuality from amongst its fellows. It is some two feet or so in height and branches freely, so that it becomes a more or less rotund bush. Botanically the wormwood is the Artemesia Absinthium-titles which carry us far back indeed in the records of botanical science. The generic name, some would tell us, is derived from Artemis, the Diana of the Greeks, whose glorious shrine at Ephesus was one of the wonders of the

ancient world, while others have it that it was derived from Artemesia, the wife of King Mansolus, who, according to Pliny, bestowed on this plant her name. Whichever theory may be correct, we find the plant thus named by Hippocrates, who was born centuries before the Christian era. The specific name is from the Greek apsinthion, an alternative name for the plant which at all events dates from the commencement of the Christian era, since we find it in the writings of Dioscorides. In modern days we find the named revived in absinthe, a preparation largely distilled from this plant. The Greek word signifies without delight, lacking attractiveness, and may have been suggested by the inconspicuous flowers or in allusion to the very bitter taste of the plant.

While possibly an indigenous plant, the wormwood is so markedly found in the neighbourhood of ruins as to justify us in assuming that, at least in many cases, it is a survival from the old herb-garden of the monastery or manor-house. The plant has for centuries been held in high esteem as a tonic and febrifuge. Gerard, we note, commends it to us as a welcome remedy from the biting of the dreaded shrew-mouse or the venom of the sea-dragon, while generation after generation of our forefathers regarded the wormwood as a potent remedy against witchcraft and the evil powers of necromancy. Hence they suspended it in their houses or

wore a sprig of it against their bodies, and on Midsummer Eve a large bunch of it was burnt, its pungent fumes penetrating the dwelling being held amply sufficient to rid the house for the ensuing year from magic, the evil eye, and malign supernatural agencies of all degrees of power and terror.

The popular English name has suggested the use of the plant as an anthelmintic, but the Anglo-Saxon name was wermod, a name derived from werian, to ward off, and mod, a maggot, the plant being used to preserve meat from becoming thus attacked. By a curious transference the first half of the word subsequently appropriated the significance of the second half, and the wer became corrupted into "worm."

The following extract from Lovell (1665) is fairly representative of the popular esteem in which the plant was long held: "Worme wood," he writes, "is bitter and strengthening. It preserveth and healeth surfeits, resists putrefaction, preserves from moths and gnats. It is good in pultices. It helps them that are strangled with mushroomes, drunk with vinegar, with hony the marks of bruises as also dimme eyes. The spirit is good to cheer hypochrondriacall ¹ persons." Cogan, in his "Haven

""Wormwood, centaury, pennyroyal are magnified and much prescribed, especially in hypochrondrian melancholy, daily to be used, sod in whey."—Burton, "Anatomy of Melancholy."

of Health," briefly commends the tonic value of the herb. "There is to be had in the Stilliard at London," he instructs his readers, "a kind of wine named Worme-wood wine, which I would wish to be much used of all such as be weake of stomacke. They may easily haue a rundlet of three or foure gallons or lesse, and which they may draw within their owne chambers as neede requireth. I was woont when appetite failed to steepe a branch or two of common Wormewood in halfe a pint of good white wine, close couered in some pot all night, and in the morning to straine it through a clean linen cloth and put in a little sugar and warme it, and so drinke it. Or sometimes to burne a little quantitie of wine with sugar, and a branch or two of Worme-

¹ Good housewives have always, and ordinarily very properly, a good conceit of the various preparations they are responsible for, and when we are told that a thing is "home-made" one is expected to realise that it is necessarily superior to anything that can be got outside, and to express that belief unfalteringly. In a quaint old book, published in 1602, and entitled "Delightes for Ladies," these good housewives may pick up various useful hints, one being "how to make Wormewood wine." To effect this we merely "take small Rochell or Coniake wine, put a few dropes of the extracted oile of wormewood therein, and brewe together out of one pot into another," the happy result being that "you shall have a more neate and wholsom wine than that which is solde at the Stillyard for right Wormewood wine." Note the quiet sarcasm, it is sold for the right article, but that is all the guarantee the purchaser gets!

wood put into it, wherein I have found many times marvellous commoditie."

Honesty should find a place in our regard, not only morally but horticulturally. It is ordinarily a very easy plant to grow, and its cruciform purple blossoms are attractive. It flowers freely, and when once established keeps itself going each year by its self-sown seedlings. We qualify our cultural remark by an added "ordinarily," as we recall that a legal friend of ours was so struck with it that he endeavoured to introduce it into his garden. It resolutely refused to grow, and thereby gave his friends, who declined to see in it merely a curious coincidence, occasion to make unkind remarks. The seed-vessels are very large, circular, flat, of a silvery sheen, and semi-transparent, so that one can readily detect the seeds contained therein. The plant derives its name of honesty from these seed-carriers, but these are at best but semi-transparent; the plant should therefore, presumably, be termed modified honesty, and this is not honesty at all. It is a plant of many names, and all of them descriptive: lunaria, penny-flower, silver-platter, money-flower, while in France it is the medal-plant, white satin plant, and wherever we find it elsewhere abroad it will be known by some such name. Drayton

CHAUCER.

¹ "And herbes coude I tell eke many on, As egrimaine, valerian, and lunarie."

calls it the "enchanting lunary," for in earlier days it was held in great respect from its reputed magical powers. Hence elsewhere Drayton tells how the juice of rue,

"With nine drops of the midnight dew From Lunary distilling"

has mysterious influence in the hands of the sorcerer, the wizard, and such-like uncanny workers of mystery. However this may be, we need have no qualms of conscience in brightening up our garden with its blossoms. The pods dry very well, and if we so please we can preserve them through the winter as reminders of the pleasant has-been and emblems of hope for the anticipated may-be, when, winter safely over, we look forward to a renewal of all the pleasures that a garden brings to those attuned to its delights.

The graceful growth and long lines of golden pea-like flowers of the yellow melilot—Melilotus officinalis—will give it ready entrance and a hearty welcome. The generic name is derived from two Greek words signifying honey and the lotus flower, and it may be accepted with certainty that whatever plant was the melilotus of the ancients it was not the one that is now so named. The melilot grows to a height of some three or four feet, and though it may be found occasionally by the roadsides, on railway



ECHMACEA PURPUREA



banks, and elsewhere, it is by no means common. The specific name refers to its officinal use in former days. Like most other plants it was held to have great medicinal value, being used by our ancestors for very widely differing affections, but it would appear to have little or no real efficacy. One of its old names is the plaster clover, in obvious reference to its external application to wounds and inflammations. It has, when dried, a very fragrant odour, much resembling that of the woodruff under similar conditions, and by a process of distillation a scent has been procured. The melilot, too, at one time was much in use as a fodder plant, being relished greatly by cattle and horses, but other plants have superseded it. Gruyere cheese owes its distinctive flavour in great measure to the flowers and seeds of the melilot, these being bruised and mixed with the curd during the process of manufacture; and the plant has been commended as a useful panacea against the ravages of clothes' moths. An allied species, the white melilot, is equally worth entrance into our rock-garden. It differs from the other in that the blossoms instead of being yellow are pure white. It is a still more doubtful native than the preceding, and was probably introduced inadvertently into this country with corn and with other seeds, or, possibly, with ballast. It is now found scattered fairly freely in many localities.

"Cokkell," wrote Maplet over three hundred years ago, "is an unprofitable Herbe, or rather (to give him his right name) a hurtfull weede, which will alwayes be medling with the pure Wheate, and doth often choke it vp, and hindreth his growth: So that the old Proverbe is herein verified, the ill weede ouercroppeth the good corne." This passage suggests another venerable old saw that reminds us how promptly the dog's fate is sealed and his speedy death by suspension sure if only we asperse his character, but we are really not quite prepared to disown an old friend at Maplet's instigation. Any one who has seen the corn-cockle, not choking the wheat or being choked by it, but standing alone in the garden and given a fair chance, will agree with us that its removal to the rubbish-heap would be an absurdity. We have seen it under such conditions over four feet high and blooming profusely, a delight to the eye. The rich purple blossoms are very showy, and the five long green points of the calyx standing boldly out around the petals give it a singularly handsome appearance. Its botanical name, Agrostemma, signifying crown of the field, suggests something a little above a noisome weed!

Another denizen of the farmer's wheat-field, or springing up amidst his turnips or other green crops, is the corn-marigold, one of the largest and gayest of the starry golden blossoms of our summer season. One must confess that it does sometimes grow so freely that it becomes a troublesome weed to the farmer, but, transferred to our rock-garden, a good clump of it in free flower-bearing well deserves warm welcome. It is a very near relative to the ox-eye, a plant that we have already referred to, and which, year by year, throws up its effective gold and white flower-heads amidst our other blooms.

The feverfew is another of the composites that we must find space for, its clustering heads of daisylike flowers being very attractive. It is closely allied to the camomile, and a garden variety of it may often be found in cultivation, the "golden feather." Tusser, we see, commends it to the good housewife, but calls it the fetherfew, thereby missing the whole point of the name. It was called feverfew from its monkish name, febrifuga, the idea being that, owing to its valuable medicinal properties, fever would be driven away when the patient was dosed with it. It possesses considerable tonic and stimulant power, though its use is now a thing of the past. The feverfew is fairly common on waste ground, but it may be regarded as in many cases an escape, a descendant from an ancestor held in esteem in the herb-garden.

Some of the old herbals commend the feverfew as "an especiall remedy against opium that is taken too liberally"; a curious revelation this of mediæval habits, as we, most of us probably, have been in

the habit of regarding indulgence in opium as a comparatively modern vice. Camerarius affirms that in Italy it is "fryed with egges, as wee doe tansies, and eaten with great delight." An application of the bruised leaves of the feverfew with a little salt and powdered glass was once in great vogue as a remedy for ague, being bound to the wrists of the patient. "I see no reason wherefore," candidly writes one old authority, when it comes to adding the glass, and more recent authorities would be disposed to agree with him. "The feuerfew ioyeth to grow any rubbish. There is oftentimes found when it is digged up a little cole vnder the strings of the roote, and neuer without it, wherof Cardane, in his booke of Subtelties, setteth downe diuers vaine and trifling things." The fact of "a little cole" being found in a rubbish-heap does not strike us as altogether improbable. It is curious to notice how the old writer gathers assurance as his fable unravels itself: he commences by "oftentimes," but soon gets to "always," feeling, doubtless, that a halting and wavering narrative would receive but a halting and wavering reception.

The common red campion—Lychnis diurna—that we find so commonly in the country hedges in the early Summer, we always welcome, since in its growth and colouring it is a very attractive plant. We figure it on Plate XLVI. In addition to the clear pink of the corolla the whole plant is often

of a rich warm brown. Its sister species, the white campion—*L. vespertina*—must also have a place in our regard. We have grown it quite a yard in height, and when one visits it in the evening when its numerous pure white flowers are expanded it forms a charming feature. Both these species are common enough almost anywhere, but not therefore to be by any means despised.

The yellow-flowered plant on Plate XXXVII. is the flax-leaved goldilocks, sent to us from Torquay. It is found in abundance on Barry Head, due south of the town, across Torbay. While really a plant of Southern and Central Europe, it has strayed so far north as the southern and western coasts of England, where it may be found, but very locally, growing in clefts of the rocks. It may be found, for instance, at Worle Hill, in Somerset, and at Weston-super-Mare, and abundantly on that noble mass of rock, the Great Orme, near Llandudno.

The central stem grows, as our drawing indicates, boldly erect, and may be anything from about six to fourteen inches high. The flower-heads, for it is a composite, are borne in clusters on numerous small lateral stems, and form a more or less terminal mass. August and September are the months of its blossoming. Botanically our plant is the *Linosyris vulgaris*, the Latin for flax being *linum*, while osyris was a name bestowed by Pliny on a plant, this or another, one cannot pronounce definitely,

that had flax-like leaves. The specific name signifies that the plant is of common occurrence. It was bestowed by Linneus, but so far as England is concerned is an entire misnomer; the plant, though locally common, is distinctly rare. It is a lover of the limestone and the littoral, and we are bound to confess that it soon perished with us, as our inland position supplied neither of these prepossessions. It is, however, an interesting plant, and we gladly figure it, since many persons have never seen it. As we have another goldilocks, one of our numerous buttercups, the present species is differentiated by the prefix flax-leaved. The second figure on the Plate is the flax itself; the similarity in foliage between the two plants is very marked. The toadflax, a plant that we have already referred to, bears this common name, and also its less used local name of flax-weed, from its flax-like foliage.

The cultivated species of flax are very charming. We have four wildlings, but those who like to go outside this narrow limit and invoke the aid of the florist have a very considerable choice. The Linum flavum, or the L. campanulatum, are yellowflowered; the L. viscosum purple; the L. provinciale deep blue. Others—we need not give them in detail—are pure white or in varying tints of blue. Those who would cultivate any kind of flax successfully must remember that they all enjoy a sunny aspect and a dry soil.



GLOBULARIA CORDIFOLIA, RANUNCULUS MONTANUS, LYCHNIS DIURNA.



CHAPTER X

The chequered fritillary, or snake's-head—Orange balsam
—Yellow balsam—Forget-me-not—Mediæval dread of
the scorpion—Ground pine—Rosemary—The flower
of remembrance—Rue—Fennel—The serpent's medicine—Ragwort—Hare's-ear—The pearly cudweed—
Milk-thistle—Apple—Mediæval pomatum—Sea buckthorn—Buck's-horn plantain—Echmacea—Globularia—
A fernless rock-garden unthinkable—Brake—Male fern
—The gift of invisibility—Lady fern—Hart's-tongue—
Royal fern—Adder's-tongue—Polypody—Hard fern—
Scale fern—Black spleenwort—Fungi—Autumn foliage.

THE fritillary should find a welcome home amidst our floral treasures, its early flowering and its quaint form of colouring being points much in its favour. The wildling, the only English species of the genus, and the one that we are now commending, is the *Fritillaria Meleagris*, but the gardeners, if we will have it so, will supply us with a rich variety of outlanders.¹ The great bell-

¹ As the charming *F. pudica*, with bright yellow flowers, a native of the Western States of the great American Union, and the still more brilliant compatriot, the *F. recurva*, having flowers of a rich chequering of yellow on a scarlet ground.

like pendent flowers of the chequered fritillary, as our present plant is often called, is ordinarily of a reddish-purple, very regularly marked, chess-board fashion, with squares of darker purple. The flower may sometimes be found almost entirely without these chequers, being then all purple, or occasionally white.

The fritillary is so called from the Latin fritillus, a board marked in squares for a game anciently played with dice, while the specific name Meleagris is given to the plant also as a token of its chequering, the guinea-fowl-Numidia Meleagris-being in some degree thus spotted. Gerard, we see, together with other old herbalists, calls it "the ginny hen flower." "Of the faculties of these pleasant flowres," he tells us, "there is nothing set down in the antient or later writers." This, as one of his main objects was to set forth "the vertues" of each plant, must have been somewhat painful to him to admit, but he cheers up bravely and declares the flower "greatly esteemed for the beautifying of our gardens, and the bosoms of the beautiful." Another old name for the plant is the snake's-head, the chequered bud, before

From Asia comes the F. armena, another brilliantly yellow blossom, the Old World and the New vying in the production of interesting forms. There are many other species, one well-known one being the Crown Imperial, so common in cottage gardens. All are bulbous and easy of cultivation.

expansion, being in form and marking very suggestive of such a name.

The fritillary grows to a height of a foot or so, the stem bearing three or four narrow leaves and generally but a single terminal flower. It favours moist meadows and pastures, but in England is perhaps only truly wild in a few localities in the southern and eastern counties. It is a very near relative to the wild tulip.

In the damper portions of our rock-garden we grow each year, very successfully, large masses of the orange balsam, or touch-me-not, the Impatiens fulva. Though purely a North American plant, it has somehow established itself on the banks of the Wey, and thence to the shores of the Thames. Though an annual, it seeds very freely; we do not trouble to collect the seed, being well content that a succession of self-sown plants is assured to us. The flowers are pendulous, very quaint in form, of a deep orange colour, spotted and speckled over with a yet darker reddish-brown. An allied species, the yellow balsam—I. noli-me-tangere—is found growing in some parts of England, but chiefly in the northern counties. On being touched the ripe seed-vessels burst suddenly open and scatter their seeds far and wide. The action is bewilderingly rapid: at one moment we are looking at a compact pod, while in the next its segments have sprung vigorously wide open and rolled themselves up into spirals. Hence

the plant is the Impatiens, the touch-me-not, the quick-in-hand.

The touch-me-not has as its companion the waterloving forget-me-not, that decks throughout the summer our rock-garden with its welcome turquoiseblue flowers. The older herbalists call the plant the mouse-ear scorpion-grass—a much more prosaic name than the one it now bears. Mouse-ear was suggested by the form and texture of the little leaves, while the second half of the name was suggested by the spiral unwinding of the inflorescence, in some sort suggestive of the tail of a scorpion, and therefore indicative to the mediæval herbalists that the plant was efficacious against injury from the venom of this uncanny creature. Why the old plant-gatherers in search of remedies were, in our English shires, so nervous of the scorpion any more than, say, of an octopus or a rattle-snake, passes one's understanding. present plant has only borne its present name for a comparatively short period: the mediæval forgetme-not was a quite different thing—the ground pine; it was thus termed because from its bitterness any one tasting it would be in no danger of not avoiding it in future. The forget-me-not was at one time held to possess magical virtues, and, judiciously employed, brought abundant good fortune to those who knew the secret of the talisman, and various legends have grown around the pretty

little flower. Henry of Lancaster in his exile adopted it, with the motto, "Souveigne vous de moy," as his emblem, and it is a legitimate inference that "Hope's gentle gem, the sweet forget-me-not," as Coleridge calls it, bore its share in the subsequent transition from the fugitive in exile to the monarch on the throne. Another plant that shared the name was the Germander speedwell, another charming little wildling that we are happy enough to induce to take up its abode with us. The flowers of this latter are very fugacious; hence it was, and is, the speedwell, a valedictory name, a form of farewell, and this in turn easily grew into the appeal—forget-me-not. It is a plant that we have already referred to on an earlier page.

Another plant full of interesting associations is the rosemary: "the flower of remembrance and of rejoicing." It was held to strengthen the heart and the memory, and was associated alike with the happiest and the saddest days. Herrick writes of it—

"It matters not at all,
Be't for my bridal or my burial."

It was associated, too, with the Christmas festival, and decked the home at that period of rejoicing, and thus this fragrant evergreen plant became to our forefathers a symbol of the deepest feeling. It will be recalled by the lover of Shakespeare how,

when Juliet is supposed to be dead, the rosemary that was to have been used at her wedding was yet to serve to deck her corpse; while in reading in Dekker of a bride who died on her wedding-day, we find the same suggestion—"Here is a strange alteration: for the rosemary that was washed in sweet water to get out the bridal is now wet in tears to furnish her funeral." An old ballad declares that—

"Rosemary is for remembrance Between us daie and night,"

and we find the idea again in "Hamlet"—"There's rosemary, that's for remembrance," while in the "Winter's Tale" rosemary and rue are beautifully associated together in the lines—

"For you there's rosemary and rue, these keep Seeming and savour all the winter long; Grace and remembrance be to you both."

The rosemary is really a plant of the Mediterranean littoral, but has for centuries been cultivated in the British herb-garden. The botanical name Rosmarinus signifies dew of the sea, the greyish appearance of the plant and its favourite locality being herein suggested. The leaves, while green above are whitish beneath, and the flowers are of a pale blue colour, variegated with purple and white, and of labiate type.



HIERACIUM INTYBACEUM and HESPERIS MATRONALIS.

To face page 284.



Those to whom on the ground of old associations the rosemary appeals will extend a like sympathy with the rue, its personal attractiveness receives our welcome, the pale grey of its foliage no less than the beauty of its form making it very acceptable. This again is a plant we derive from Southern Europe, but from its medical reputation it has long been one of the plants of the herb-garden. It was in earlier days a potent element in the exorcism of evil spirits, hence its old name—herb of grace. It was held, too, of great value in strengthening the sight. Milton, amongst other poets, thus refers to its medicinal use—

"Then purged with euphrasie and rue His visual orbs, for he had much to see."

The list of its virtues, as given in the writings of the old herbalists, is a very long one. "The seed thereof taken in wine is an antidote against all dangerous medicines and deadly poisons, a decoction of the leaves cureth all pains and torments." To quote at greater length is superfluous: one

" "There's rue for you; and here's some for me;
We may call it herb grace o' Sundays."

HAMLET

"'Twas a good lady: we may pick a thousand sallets ere we light on such another herb. Indeed, sir, she was the sweet marjoram of the sallet, or, rather, the herb of grace" ("All's Well that Ends Well").

short extract amply suffices to explain why a plant held of such abundant efficacy should find honoured place in the mediæval herb-garden, and we find that it was held of sovereign virtue even in the days of Pythagoras and Hippocrates.

Yet another plant of interesting associations we give ready welcome to-the fennel. This, though one nowadays associates it with the kitchen garden, is a true British wildling, and may be seen flourishing vigorously on the cliffs by the seaside in many localities, rising to a height of some four feet or so, forming a dense mass of very finely cut foliage that contrasts admirably with everything around it when we transfer the plant to our rock-garden. The fennel was well known to the ancient Greeks and Romans: Hippocrates, Dioscorides, and other very venerable practitioners believed greatly in it. It has been largely used throughout the centuries for the relief of dimness of sight and of blindness: according to Pliny, even the serpents had found this out before his days, and when they cast their skins resorted to this plant to restore their sight. There was an ancient distich declaring-

> "Fœniculum, rosa, verbena, chelidonia, ruta, Exhis, fit aqua, quæ lumina reddit acute,"

which appears in mediæval garb as-

"Of Fennel, Roses, Veruain, Rue, and Celandine,
Is made a water good to cheere the sight of eine"—

and it would be a very easy task to bring forward any number of prescriptions in which various venerable herbalists introduce one or other of these plants into the service, and of course these mediæval authorities in their wonderful respect for antiquity carry on the statement they found in the pages of Pliny, and declare of the fennel that—

"The neddere whaune hurt in eye
He schall it chow wonderly.
And leyn it to hys eye kindlely
Ye jows shall sawg and hely ye eye
Yat beforn was sicke and feye."

Maplet, in his book "A Greene Forest," published in 1567, tells us that "Fenkell is an Herbe of the gardaine and field, common to them both, but not so common as effectuous. The Latin name signifyeth that it should sharpen of the eiesight, and Dioscorides also sayth that the iuyce of this herbes roote quickneth the eyes. Plinie, as also Isidore, saith that the verie Serpents (if nothing else did) were sufficient to Noble it and to cause this kinde to be well reckened of, for that though the onely taste or eating therof they shake off many sicknesses, and thereby keepe away from them weake and olde age." Buttes, in his "Table Talke," published in 1599, is no less explicit. We learn from him that "Snakes and Serpentes by eating Fœnill

¹ Adder.

renew their age and repaire their decaied sight by rubbing their eyes with it. Wherefore it is vsed of vs to the like purposes." Presumably our old author desired to suggest that by its use the serpents renewed their youth rather than their age; but this after all is a detail. He goes on to tell of a rather serious drawback to the use of the plant, the "bad propertie in the seedes to brede poysonous wormes, whose poyson is curable by no Antidot."

Boorde, in his "Dyetery of Helthe," published in 1542, instructs us that "the rootes of Fennell soden tender and made in a succade is good for the lunges and for the syghte." Another old writer, Markham, prescribing "for fatnesse about the hearte," advises the sufferer to "take the juyce of Fennell mixt with hony and seeth them together till it be hard and then eate it evening and morning and it will consume the fatnesse," but its main function medicinally we find to be the preservation or restoration of the sight. Hence Bate gives us "an excellent Balme or water of grievous sore eyes," in which this is a leading ingredient, and declares that "this is approved, and more precious than gold." Lupton, in like manner, has "a powder to conserve the syght," in which fennel, eye-bright, and celandine are very important elements. powder has "to be taken continually with meate and the syght will be restored and kept, whose tryall an olde man dyd proue, which vsed spectacles

twelue yeares, so that without them he could not see greate letters: but after he had used this powder onely forty dayes he was free, in so much that all the tyme of his lyfe he dyd see, and read the least letter that was." It would be easy to fill page after page of like commendatory matter culled from the pages of these old writers.

The ragwort is a very attractive member of our rock-garden, coming up freely amongst the fern fronds, or showing grandly up against a dark background of ivy. The plant grows some three or four feet in height, and the wiry stems, clothed with deeply cut leaves, are crowned by large heads of yellow composite flowers. These shed their seeds very freely, and very amply guarantee a continuous store of plants, and we presently find it necessary to sternly eradicate. This day of pitiless decision should, however, be postponed as long as possible, as the liberal distribution of the plant in goodly clumps is far more effective than the dotting here and there of isolated plants.

We have on Plate XXXVIII. two plants that have a quaint attractiveness that secures them a place in our regard. The larger one is the hare's-ear. It is one of our very numerous umbelliferous plants, and may be found occasionally in cornfields, and especially when on the chalk. It is an annual, so we must not calmly trust to its coming up year after year without any trouble on

our part; perhaps it will, and perhaps it will not. Its older English name of thorow-wax is in obvious allusion to the way in which the stems come through the leaves. It is a plant that has somehow, probably with corn, come to us from Southern Europe. The other plant on the Plate is the pearly cudweed, one of our rather numerous species of British cudweeds; our English representatives of the "everlastings" that are imported so largely into England from South Africa and elsewhere. Its pearly-white, crisp-looking flowers and very grey stems give it a distinct character that makes it a very welcome feature in one's rock-garden, from its contrast in colour with its surroundings.

"I passed by his garden, and saw the wild briar, The thorn, and the thistle, grow higher and higher."

These lines linger in our memory from the long, bygone school-days, but who it was who was passing that way, or whose garden he passed, we fail to remember. They somewhat happily describe our own garden, and the poet-moralist, we remember from the general drift of his remarks, desires us to be shocked at such a state of things. It is, we trust, not perversity on our part, but, as the lines have suddenly come back to our memory, we are glad to be reminded by them that a picturesque trail of dog-rose, a white-thorn, a black-thorn, a noble well-grown spear-plume, or a grand plant



VIOLA LUTEA and CAMPANULA RHOMBOIDALIS.

To face page 290.



of beautifully variegated milk-thistle are all notable additions to one's rock-garden. We yet remember with what pleasure we, more than forty years ago, lighted on a fine milk-thistle on a rubbish-heap, at Harrow, and bore it off in triumph to our domain, where it flourished exceedingly, to our great contentment. Our prototype in the poem appears to have been equally successful, the vigorous growth of his plants being an added reproach to him in the eyes of his critic.

Reference to our two next Plates, XXXIX. and LX., reminds us that fruit, no less than blossom, has an interest, and in these two cases at least this interest is purely an æsthetic one. When our trails of wild strawberries, or noble shoots of blackberries, in due course become fruit-laden, one is not averse to combine appreciation of form and colour with appreciation of taste, but assuredly one's interest in these clusters of crabs is purely on the former ground, for no one, except an omnivorous schoolboy, would venture beyond a preliminary nibble at fruit so charming-looking yet so acrid and austere to the taste. In like manner one rests entirely content with admiring the orange clustering fruits of the sea-buckthorn without any desire to sample them.

The wild apple—Pyrus Malus—may not uncommonly be found in our woods, and when we see it in May a mass of pink and white blossom, few plants surpass it in beauty. It is the parent of

the hundreds of varieties of edible apples that are now in cultivation. Writing in the time of Elizabeth, Gerard tells us of a valuable ointment made in his time of the pulp of apples, lard, and rose-water, and which was called pomatum, from pomum, an apple. It was used to beautify the skin, but this was, of course, made from garden apples. Such juice as might possibly by a tremendous effort be squeezed out of the crab would tend rather to excoriation we imagine. It is, in fact, the source from whence verjuice is derived.

The sea-buckthorn, or sallow-thorn-Hippophæ rhamnoides-should be, as its name suggests, a dweller by the margin of the sea, and so it ordinarily is. It nevertheless thrives in our neighbourhood, a good fifty miles from salt water. It is one of our scarcer plants, and is chiefly found in various localities in the south and east of England amidst the sand-dunes or cliffs of the littoral. The plant from which our illustration is taken came to us from a friend at Scarborough. The leaves of the seabuckthorn are of a dull green above, and very greyish below; from the mode of growth of the plant these lower surfaces are much in evidence, and this silvery sheen becomes a conspicuous feature. The flowers are very minute, but are succeeded by the richly coloured berries that we have preferred to illustrate.

Another plant that seems to have a special love

for the neighbourhood of the sea, though it is by no means confined to this, is the buck's-horn plantain-Plantago Coronopus-the plant figured on Plate XLII. This, unlike the sea-buckthorn, is common enough, and thrives well on barren, sterile ground. Inconspicuous as it is, it has a certain quaint charm and is by no means grudged the very limited accommodation that it asks at our hands. This plant is the Cornu cervinum of the mediæval writers. "It riseth up at the first with small, narrow, long, hairy, darke green leaves like grasse, without any division or gash in them, but those that follow are gashed in on both sides of the leaves, into three or four gashes, and pointed at the ends, resembling the knagges of a Buckes horne, whereof it tooke the name, and being well grown lye round about the roote, in order one by another, thereby resembling the forme of a starre, and therefore called Herbe Stella: from any which rise divers hairy stalkes about an handbreath high, bearing each one a small long spiky head, very like unto those of the common Plaintaine, having such like bloomings and seede after them. They flower and seede in May, June and July, and their greene leaves abide fresh in a manner all the Winter. Buckshorne Plantane boyled in wine and drunke, is an excellent remedy for the biting of a Viper or Adder (for I hold an English Adder to be the true Viper, both by the forme

thereof and the teeth it hath with poison in the gummes, being deadly and dangerous upon the biting, and by the breeding, which is of quicke young ones, and not by egges as snakes are) by laying some of the herbe to the wound. It hath beene helde profitable for agues, to weaken their fits, and to take them away, to hang the rootes with the rest of the herbe about the necke, as nine to men, and seven to women and children, but this, as many other, are idle amulets of no worth or value: yet since it hath beene reported unto me for a certaintie that the leaves of Buckshorne Plantane laid to their sides that have an ague, will suddenly ease the fit, as if it had beene done by witcherie: the leaves and rootes also beaten with some bay salt, and applyed to the wrestes worketh the same effects, which holde to be more reasonable and proper." 1

The subject of Plate XLV.—Echmacea purpurea—we have not ourselves cultivated, but found it in the rock-garden of a neighbour. The plant stands some three to four feet high and is splendidly effective when seen as a backyard plant against a screen of ivy or other dark mass. The lilac flower on the next Plate, XLVI., has a special delicacy that commends itself at once to us. It is the Globularia cordifolia: a plant found at considerable elevation amidst the rock débris of the Alps, and in stony

¹ Parkinson.

calcareous pasturage. It grows, as so many Alpine plants do, in tufts, and throwing up numerous globose heads of blossom, delicate alike in form and in colour. The leaves are rather curious in form, being in general outline battledore-shaped, but terminating in three minute teeth.

We have already commended our common ragwort as a rock-garden acquisition, and we give on Plates XLIX. and L. two Continental species of the same genus, the *Senecio Doronicum*, and the *S. aurantiacus*. Their horticultural value speaks for itself. Almost all the composites, from the most gigantic sunflowers to the lowliest of daisies, are effective, and these certainly are of the number.

While we can well imagine that some of our readers may feel surprise at some of the lowly herbs—"really you know, mere weeds!"—we commend to their regard, they may be equally prepared to fall foul of us for our grievous omissions. Such matters must necessarily be, to a great extent, a matter of personal feeling, but to the latter charge, the leaving out of desirable things, we can plead that space in one's garden and in one's book are alike limited. It would be very natural that the plant-lover who revels in some gorgeous blossom, some lowly woodland flower, that to him appears incomparable should resent its absolute exclusion from our pages, but our ambition is by no means to make an exhaustive catalogue. The whole point of

our endeavour is that the plants we introduce should carry with them something of pleasant association, recalling happy journeyings at home or abroad, or reminiscent of their donors, friends who yet remain to us, or who, in cases not a few, have passed away, the fragile flowers yet springing up with each returning Spring and ever recalling to us our loss of the intimacy that, based on community of tastes, was so delightful.

A rock-garden, fernless, is unthinkable. addition to the inherent beauty, a great attraction in ferns is that they will flourish vigorously where most other plants would not prosper at all, and thus spots that would be useless and bare become as full of interest as the rest of our garden. mixture of sand, peat or leaf mould, and loam in almost equal proportions, suits most of them to admiration, and when the roots are once established they need little or no further attention, since they will continue growing vigorously year after year, asking at most an occasional watering during a dry season. One of the errors that one has to avoid in planting is the not allowing sufficient room for subsequent expansion of the individual plants. To avoid a temporarily empty look and to gain a rich effect too speedily there is a great temptation to plant our ferns too closely together, and then in but a short time we find them hopelessly hindering each other's full development. To see a fern in its real



SENECIO DORONICUM and SAXIFRAGA AIZOIDES.

To face page 296.



beauty it must have full room to expand untouched by any other plant, the graceful radiation of the fronds forming its crowning beauty. One of our Osmunda ferns measured across from tip to tip fifty-six inches, so that this one fern, growing equally in all directions, claims a circle of ground of fourteen feet circumference, but it is abundantly worth it.

While most ferns fail to thrive if exposed to strong sunshine, it is important that they should receive due share of light and air. Ferns, as a whole, are in a special degree shade- and moisture-loving, yet the amount of each varies so in different species that it is useless to attempt to give any one cultural formula. They are not lovers of cold draughts, and must be sheltered from strong wind.

Ferns should be removed during the autumn and winter, in the interval between the dying down of the old fronds and the unrolling of the new. While some of our species are evergreen others are deciduous; and though these latter are lost to us for awhile, their reappearance as they gradually unfold is one of the most welcome indications that the Spring has at last come, that Nature is awakening.

The brake, or bracken, the commonest of all our ferns, that clothes our commons and open woodlands lavishly with its graceful leafage, is the only one that has any economic value. We read in Tusser's quaint old book, "The Fiue Hundred Pointes of Good Husbandrie," how the farmer is admonished to—

"Get home with the brake,
To brue with and bake,
To cover the shed,
Drie over the hed,"

and we still see its value appreciated by the cottager and farmer of to-day. It makes a fierce fire for the bakehouse, an excellent covering for the hovel, a very useful litter in the cowshed, and a thick layer of it is often the foundation on which the hayrick or cornstack is reared. The brake grows to a very considerable height, and when it has once established itself may, in the rock-garden, grow a little exacting. We only arrive at its possession as a reward of our perseverance, and after some measure of disappointment. Such, at least, is our personal experience, and it does not stand alone. Unless, when we are seeking to transfer it from the woodland to our garden, we dig up a very goodly portion of its deeply rooting creeping stem our labour is in vain. It is very easy to get up a small piece and march off with it happily enough, but the result is only disappointment.

There is an old belief that the bracken produces a small blue bell-flower at midnight on September 29th, the great Feast of St. Michael, but, as this disappears at earliest dawn there is no chance for most people to see if this be so or not. If only one could be fortunate to find one of these and gather it we are assured that it would point to hidden treasure and guide us to wealth untold. Another old fancy was that burning of the bracken brought on heavy rain. When Charles I. would journey into Staffordshire he caused a letter to be written in advance to the sheriff of the county strictly forbidding that during his sojourn therein any fern should be burnt, while in the West Country if one would be free from toothache a whole year—a distinctly desirable thing—they must bite off close to the ground the first fern frond that a Spring search reveals to them.

The best all-round fern for the rock-garden is, we think, the common male fern, so called popularly to distinguish it from the yet more graceful lady fern. The Greeks and Romans believed that fern produced no seed; other plants they saw flowered and fruited, but the reproduction of the ferns by means of its spores was a mystery to them. Later on it was held that ferns must surely have seed of some kind, but that it was invisible; so our ancestors reasoned out the fantastic idea that if one could but gather this seed they, too, would become possessed of the power to become invisible. Butler, in one of his satires, compares a parasite of the court to "fern, that vile un-useful

weed," and reflects the popular belief by adding, "that springs equivocally without seed." Shakespeare, in his "Henry IV.," makes Gadshill exclaim, "We have the receipt of fern-seed; we walk invisible!" To Others declared that the fern brought forth seed on Midsummer Eve, and then only. Hence, in Browne's "Pastorals" (1614) we read of "the wondrous one-night-seeding Ferne. Those who would gather fern-seed had need possess not only much faith, for that is essential, but also not a little patience. The fern resolutely declined to yield to any violence, no shaking or squeezing was permissible, but if the would-be possessor liked at the solemn hour of midnight to kneel before the plant and hold out a white basin, perhaps the fern might of its own free-will let fall into it some of this precious seed. One is scarcely surprised to find that those thus seeking the gift of invisibility were strongly suspected of malpractices and witchcraft and laid themselves open to the fate of those who were held to be professors of the Black Art. Andrew Marvell tells us-

> "Of the witch that midnight wakes For the fern, whose magic weed In one moment casts the seed, And invisible her makes."

No medicine, Sir, to go invisible, No fern seed in my pocket."

BEN JONSON.

[&]quot; "I had

The power of travelling unseen might be used at times for some beneficent purpose, as when Santa Claus sallies forth on his kindly Christmas mission; but more ordinarily the man who desired the gift of invisibility would be somewhat closely questioned as to what mischief to his neighbours he was planning, and his sudden uncanny disappearance would give rise to some little uneasiness in his circle.

The lady fern is no less welcome in our rockgarden, though we find, our subsoil being sand, that its more delicate character than that of the male fern causes it to brown off earlier in the season than we quite approve. It is very common and very charming. It is singular that the study and appreciation of ferns is of very recent growth. One finds in Cowper, Shenstone, and some others of our native poets little or no reference to them, and a very notable illustration of this neglect is seen in the writings of Gilpin, a life-long dweller in that paradise of ferns, the New Forest, who did much to foster a taste for Nature, and who yet regards the ferns as scarcely worthy of notice, and, indeed, classes them with "thorns and briers and other hedge trumpery." Scott and the Lake poets, however, do them justice. The former, with admirable truth to Nature, refers to the bracken on the great hill slopes, and alludes in "Waverley" to"Where the copsewood is the greenest, Where the fountain glistens sheenest, Where the morning dew lies longest,"

as that happy blending of shade and moisture where ferns would flourish luxuriantly, adding—

"There the lady fern grows strongest."

In such a situation its somewhat pale green fronds, so rich and delicate in form, may grow three feet high or more. These fronds form a rather dense mass as a whole, and droop very gracefully at their extremities. It is much more common in Ireland than in England, the greater humidity of the climate favouring it.

We read in the "Compleat Herbal" of Pechey, a book published in 1694, that "of the ashes of the Female Fern are made with Water, Balls, and being dried in the Sun, they wash their Clothes with them insted of Soap. But before they use them they put them in a light Fire till they are red hot and then they will easily powder. This fern is used in Sussex to burn Lime, for the Flame of it is very violent, and therefore very fit for that Use. The Juice of the Root is good for Burns. Some poor people have been forc'd in a great Scarcity of Corn to make Bread of this Root," but in our rock-garden it lives a very happy, peaceful life, appreciated for its beauty alone; we neither wash



ACHILLEA TOMENTOSA and SENECIO AURANTIACUS.

To face page 302.



with it nor heat our oven with it, nor have we yet, as a last resource, made a meal off it.

The temptation in dry weather to turn hose or syringe on one's ferns is one to be rather fought down than encouraged. It is often of doubtful benefit, and may possibly at times be actually injurious. The soil in which a fern is growing must never be allowed to become parched, but any water applied should go rather direct to the root crowns than flung against the fronds. The force with which the water strikes the leaves is to their detriment, and it is often much too cold. If Nature appears a little remiss in sending refreshing, cleansing showers, a little sprinkling of the fronds may be indulged in.

In the damper and shadier recesses our hart's-tongues are well in evidence, their glossy evergreen fronds being always a welcome adornment. While this fern delights in growing in damp situations—one often sees it, for instance, fringing the sides of the cottager's well—it prospers very fairly on old walls, while in its normal state it is of extreme simplicity of form, and therefore a very welcome contrast to other species; yet there is no fern more subject to variation; and if one cares to visit the nursery of any great fern-grower he will be prepared to submit to us more than a hundred recognised and named variations from type. It thrives best in a rather heavy loam, and its

fronds may be anything in length from an inch or two to well over two feet.

Tusser, in his quaint old "Husbandrie," gives a list of "Necessarie herbes to growe in the garden for Physick," and amongst them we find the "Harts tong," our forefathers including it amongst the multitudinous simples they cultivated in their herb-gardens. "Harts tongue," Lovell tells us in his "Compleat Herball," published in 1665, "is of a drying faculty, drunk in wine it healeth the biting of serpents. The distilled water thereof healeth the passions of the heart, and stayeth the falling of the palate. It healeth stoppings of melancholy and splenetick evills, therefore it is excellent for such as are liver-grown." Though this be but the statement of one author, all these old writers borrowed from each other shamelessly, so that the opinion of any one of them is of equal value with quotations from a dozen or a score.

The royal fern—the *Osmunda regalis*—is the grandest of all our native species, thriving on damp, boggy ground, and distributed more or less throughout the kingdom. Incidentally we may point out that when we claim any plant as British, this by no means gives us a monopoly of it. In the present case, for instance, the royal fern flourishes not in England alone, but as freely in

¹ Others were the "Betanie, Cinqfile, Gromel, Licoras, Rew, Charuiel, Poppie, Saxefrage," &c.

the bog-lands and swamps throughout Europe, away in India and Madagascar, Canada and Brazil, Natal and Mexico, and elsewhere in Asia, Africa, and America. It gives, we take it, an added interest to a plant to realise how widely it is distributed, that the flower that springs up uninvited in our garden is dotted as freely over Cape Colony or Japan. There are not a few plants that are practically cosmopolitan, either by nature or by the voluntary or involuntary agency of man.

The royal fern is ordinarily found near sea-level, or at all events not more than some three hundred feet above this. Under auspicious circumstances it may attain to a height of some six or seven feet, or, exceptionally, even more. It is easy of culture if only we do not fail to remember that it must have abundance of moisture. Our finest plant has been flourishing with us for over thirty years, and seems quite willing to go on indefinitely. It came to us originally from Surrey, from the banks of the Wey, then went to Wiltshire, and prospered by the banks of the Kennett, undergoing two moves there on changes of home, when another change brought it back to Surrey, where it has since undergone yet another shift. It has therefore been dug up four

¹ So far south as Cornwall right away to Arran it may often be found amongst the rocky *débris* on the beach, on the precipitous faces of the sea-cliffs, or luxuriating in caves accessible to the tides.

times already, but has not in the least resented it, possibly, indeed, would feel flattered if it realised the position, that whatever changes overtook us we could bear them with equanimity if only they did not necessitate parting with our royal guest. According to Pechey, "the Root does good in the Cholick and Diseases of the Spleen. It is very effectual for Bruises and those that are wounded, it being boyled in some Liquor. Tis excellent in the Rickets, a Conserve being made of the tender Buds of it, and of Asparagus, Spleenwort, and Harts tongue."

The little adder's-tongue is abundant in many parts of England, and is readily distinguished from any other of our ferns—an individuality that gives it added interest and full welcome to the fernery. It should be sought in moist, loamy meadows, where it is sometimes so plentiful as to greatly injure the pasturage. It was long believed to not only destroy the grass, but to be equally fatal to cattle that might feed on it. Lupton, writing in 1595, has a quaint use for it that must have been a little startling in its application, one would imagine, happy faith, blank dismay, and joyful content following each other in rapid succession. He advises us that "Adder's tongue, wrapt in Virgin Waxe, and put into the lefte eare of any Horse makes the Horse to fall downe to the grounde as though he were deade, and when it is taken out of his eare it doeth not onely waken him and reyse him, but also it makes him more lyuely and quicke"—an altogether superior animal.

We gladly give welcome to the common polypody, for, abundant as it is almost everywhere, it is a picturesque thing to grow. It is one of the first ferns to expand in the Spring. The fronds are from a few inches to a foot or more in height, and beautifully marked on their lower surfaces with the bright orange masses of fructification. We may often see this fern in large clumps, high in air, growing on the upper sides of the wide-spreading, moss-covered limbs of some old oak; but we must not therefore, if we are novices at this sort of thing, conclude that we have come across the oak fern, the species popularly so named being a little thing that grows amidst the grass and derives its name because in its general profile it suggests a spreading oak-tree. Amongst country folk the polypody had been held a cure for whooping cough, its fronds being dried and then made into a sort of tea. It must be observed, however, that it is absolutely no use to gather the raw material off an old wall or fence, or off the roots of some hedgerow shrub; any polypody to be thus employed must have been gathered off an oak-tree; all others, whatever may be the case with these, are without healing virtue. One may as well go to a doctor at once.

The hard fern is another interesting species that

one gladly welcomes. In colour it is of a dark green and the fronds are very glossy. It bears two entirely different types of frond, the barren and the fertile, and what may be held missing in feathery grace is entirely made up to us in its simplicity of form, and what we may almost call strength of character. In circumstances propitious to its welfare these fronds may be over two feet in length, these favouring conditions being abundant moisture and considerable shade. We have ordinarily found it thriving best in stiff clay, but it is by no means confined to this. The tall spore-bearers, rising from the centre of the plant, when they have fulfilled their mission, wither away, but the barren fronds are evergreen, and form striking rosettes of foliage.

The scale fern is a quaint little species. Its fronds are rarely more than some six inches long, but are striking from the marked contrast in appearance of their upper and lower surfaces; the former soft and velvet-like to the touch, and of a bluishgreen, while the latter is densely covered with reddish-brown scales that give it an almost shaggy appearance. It may be found growing on rock, but seems to have a special fondness for old walls. Vitruvius tells us that in the Isle of Crete, near a certain river, the flocks and herds were found without spleens because they browsed on this herb, while those on the opposite bank were unscathed, since there was there no scale fern to work them

woe. An Englishman, Coles, declares that "if the asse be oppressed with melancholie he eates of this herbe, and so eases himself of the swelling of the spleene," and this belief in the plant's special efficacy for the relief of the splenetic, asinine or human, was generally held from very early days. It was also applied outwardly to wounds, its rough scaly under side being applied to staunch and dry up the cut or bruise. The little wall-rue spleenwort is very generally distributed and attaches itself very kindly to one's rock-work. When found at all it is generally in profusion, tufts of it sprouting out from every interstice of the rock or from all the mortar joints of some old wall, so that the whole becomes verdant.

Other species that have found a welcome home with us are the oak fern, the broad shield fern and its near relative the prickly shield fern, the black spleenwort and wall-rue; but this bare enumeration is probably by no means exhaustive. To dwell at length upon all the pleasant possibilities in fern culture is needless—needless even to enumerate the species available to us. It suffices to say that amidst the many and very varied species that we may encounter in our journeyings there is not one that will not be a source of pleasure, and which will not amply repay any little trouble that its transfer to our domain may temporarily give us.

Amongst unbidden yet welcome guests many

species of fungoid growth appear in our rockgarden. Though we may find various species of fungi all through the Summer, they are especially characteristic of Autumn, and no one who has allowed indifference or prejudice to blind his eyes can have any notion of the variety and beauty of the forms they assume: some are purely white, and like branching coral; others have their branches an intense orange-yellow; others again have their disks as strong a scarlet as a guardsman's tunic; while the great majority are of a more subdued colour and of every possible tint of yellow, russet, purple, and brown, to black. Far more of these than is at all generally realised have edible value, and tons of despised "toadstools" that would supply wholesome food, perish unregarded each recurring Autumn. The white coral-like clavaria, for instance, that we have referred to, is not "a thing of beauty" alone, but is, when stewed with a little ham and parsley, and seasoned with a touch of pepper and salt, as dainty a dish as need be set before the most exacting of gourmands. Fungi vary in form and in size as much as in colour, and may be looked for in almost every possible position—some nestling among the long grass and dying bracken, some standing boldly erect on the open ground, others springing from decayed wood, and others again on lofty treetrunks. Almost all quickly perish and lose their beauty after gathering, and though there is no more

charming ornament in a country house than a large plate laden with various kinds embedded in moss, the charm is a very short-lived one.

The ever-shortening days of the Autumn remind us distinctly that the days of Summer are being rapidly left behind us, and that Winter is coming on apace. The boisterous vigour of March; April smiling through its tears; May so full of promise; the glorious months of June, July, and August; the fruitful September—have all received at many hands due recognition of their charms, but as to the other months the general feeling appears to be that they are periods to be lived through as endurably as may be, but that toleration is as much as they may hope for; the lyre of the poet is unstrung, and as effectually packed away till the longer days as the cricket bats and lawn tennis paraphernalia.

This lack of appreciation springs, we think, from the fact that so many of the writers and others who mould public opinion are dwellers in the town. No one who has not lived the year round far from the smoke, busy traffic and bustle of city life can at all realise that the sky may be as blue in January as in June; while the snow, instead of being the foul mixture that is such an unmitigated nuisance in big towns, is spread over everything in a broad sheet of glittering whiteness that is almost dazzling in its purity, while at other times, in the clear atmosphere of the country, when every twig of tree and bush is

laden with hoar-frost it is a peep into veritable fairyland.

In October again we have not only our brilliantly coloured fungi but the changing tints of our Autumn foliage are in perfection. The variation of tint is very great; each tree, each shrub, each plant, has its own colour. The maple will be found a mass of tawny-yellow, the black bryony a trail of bronzed purple, the herb Robert a clump of crimson. We do not of course imply that in no two different plants can we find the same tint, but that each plant always has its own livery. The maple does not vary to purple any more than the ripening wheat does, and any one who has noticed the matter carefully could name the trees and bushes in a hedgerow half a mile away by their differences of Autumn tint. Even when the frost and wind together have stripped the foliage away the fruits ordinarily remain undisturbed.

An old writer declares that "he who in all things eyes a Providence shall never lack a Providence to eye," and we may say equally that he who goes out to seek interest and beauty in Nature shall never fail of his quest. As the year travels its appointed road each recurring season brings with it interest and beauty of its own.

"Could we but open and intend our eyes, We each, like Moses, should espy E'en in a bush the radiant Deity."

The commonest weed contains within itself enough study for a lifetime, and is an epitome of all the laws of plant-growth, an autograph from the hand of the Creator, and as perfect in its fitness for its work, and in its obedience to law, as the mighty planets circling through infinity. All times, all places, contain abundant evidence of Divine wisdom, and even the pebble at our feet, could we but unlock all the history wrapped up in it, would carry us back to the childhood of the world, and reveal to us mighty changes in progress some few millions of years before the sons of men sprang into existence at all. Those who wander forth and find nothing to interest them, owe the loss not to Nature but to themselves, while the love of Nature deepens as time goes on, and an interest once developed in this direction is ordinarily a possession that endures, and which brightens the whole life.



	PAGE		PAGE
ACCIDENTAL introductions	3	Alexanders	245
	. 48	Alkanet, common	88
Achillea ægyptiaca	. 264	", evergreen	33, 89
,, aurea	. 264	Alleluia	
" filipendula	. 264	All-heal	248
,, millefolium	. 263	"All's Well That I	Ends
" Ptarmica	. 263	Well," extract from	285
" rupestris	. 264	Almond butter	146
" tomentosa	. 264	Alpine crowfoot	22
,, umbellata	. 264	Alternate-leaved go	1den
Achilles as doctor	. 144	saxifrage	162
Aconite	. 203	Ambrosinus, "Phytolo	
Aconitum Anthora	. 203	of	266
" Napellus	203	American cultivated bl	ack-
Adder's-tongue	. 306	berries	178
Adderwort	120	Anæsthetic, mediæval	
Adonis autumnalis	. 143	"Anatomy of Melanche	oly,"
	. 144	Burton's	129, 269
Adonis flower	. 143	Anchusa officinalis	
Æthusa Cynapium	. 236	,, sempervirens	89
Agency of birds	. 142	,, tinctoria	90
"A Greene Forest," Map-	-	Anemone, mountain	
let 59, 64, 120	, 287	" white	69
Agrimonia Eupatorium	. 133	,, yellow	
Agrimony	. 132	Anemone Apennina	
Alchemilla	. 211	", fulgens	
Alchemilla vulgaris	. 212	,, Hepatica	72
A1 1 C	. 173	,, ranunculoides	33,70,71
	3:	15	00/1 /1

PAG		AGE
Anemone Robinsoniana 70	Barton, extract from I	95
Angelica 249	Bate, extract from 2	88
Anserina 170	Beaconsfield, primrose-	
Anthelmintic 269	cult	50
Antirrhinum majus 153		05
,, <i>Orontium</i> 152		42
Apple 29	Beer, its pros and cons I	84
Aqua aurea 80		64
Aquilegias, cultivated 96	6 Begonia 1	60
Arab names in science 21:		
Argentina 170	I Belladonna 2 D Bell-bind 1	35
Arrowhead 42	Belle d'un jour I	34
Artemesia Absinthium 26	Bell-flowers 2	27
"Art of Longevity," Gay-	Ben Jonson, extract from 3	00
ton's 120	1	
"Art of Simpling," Coles' 24		97
Arum, or Cuckoo-pint 33, 49		
Asparagus, hedge 182		
Asperula odorata 110		
Asphodelus 5		
"Astrologaster" of Melton 17		
Athanasia 260		
Atropa Belladonna 200		
Autumn tints 31		39
Avens 24		-
Aye-green 25		_
	Bladder campion	
BABY'S-BELLS 4	1	
Bachelor's buttons 5		51
Bacon, extract from 12	Blood geranium 1	
Balsam, orange 28		
" yellow 28	Bloomfield, extract from I	
Baluchistan, plant-seeking 8		
Baneberry 250		213
Barbe de Capuchin 200	Bonney on Edelweiss 2	ig
Barberry 12.		
Bartholomeus, extract	Helthe "119, 130, 145, 2	88
from 38, 10:		

PAGE	PAG
Botanical finds 141	Camerarius, extract from 270
"Botanical Magazine" 225	Campanelle 13
Bracken, or Brake 142, 297	Campanula glomerata 22'
Brickbats, to be shunned 21	,, gracilis 220
Brighton Museum, plant	,, hederacea 22'
collections 19	,, pulla 220
"British Pastorals," ex-	,, pusilla 220
tract from 96	,, Raineri 230
Broad shield-fern 309	" rapuncoloides 22
Brooklime 127	,, rhomboidalis 230
Broom 82, 124, 147, 189	" rotundifolia 22
Browne's "Pastorals" 300	Campion, red 276
Browne's "Pseudodoxica	,, white 277
Epidemica" 109	Candytuft 262 Carrot 238
Bruisewort 85	Carrot 238
Bryant's "Flora Dietetica" 152	"Castel of Helth," of Elyot 45
Bryony, black 187, 189, 312	Catchweed 202
,, red-berried 187, 261	Cat-mint 239
" white 187	Cat's-ear 142
Buck's-horn plantain 293	Celandine, common 33, 108
Buckwheat, climbing 139	189, 286
Building up our materials 24,25	" lesser 61
Bulleyn, extract from 184	Celery seeking 66
Burdock 142	Centaury 144, 269
Burning the bracken 299	Centranthus ruber 99
Burns, extract from 83, 149	Centum-morbia 167
Burton's "Anatomy of	Cerastium gibraltiacum 236
Melancholy" 129, 262	Cerberus myth 204
Butler, extract from 299	Chamomile 92
Butter and eggs 156	Chardon-Marie 42
Butterbur, common 46	Charlock 142
,, fragrant 34, 46	Chaucer, extract from 84, 100,
Buttes, "Table Talke" 101,	271
131, 287	Cheddar pink 233
Buxbaum's speedwell 128	Chelidonia 110
	Chickweed 82, 142
Cabbage daisy 122	Chicory 208
Çalystegia sepium 135	Chiron, doctor 144

PAGE	PAGI
Chrysosplenium alterni-	Consound 213
folium 162	Convallaria majalis 79
Chrysosplenium oppositi-	Convolvulus arvensis 136
folium 162	" sepium 135
Church Calendar, floral 74	" Soldanella 136
"House of parish 184	Cool Tankard 131
Cinquefoil 144, 166, 168	Corago 130
Clare, extract from 83, 145	Cork-bark, use of 23
Clary 214	Corn blue-blottle 143, 215
Clavaria 310	Corn-cockle 274
Claytonia perfoliata 224	Corn feverfew 92
,, sibirica 33, 225	Cornflower 143, 215
Cleavers 202	Corn sowthistle 142
Climbing buckwheat 139, 142	Cornu cervinum 293
Clove 150	Cosmopolitan plants 171, 305
Clover 142	Cosnett's "Footman's
Clustered bell-flower 227	Directory" 266
Clychaur baban 42	Cotgrave, extract from 246
Codlins and Cream 57	Cottage-roof gardens 257
Cogan's "Haven of	Cowley, extract from 22, 125
Health" 265, 269	Cowper, extract from 18, 52
Coleridge, extract from 283	147
Coles, "Art of Simpling," 244,309	Cow-parsnip 239
Collecting, plant 155	Cowslip 83, 124, 249
Columbine 33, 95	Cowslip 83, 124, 249 Crab-apple 291 Crab-grass 166
Comarum palustre 171	Crab-grass 166
Colt's-foot 34, 43, 142, 173	Crane's-bills 104
Comfrey 33, 212, 213, 254	Creeping bell-flower 227
Commercial introduction	" Jenny 166
of plants 81	,, thistle 142
"Compleat Gardener,"	Crimson restharrow 226
Blake 151	Crowfoot 42
"Compleat Herbal,"	Crown Imperial 280
Pechey 87, 130, 188, 302, 304	Cuckoo-pint 40
"Complete Husbandman,"	Cudbear 160
Hartlib 186	Culpepper, extract from 88
Conradus Herebachius,ex-	Cultivation of daffodil 5
tract from 45	Culverwort 9

PAGE	PAGE
Cumulative poisons 253	Dove's-foot 108
Curtis, "Flora Londinen-	Drayton, extract from 85,
sis" of 138, 259	97, 199, 244, 271, 272
	Dusky crane's-bill 106
DAFFODIL 34, 56	Dwale 205
Dahlia, origin of name 160	"Dyetery of Helthe,"
Daisy 83, 155	Boorde 119, 130, 145, 288
Dame d'onze heures 93	
Dame's violet 224	Early-closing flowers 125
Dandelion 82, 124, 142, 155	Echmacea purpurea 294
Darwin, seed experiments 142	Edelweiss 32, 218
Dates 214	Egrimoine 132
Datura Stramonium 197	Egyptians in England 184, 185
Deadly nightshade 205	Eisenhut 203
Dead-nettle 156	Elder 124
"Delights for Ladies,"	Elyot, "Castel of Helth" 45 English cultivated black-
Platt 86, 270	English cultivated black-
Dekker, extract from 284	berries 178
Dent-de-Lion 98	"English Housewife's
"De proprietatibus rerum" 38 "Description of England,"	Household Physicke" 214
"Description of England,"	"English Parnassus,"
Harrison 185	Poole 177, 193
Destruction by ivy 193	Error of underplanting 30
Dewberry 179	Euphrasy 249
Dianthus cæsius 233	Evening primrose 195
" deltoides 231	" Star 195
" glaucus 235	Evergreen alkanet 33, 90
" neglectus 235	Eyebright 248
Digitaline 253	
Digitaline 253 Digitalis purpurea 252	FAIR MAIDS OF FEBRUARY 42
Dioscorides, reference to 43,	"Family Dictionary," Sal-
256, 287	mon 46
Doctrine of Signatures, 105, 109	Feast of the Purification 42
Dodoen's "Historie of	Febrifuga 275
Plants" 95	Fen-land flower culture 58
Dog-rose 149, 214, 239, 290	Fennel 201, 238, 286
Dog's parsley 238	Fen-rue 121
Dog-violet 238	Fern culture 25, 34, 296, 297
-	

PAGE	PAGE
Fern-seed myth 299	GALIUM APARINE 202
Feverfew 248, 275	Gallows-grass 166
Field convolvulus 137	Gants de Nôtre Dame 42
Fiore d'Adono 144	Garden globe-flowers 122
Five-finger grass 166	"Garden of Beauty" 97
"Fiue Hundred Pointes	"Garden of Pleasant Flow-
of Good Husbandrie" 78,	ers" 195
114, 169, 183, 208, 247, 298	Garlic 100, 201
Flax 278	Gathering of May-dew 86
Flax-headed goldilocks 277	Gayton, "Art of Lon-
Flax-weed 278	gevity" 129
Fleur-de-luce 214	Gentians 216, 217, 218
"Flora Anglica" 235	Gentiana acaulis 217
"Flora Dietetica" 152	" verna 216
"Flora Historica" 47	Gentianella 217
"Flora Londinensis" 138, 259	Geraniums, wild 104
Fool's parsley 236	Geranium argenteum 104, 108
Foolish Hemlocke 238	" nodosum 107, 153
"Footman's Directory,"	$bhaum \dots 106$
Cosnett 266	,, phæum 106 ,, purpureum 104
Forget-me-not 106, 115, 282	Gerard, extract from 50, 70,
"Foure Bookes of Hus-	77, 79, 111, 114, 119, 123,
bandry" 45	128, 143, 148, 155, 162, 184,
Foxglove 106, 251, 252	198, 202, 205, 223
Fragrant Butterbur 34, 46	Germander speedwell 127, 283
Frauen Mantel 42	Germination of seeds 55
Fritillaria armena 280	Gilliflower, or wallflower 150
" Meleagris 279	Gilt-run-by-ground 173
hudica 279	Ginny-hen flower 280
,, pudica 279 ,, recurva 279	Gipseywort 142
	Glacier pink 235
Fritillary 279 Frog's-grass 63	Glasswort 165
Frugis, "Vade Mecum"	
of 44	Globularia cordifolia 294
Fuchsia, why so called 160	Goat's-beard 123
Fungaid growths 168	Going daffying 57
Fungoid growths 310	Golden feather 275
Furze 82	" moss 152

PAGE	PAGE
Golden saxifrage 161	Hedge-mustard 142
Goldilocks 277, 278	Hedgerife 201
Goose-grass 57, 115, 170	Heliotrope, winter 48
Goutweed 247	Hellebore 202
Gowk-meat 76	Helmet-flower 203
Grand Liseron 134	Hemlock 241, 263
Grass of Parnassus 163	Hemp 166
Great Morel 206	Henbane 199, 201
"Greene Forest," A 150, 262	Hepatica, so called 72
Green hellebore 202	Herb-bennet 249
Grim the Collier 222	Herb Christopher 250
Grip-grass 202	Herb gathering 119
Ground ivy 172, 183	Herb-Gerard 248
,, pine 252	Herb of grace 285
Groundsel 65, 142	Herb-paris 29
Guimauve 262	Herb-Peter 250
	Herb-Robert 33, 104, 312
	Herb-twopence 165
HACQUETIA EPIPACTIS 73	Herrick, extract from 283
"Hamlet," extract from 284,	Herzfreydt 114
285	Hesperis matronalis 224
Hard fern 307	Hieracium aurantiacum 223
Hare-bell 83, 227	" intybaceum 224
Hare's-ear 42, 289	Hippocrates, reference to 43
Hares, to catch 200	Hippothæ rhamnoides 292
Harif 202	"Historia Mundi" of
Harrison, "Description of	Pliny 72, 211
England" 185	"Historie of Plantes" of
Hartlib, "Complete Hus-	Dodoens 95
bandman" 186	"History of Virginia" 197
Hart's-tongue 303	Hoary-leaved potentil 171
"Haven of Health," Cogan 265,	Hog's-fennel 239
269	Holly-blue Butterfly 194
Hawkweed 110	Hollyhock 262
Heart's-ease 115, 144, 248	Home-made edelweiss 221
Heart's-joy 114, 115	Homer, extract from 145
Heather 29	Home-made preparations 270
Hedge-bell 135	
135	Honesty 271

PAGE	PAGE
Honeysuckle 190	Knit-back 213
Hooded bindweed 135	Knot-grass 142
Hook-heal 57	Knotted crane's-bill 107
Нор 180, 201	
Hop culture, Scot 185	L'Adonide 144
Hop-trefoil 155	Lady fern 301
Horehound 82, 257	Lady's-bedstraw 42
Horse-radish 204	Lady's-mantle 33, 42, 212
Horse-mint 239	Lady's-seal 77
"Hortus Kewensis" 225	Lady's-smock 42, 73
House-leek 242, 251, 256	Lady's-thistle 42
Hudson, "Flora Anglica" 235	Lamb's-lettuce 57
Hugh Platt, "Delights for	Landscape gardening 21
Ladies" 86, 270	Lavandula spica 118
Hull or Hulver 178	Lavender 117
Humours of the body 131	Leek 125
Hyacinth 34, 59 Hyacinthus, legend of 60	Lent-lilies 57, 79
Hyacinthus, legend of 60	Leontodon 98
	Lesser celandine 61
IBERIS SEMPERVIRENS 264	,, snapdragon 154
Impatiens fulva 164, 281	Letting and hindering 178
,, Noli-me - tangere 281	Lily Convally 79
Indigenous? what is 40	Lily of the Valley 33, 79
Ipecacuanha 145	Linaria, ivy-leaved 157
Iris myth 215	,, pale 156
"yellow 214	Linaria vulgaris 155
Ivy 31, 192	Linneus, "Species Plan-
Ivy-leaved bell-flower 227	tarum," of 163
" toadflax 157	Linosyris vulgaris 27
,,,	Linum campanulatum 278
Jack and Jill 173	,, flavum 278
Japan, introduction of	" provinciale 278
English plants 81	,, viscosum 278
Jasmine 211	Live and let live 93
jasmine 211	Llawenlys, herb of gladness 120
	Lobelia, why so called 160
KEATS, extract from 79	
Kidney-leaved saxifrage 159	Logan-berry 179

PAGE	PAG
London-pride 33, 159	Markham, extract from 101
Loosestrife, spotted 167	214, 257, 288
,, tufted 167	Marsh mallow 26
" wood 167	" orchis 250
" yellow 167	" potentil 17
Lord Beaconsfield and	,, violet 144
primroses 50	Marvell, on fern-seed 300
Lord of the wood 114	Mason, extract from 111
Lovell, extract from 101, 117,	Matthiolus and daisy 5:
124, 130, 250, 269, 304	Maydew, gathering 80
Lunaria 271	May-lily 79
Lupton's "Notable Things"	Mayweed 14:
199, 200, 245, 288, 306	Meadow crane's-bill 10
Lychnis diurna 276	,, crowfoot 33, 100 ,, pink 23
", vespertina 277	,, pink 23
Lydgate, extract from 37	,, rue 12
Lysimachia Nummularia 166	,, rue 12 ,, saxifrage 150 Mealy primrose 54 Medal plant 27
,, punctata 167 ,, vulgaris 167	Mealy primrose 52
" vulgaris 167	Medal plant 27
	Melilotus officinalis 27
Magnolia, why so called 160	Melilot, white 27
Maiden pink 231	" yellow 272
Maitrank 114	Melton's "Astrologaster" 178
Male fern 299	Mens sana in corpore sano 210
Mallow, common 26, 136, 261	Milfoil 183, 265
" marsh 261	Milk thistle 29
" musk 260	Milton, extract from 53, 83, 28
Malva moschata 261	Mint 122
" sylvestris 261	Mirth-causing herbs of
Manchettes de la Vierge 134	Lovell 130
Maple 312	Mithridates Eupator 13:
Maplet, extract from 59, 64,	Mizaldus, extract from 188
110, 120, 135, 146, 150, 256,	Moir, extract from 14
262, 274, 287	Money-flower 27
Marguerite 84 Mariendistal 42	Moneywort 169 Monks as physicians 72
Mariendistal 42	Monks as physicians 74
Marigold 143	Monk'shood 42, 202 Moon-daisy 120
Marjoram 118	Moon-daisy 120

PAGE	PAGI
Morning glory 134	Osmunda regalis 297, 304
Mountain ash 30	Our Lady's sleeves 134
" buttercup 61	Ovid, extract from 143, 203
" violet 144	Oxalis, cultivated species 75
Mourning widow 106	Ox-eye 33, 86, 126, 275
Mouse-ear Scorpion-grass 42,	Ox-tongue 42
82, 282	
Mullein, great 189, 254, 255	Pain d'oiseau 152
Munch Cappen 203	Pale linaria 156
"Muse's Elysium" of	Pansy 74, 144
Drayton 199	"Paradisus" of Parkinson 96
Museum plant-collections 91,92	Parkinson, extract from, 47
· /-1/-	54, 89, 96, 120, 139,163, 165
Nan am yooy	182, 238, 247, 293
NAP-AT-NOON 126	Parnassia palustris 163
Narcissus cyclamineus 59	Parsley-piert 57
Natural History Societies 64	Parsnip 238
Nature-cult in schools 98	Pasque-flower 71
Nature's rock-gardens 21	Paxton, Sir Joseph 226
Navet du Diable 188	Parsnip 238 Pasque-flower 71 Paxton, Sir Joseph 226 Pearlwort
Nettle 261	Pearly cudweed 290
"New Herball" of Turner 168	Pechey "Compleat Herbal" 87,
North Collection at Kew 147	130, 188, 302, 306
Northern Vine 182	Pencilled Geranium 107
Numidia Meleagris 280	Penny-flower 271
	Pennyroyal 269
Oak fern 309	Pentadactylon 168
Onions as a ground crop 66	Peony myth 144
Ononis fruticosa 226	Pepys, extract from 86
Opium-taking 275	"Perfite Platforme of a
Oppilation of the liver 133	Hoppe Garden " 184
Opposite-leaved golden	
saxifrage 162	Periwinkle, larger 93
Orache 102	,, smaller 93 Pervinke 94
Orange balsam 281	
" hawkweed 223	Pestilence-wort 47 Petite Campanule 229
Ornithogalum umbellatum 92	
	Pheasant's-eye 143
Orpine 152, 251	Phillips, "Flora Historica" 47

PAGE	PAGE
Pigeon's-grass 166	Proserpine, flower of 57
Pilewort 34, 61, 248	Protection of plants 220
Pin-centre primroses 52	"Pseudodoxica Epidemica,"
Pink, Cheddar 233	Browne 109
" glacier 235	"Pun-provoking thyme" 118
" maiden 231	Purple comfrey 213
Plantago Coronopus 293	Pyrus japonica 72
Plantain 166	
Plaster clover 273	Quartz not suitable 19
Platt," Delights for Ladies" 86	"Quest of Cynthia," ex-
Pliny, extract from 72, 110	tract from 244
Polypody 307	Quick-in-hand 282
Poole, "English Parnassus"	Quintefeuille 168
177, 193	~
Pomatum 292	RAGWORT 289, 295
Рорру 143	"Raisins of the Sunne" 214
Popular plant-names 42	Ranunculus amplexicaule 61
Porret 257	" montanus 61
Portland arrowroot 49	"Recollections of a Happy
Potentilla anserina 170	Life," North 147
,, argentea 171	Red valerian 33, 99
,, atrosanguinea 172	Rest-harrow 226
Communa	
Comurum 1/1	
	Rhodia radix 251
,, crocea 172	Rhodia radix 251 Rib-grass 166
" crocea 172 " Fragariastrum 171	Rhodia radix 251 Rib-grass 166 Ribwort 142
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 172	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 172 ,, reptans 168	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 172 ,, reptans 168 ,, Tormentilla 169	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 172 ,, reptans 168 ,, Tormentilla 169 Prickly shield-fern 309	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 172 ,, reptans 168 ,, Tormentilla 169 Prickly shield-fern 309 Primprint 57	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 168 ,, reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 168 ,, reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54 ,, peerless 57	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 168 ,, reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54 ,, peerless 57 Primroses 32, 50	Rhodia radix 251 Rib-grass 166 Ribwort 142 Rock stonecrop 152 Rosebay 142 Rose-centre primroses 52 Rosemary 283 Rose-root 152, 251 Rothbrauner Kranichschnabel nabel 106 Royal fern 304 Rubus cæsius 179
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 168 ,, reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54 ,, peerless 57 Primroses 32, 50 Primula farinosa 54	Rhodia radix
", crocea 172 ", Fragariastrum 171 ", maculata 172 ", nivalis 168 ", reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54 ", peerless 57 Primroses 32, 50 Primula farinosa 54 ", frondosa 54	Rhodia radix
,, crocea 172 ,, Fragariastrum 171 ,, maculata 172 ,, nivalis 168 ,, reptans 169 Prickly shield-fern 309 Primprint 57 Primrose, mealy 54 ,, peerless 57 Primroses 32, 50 Primula farinosa 54	Rhodia radix

Dutant 1 1 1	PAGI
Ruins, ivy-clad 193	Sentiment in plant-names 115
Ruprechtskraut 105	Serpentaria 120, 167
Ruskin, extract from 56, 234	Shakespeare, extract from 52
	83, 143, 191, 203, 300
SAFFRON-CROCUS 211	Shenstone, extract from 117
Saint Patrick's Cabbage 160	"Shepherd's Calendar" of
Sallow-thorn 292	Spenser 57
Salmon, extract from 46	Shepherd's-purse 42, 82, 142
Salsify 124	Shining-leaved crane's-bill 108
Samphire 124, 238	Sigillum Salomonis 77
Sarracenia purpurea 164	Silver-leaved crane's-bill 108
Saxifraga aizoides 161	Silver platter 271
" Cymbalaria 161	Silverweed 170
" Elizabetheæ 73	"Simpling, Art of," extract
" granulata 159	trom 244
" oppositifolia … 158	Small convolvulus 136
" Rhei 161	Smyrnium Olusatrum 245
" Tombeanensis 161	Snails, a garden pest 194
" Wallacei 161	Snake's-head 42, 280
Saxifrages, British 157	Snake-weed 120
Scale fern 308	Snapdragon 149, 153
Scilly Isles, flower culture 58	,, lesser 154
Scorpion-grass 166	Sneezewort 248, 263
Scot, on hop culture 185	Snowdrop 34, 40, 214
Scott, extract from 52, 149, 302	Society of St. George 234
Sea buckthorn 291	Soil, question of 29
" convolvulus 136	Soldanella 221
" pink 16	Soldanella alpina 221
Sedum acre 152	Solomon's-seal 33, 76
,, album 153	Solsequium 126
,, Rhodiola 152 ,, rupestre 152 ,, Telephium 152	Sowthistle 142
,, rupestre 152	Spearplume thistle 142, 290
" Telephium 152	"Species Plantarum" of
Seedling forms 55	Linneus 163, 225
Sempervivum arachnoideum 257	Spenser, extract from 52, 57,
,, tectorum 256	84, 97, 103, 147
Senecio aurantiacum 295	Spiræa tomentosa 153
" Doronicum 295	Spotted loosestrife 167
75	

PAGE	PAG
Spotted orchis 260	Thorowax 290
Spring, our starting-point 37	Thrift 10
Squinancywort 250	Throatwort 100
Starch from wild arum 50	Thyme-leaved Sandwort 142
Star of Bethlehem 92	Timothy grass 166
Stitchwort 78	Tine 26
Stone bramble 150	Tine-tare 5'
Stonecrop 149, 151, 251	Toadflax 15.
Stramonium 197	Toadstools, or fungi 310
Strawberry 102, 144, 291	"Toilet of Flora," extract
Strawberry-leaved tormentil 171	from 186
Stray-berry 102	Tormentil 166
Strowing herbes 118, 264	Touch-me-not 28:
Stubwort 76	Town flowers 150
Stupidity, remedy for 119	Tragopogon pratense 12
Succory, or chicory 208	" porrifolius 12 Tree Primrose of Vir-
Sunflower 126	
Sweetbriar 82	ginia 19
Sweet Springtide 38	,, roots as material 2
Sweet violet 144	Troll-flower 12
Swiss wild flowers 146	Trollius europæus 12
Sword-flag 214	Tuberous comfrey 21
Symphytum officinale 212	Tulip 26
" peregrinum 213	Turner, "New Herball" 16
,, tuberosum 213	Tusser, extract from, 78, 114
	169, 177, 181, 183, 208, 216
"TABLE TALKE," Buttes, 101,	247, 264, 298, 304
131, 287	"Tusser redivivus" of
Tansy 257, 264	Hilman 26
Tennyson, extract from 59	Tussilago Farfara 4
Thalictrum flavum 121	Tutsan 24
"Theatrum Botanicum,"	Twice-writhen 12
Parkinson, 120, 139, 163, 238	Twopenny-grass 16
Thistles in Australia 82	
Thomson, extract from 145	UDALL, extract from 24.
Thorn apple 196	Under-planting, a mistake 3
"Thousand Notable	Unexpected appearance of
Things," Lupton 199	plants 138, 14

PAGE	PAGE
United States, introduced	"Water for the Plague" 46
plants 82	Water-sage 215
Uvedale Price, extract from 21	Whitehall, botanising in 141
	White heather 34
"VADE MECUM" of Frugis 44	White satin-plant 271
Valerian, red 33, 99, 149	White stonecrop 153
Variation to white 104	Whitlow-grass 166
Venner's "Via recta," 103, 131,	Willowherb 82, 142
150	Wilson, extract from 147
Verbascum phænicium 255	Windflower 34, 69
Veronica amethystina 127	Winter heliotrope 48
,, aphylla 127	"Winter's Tale," extract
" corymbosa 127	from 284
" gentianoides 127	Wisbeach, flower culture 58
,, latifolia 127	Witches Gowan 122
,, sibirica 127	Withweede 135
,, spicata 127	Withy-bind 135
,, taurica 127	Wolf's-bane 32, 203
"Vertues" of plants 44	Woodbine 190
Vervain IIO	Wood buttercup 63
"Via recta," Venner, 103, 131,	Wood loosestrife 167
150	Woodrowell 116
Vinca major 93 ,, minor 93 Viola lutea 147	Woodsorrel 75
,, minor 93	Woodsour 76
Viola lutea 147	Wordsworth, extract from, 57,
,, odorata 144	61, 83
Violette des sorciers 94	Wormwood 201, 248, 267
Violets 144	Woundwort 248
Viper's-bugloss 149, 201	Wrestharrow 226
Virgin Mary, plants of, 42,73,77	
Vitality of seeds 56	YAM 190
3	Yarrow, or milfoil 144, 263
WALDMEISTER 114	Yellow balsam 281
Wallflower 32, 149	,, iris 16, 164, 214
Wall-pepper 151	" loosestrife 167
Wall-rue 149, 309	" monk'shood 203
Wasser Schwertlilie 215	" mountain saxifrage 161
	Yellow violet 147
UNWIN BROTHERS, LIMITED, THE GRE	SHAM PRESS, WOKING AND LONDON.





