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July 30. 1842.

Frontispiece to Volume y^o 1.st

The Dartford Warbler. drawn from Nature & colored by J. Bolton.

HARMONIA RURALIS;
or,
AN ESSAY
towards
A NATURAL HISTORY
of
BRITISH
S O N G B I R D S.

•••••
VOLUME THE FIRST.
•••••

ILLUSTRATED
with Figures the Size of Life, of the Birds, Male and Female,
in their most natural Attitudes;
their Nests and Eggs, Food, favourite Plants, Shrubs, Trees, &c. &c.
FAITHFULLY DRAWN, ENGRAVED, AND COLOURED
AFTER NATURE.

By the Author,
ON FORTY COPPER-PLATES.

•••••
The Warblers are heard in the Grove,
The Linnet, the Lark, and the Thrush,
The Blackbird and soft-cooing Dove,
With Music enchant every Bush.
•••••

NATURA SEMPER EADEM, SED ARTES SUNT VARIE.

•••••
BY JAMES BOLTON.
•••••

PRINTED FOR AND SOLD BY THE AUTHOR, AT STANNARY, NEAR HALIFAX;
SOLD ALSO BY B. AND J. WHITE, IN LONDON, AND MAY
BE HAD OF ALL OTHER BOOKSELLERS.

1794.

TO
THE BRITISH LADIES,
to
NATURALISTS,
and to
all such as admire
THE BEAUTY OR MELODY
of the
Feathered Warblers,
THIS ESSAY
towards
A NATURAL HISTORY
of
BRITISH SONG BIRDS,
is most respectfully inscribed
by
their obedient
and humble Servant,
The Author.

PREFACE.

..P..O..E..

Ornithology being a very extensive branch of Natural History, complete works on that subject, if well executed, must be attended with very great expence to the publisher, and consequently must cost an high price to the purchasers of copies. I hope, therefore, it will not be unacceptable to the lovers of Songbirds, to be possessed of an History of these alone, separated from all the rest.

No one who takes a walk in the fields in a summer morning, can fail of being agreeably entertained by the Feathered Warblers, and may perhaps return with a wish to be informed in the history of the individuals which have afforded pleasure of so refined and so exalted a kind.

The country gentleman, who is desirous to know what species of Birds they are which with their song so agreeably enliven the trees in his avenue, or the shrubs in his wilderness, may not be willing to go to the enormous expence of a general History of Birds, with figures faithfully drawn, and coloured from nature.

The lady who gives place in the apartments of her house to a few pretty Songbirds, may wish to be informed of their manners, nests, eggs, food, places of resort, &c. &c. in a wild state, or state of nature; at the same time having no desire to acquaint herself with the history of the vulture, the cormorant, the crow, the gull, the booby, the dottrell, &c. &c.

The Nests of Birds, containing the Eggs, faithfully copied from the natural subjects, will not, I trust, be unacceptable to ladies, to ornithologists, and to all those who find pleasure in contemplating the works of nature.

The Eggs on many of the British Birds, are excellently figured in a superb work on British Birds, now publishing by Mr. Lewin. These were painted from the natural subjects in the late Portland Museum, most of which subjects
were

were collected in Yorkshire, and communicated to that noble repository by me.

The natural history of a Bird can no more be perfectly known, while we are in any part ignorant of its nest, eggs, food, habitation, &c. than we can be said perfectly to understand the natural history of a moth or a butterfly, at the same time that we are ignorant of the caterpillar and the aurelia, from which this moth, or that butterfly was produced.

Birds, considered in respect to the elegance of their shape, and diversity and brilliancy of their colours, are doubtless superior to any other class in the brute creation. Where can we find a more beautiful piece of mechanism than in the wing of a Bird displayed, or even in a single feather, when minutely examined? There is an easy and elegant sweep in the outline which circumscribes a Bird, perhaps not to be found in that of any other animal, and the beautiful arrangement of the feathers in every part claims our admiration. 'Tis pity to observe, that in most figures of Birds, the feathers are either wholly disregarded, or else most vilely mangled, most wickedly deranged.

In describing the nests, though I have mentioned the materials which composed the individual under notice, it must not however be understood, that the same species of Bird always strictly confines itself to the same materials, though in general we find it so; for I have seen many instances to the contrary, one of which I will give as I find it in my notes concerning Birds. On the tenth of May, A. D. 1762, I observed a pair of goldfinches beginning to make their nest in my garden; they had formed the groundwork with moss, grass, &c. as usual, but on my scattering small parcels of wool in different parts of the garden, they in a great measure left off the use of their own stuff, and employed the wool; afterward, I gave them cotton, on which they rejected the wool, and proceeded with cotton; the third day I supplied them with fine down, on which they forsook both the other, and finished their work with this last article. The nest, when completed, was somewhat larger than is usually made by this bird, but retained the pretty roundness of figure, and neatness of workmanship, which is proper to the goldfinch. The nest was completed in the space of three days, and remained unoccupied for the space of four days, the first egg not being laid till the seventh day from beginning the work.

The descriptions of the Birds, though plain and simple, are nevertheless true, being made immediately from a close examination of the Birds themselves. If they
be

be found to disagree with the descriptions given by others, as of course they must in little particulars, it must be observed, that the colours of some Birds vary according to age, some species not arriving at the perfect state of their feathering till three or four years old. I have endeavoured, however, to make choice of the most perfect subjects, and as I found them in their wild state, not cramped or mutilated by being confined in cages.

In the same genus or family of Birds there is a general similarity or agreement prevails amongst the species, in the figure and situation of the nests, as well as in the materials of which they are composed, and the eggs which they contain.

The various species of larks compose their nests of dried grass and hair, placing them on the ground. Linnets chuse out some low bush, and compose their nests of moss, hair, and down. Finches nestle in some prickly shrub or tree, and fabricate their nests with small sticks, moss, wool, roots, hair, and feathers. Wrens and most of the summer warblers hide their nests under brakes or bushes near the ground, in walls or hollow trees, and make use of fern, moss, grass, hair, and feathers. But be the matter of which the nests are composed, or the place where they are found, what they may, there is in every species something peculiar to itself, in the size, form, and habit of the nest and eggs together, by which any one that has well observed them, is enabled to say with certainty, on sight of the nest and eggs, to what Bird they belong.

The Eggs, in some species, are subject to variety in respect of colour; the tit-lark, for instance, is a perfect Proteus in this particular, not only in separate nests, but in the same individual. I have seen nests of this bird with five or six eggs, and not two amongst them precisely alike, either in the markings, or the hue of colour. The Eggs of the lesser field-lark are also variable in colour.

The greater and lesser crested larks, though said to be natives of Yorkshire, are rarities. I have not yet been able to discover, though I have for many years made diligent search after them.

That the male birds in the skylark, the lesser field-lark, and the woodlark, have a power of raising the feathers on the crown, in form of a crest, and that they do erect them in breeding-time, I very well know; but as to what are called crested larks, if specifically distinct from these, are birds with which I am unacquainted; and if any one will favour me by sending fair specimens of them, alive or dead, the obligation shall be gratefully acknowledged by me.

If

If the keepers of cage birds should find fault with this essay, because I have not allotted a particular chapter to the diseases and cure of each species, I would refer them to a well-known little book of Songbirds, by Mr. Eleazar Albin, where they will find enough said on this subject, most of which he transcribes from Ray's edition of Willoughby's Ornithology, as Ray before him had done from other writers on the subject, as far back as to the time of Aldrovandus and Gesner.

Such of the Songbirds as abide with us all the year, feed on various kinds of seeds, fruits, and insects. The goldfinch, chaffinch, linnets, &c. delight in the seeds of the various species of thistle, ragwort, groundsell, and other downy seeded plants. The yellow-hammer, bunting, reed-sparrow, &c. on grain, and the seeds of grass and reed. Thrushes on berries, worms, small snails, and beetles, of all which a sufficient supply may easily be obtained during the warmer months; and if the keepers of cage birds would be at a little pains to provide them with their natural food, it would tend much to the health and value of those birds; whereas they are often destroyed, or spoiled, by feeding on old musty seeds, stale sour bread, and putrid water. The summer warblers must be fed with animal food, of all which the various species of flies, brought to them alive, are the most agreeable.

But in one, as well as the other, your success chiefly depends on the freshness and sweetness of their food and water, in not giving them too large a quantity at one time, and too long neglecting them at another; in placing them in an airy, well-lighted room; in securing them from the severity of the winter's cold, and screening them from the scorching heat of summer; in keeping their apartments free from cats, mice, or other vermin; and in keeping their cages, cups, boxes, and every thing about them, at all times, perfectly sweet and clean.

At the heads of the descriptions I have given the Linnæan names of the Birds, with references to the Systema Naturæ of that Author; and at the end of the other volume will be given an index, with references to the figures of Authors.

The second volume, which completes the work, will contain the same number of plates as this, and will be published in due time.

STANNARY, NEAR HALIFAX,

April the 1st, 1794.

Books published by the Author,

- I. An HISTORY OF BRITISH FERNS, in Two Parts, Royal Quarto, with Figures of all the Species and Varieties, drawn, engraved, and coloured from Nature, by the Author, Price, in Boards, 2*l.* 2*s.*
 - II. An HISTORY OF FUNGUSES growing about HALIFAX, with the Appendix, Four Volumes, Royal Quarto, with 182 Plates, containing a great Number of Figures, all drawn, engraved, and beautifully coloured, by the Author, Price, in Boards, 8*l.* 8*s.*
- Sold by the Author, at Stannary, near Halifax; by B. and J. White, in London; J. Todd, York; J. Binns, Leeds; and by all other Booksellers.

STURNUS VULGARIS.

Linnæi Syst. Nat. 290.

THE STARLING, OR STARE.

PLATE I.

The Starling in shape resembles the common black-bird, but is inferior in size. The bill is compressed, broad at the tip; in the cock of a pale yellow, in the hen dusky; the irids of the eyes are brown, paler on the upper side.

The head, neck, back, throat, breast, and belly, are black, with a gloss of purple, varying into green, very bright and glistening.

The feathers are narrow and pointed, and those on the neck, back, rump, and on the thighs, in the male bird, are tipped with a brownish colour at their extreme points. In the female these spots are paler, larger, and more numerous, being extended over the whole head, neck, breast, and belly.

The first quill feathers of the wing are of a dusky black, with narrow borders of a pale brown. The second quills are of the same colour, with a shade of a darker hue near the tip. The covert feathers glisten with green, and those next the shoulder of the wing are some of them pointed with brown. The tail is shorter than that of the blackbird, a little forked, and of a dusky black; the feathers have narrow borders of a pale brown. The legs and feet are of a yellowish flesh colour; the claws horn colour, with black tips.

Their food is worms, beetles, and various kinds of berries, and in this part of the kingdom they seem to be particularly fond of those of the * *berry-bearing-heath*, *crowberries*, of which I have given a figure, with its fruit, at the bottom of the plate.

* *Empetrum nigrum.*

NEST AND EGGS OF THE STARLING.

PLATE II.

Starlings make their nests in old buildings, such as castles, towers, &c. and sometimes in the clefts of rocks.

The nest before me is formed of straw in the lower part, in the middle with a coarse kind of hay, and the inner coat or lining of fine soft hay, with a few feathers. The whole is a rude and loosely compacted fabrick, neither firm nor handsome.

In this nest was four eggs, about the size of those of the throstle, they are of a pale bright blue, with a cast of green, and are destitute of spots.

The Starling is not valued for his own song, but for the beauty of his plumage, for his docility and aptness in learning to whistle or to speak.

Those who wish to have good birds for caging, should have them taken out of the nest at three or four days old; for if they are suffered to remain ten or twelve days in the nest, they will retain, for their whole lives, too much of their own harsh notes and disagreeable scream.

As soon as they are taken out of the nest, they may be kept in a small basket, with soft dry moss. Let them be kept reasonably warm, and fed often, giving them but little at a time. Let the moss be renewed every day, and let them at all times be kept dry and clean, for on this care depends your success. Such tunes or notes as you wish them to learn, should be played or whistled to them, from the first day you take them out of the nest.

TURDUS VISCIVORUS.

Lin. Syst. Nat. 291.

THE MISSELBIRD.

PLATE III.

This is the largest of the British song birds, being ten inches and an half long. My figure in plate the third is a little reduced to bring it within compass. The bill is short and strong, the upper chap pretty much curved, and of a black colour; the lower is dusky at the point, and horn coloured at the base.

Between the bill and the eyes is a bed of white downy feathers, and several upright black bristles grow about the base of the bill. The inside of the mouth is yellow, the eyes brown, and the feathers which cover the ears are of a pale colour.

The head is of a dusky ash colour, with a strong cast of olive, the back and rump are olive colour, the latter more yellowish.

The tail consists of twelve feathers of the same colour as the back, except the two outmost on each side, which at the tips are clouded with white.

The lower side of the bird, from bill to tail, is white, with a dash of yellow brown on the sides of the breast, and under the wings, and all the white part is beautifully spotted with black spots of various shapes; those on the throat and upper part of the breast are triangular, on the lower part oval or kidney-shaped, and towards the tail lunated.

The legs and feet are yellow, the claws are black, very much curved, and sharp pointed.

The wing is olive-coloured, the first and second quills having white tips. The coverts have broad white margins. Feeds on the berries of * *misseltoe* when it can find them; it also eats insects, bilberries, haws, and other small fruits, like the rest of the thrushes.

* *Viscum album*,

NEST AND EGGS OF THE MISSELBIRD.

PLATE IV.

The Misselbird most commonly places her nest in an ash tree, at the coming out of one of the branches, a good height from the ground. In the nest before me the first lay consists of several kinds of moss, hay, stalks of dried plants, &c. which being brought in great plenty, and disposed in a very rugged manner, constitute the chief part of the fabric. Upon this follows a lay of plaster, composed of clay mixed with cow's dung, so well tempered together as to form, when dry, an hard tough shell of about half an inch thick. Upon this is laid another covering of soft dry grass, which is neatly platted both in the cavity and all round the borders of the nest. The diameter of the cavity is about four inches, the depth not fully two.

This nest was built between the triple division of the branch of an ash tree, and hung all round with the **ash-liverwort*, so as to hide it on every side. On removing it I found that some part of the liverwort grew from the tree above and round about the nest; but the greater part of it was very artfully wove in with the grass and moss on the outer margin of the brim, and left to hang loose about the sides of the nest, just as it hung on other parts of the tree. By this artifice the bird often secures her nest, concealing it from the gape of the ignorant country bumpkin, or the prying eye of the mischievous school-boy. How cunning is nature in the indulgence and preservation of her species!

She lays four eggs of a dusky flesh colour, having a cast of green, and large spots of brown or purple. The Misselbird is the earliest of our song birds. In the month of January, if the weather is mild, he sings most sweetly; his song resembles that of the throstle, but his pipe is sweeter, and his notes more mellow.

* *Lichen fraxineus.*

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100-100000
100-100000

TURDUS MUSICUS.

Syst. Nat. 292.

SONG THRUSH, OR THROSTLE.

PLATE V.

The bill is an inch long, the upper mandible of a dusky colour, the lower yellow. The mouth within yellow, between the bill and eyes is a pale coloured spot, and between that and the throat a dark one. The eyes are brown, large, very bright, and piercing.

The crown of the head, the back, and whole upper side are of a pleasing olive colour, in some places inclining to the yellow, as about the lower part of the back, in others more dusky, as about the head.

In the wings are eighteen quill feathers of a dusky olive colour, with pale coloured edges. The first and second covert feathers have white tips, the feathers under the wings are a kind of pale flame colour.

The whole underside of the bird, from bill to tail, is white, with only a faint dash of olive colour on the sides of the breast, and the throat, breast, and belly elegantly spotted with black spots of various figures, as in the last species.

The tail consists of twelve equal feathers of a dark olive colour. The legs and feet are of a light horn colour, the toes long and slender, and the claws black.

The Throstle feeds on insects and berries, is fond of the different kinds of bilberries. I have given figures of the * *cranberry* in flower, and with fruit.

The cock bird perches on the uppermost twig of the tallest trees, and sings stoutly from March to September.

* *Vaccinium oxycoccus*.

NEST AND EGGS OF THE SONG-THRUSH.

PLATE VI.

Song-Thrushes generally build their nests in some close thicket, or low bush, near the ground. The outside is formed of small sticks, withered leaves, grass, and various kinds of moss. Plenty of these materials are huddled together in a loose and negligent manner.

The inmost coat or lining is made of a mixture of clay and rotten wood, with a few slender blades of withered grass to bind it together. This coat, in the nest before me, is near half an inch thick; upon this plaster the eggs are laid, no grass or soft covering being put upon it, as in that of the blackbird, misselbird, &c.

The eggs are of a beautiful pale blue, with a cast of green, and marked with a few distinct purple spots.

The cock is distinguished from the hen by the general hue of his colours being brighter and stronger, particularly by the light-coloured line which passes from the bill to the eyes being whiter in the cock, and the dark-coloured line being darker.

TURDUS MERULA.

Syst. Nat. 295.

THE BLACKBIRD, OR OUZLE.

PLATE VII.

The bill is an inch long, in the cock of a fine bright gold colour, in the hen dusky towards the point, yellow towards the base. The inside of the mouth is yellow, the eyes are brown and very bright, the circle round them yellow.

The whole plumage of the cock, in old birds, is an intense steady black without glossiness. The hen is of a dusky black, inclining to brown; the throat and upper part of the breast excepted, which are of a dull dirty white, spotted with black.

The wing is composed of eighteen feathers, of which the second order of quills are remarkably large and broad. The tail consists of twelve feathers, and when displayed is fan-shaped, the outer feathers being shorter than the middle ones. The legs and feet are black, or of a very dark horn colour.

The Ouzle is a solitary bird, accompanying with his mate only in breeding time. He inhabits solitary and rocky woods near rivulets; and when surprised in his lonely haunts, flies from the presence of the intruder with an hideous loud scream. Their food is insects and berries, and they seem to delight most in the **hawthorn*. The attitudes of the cock are bold and majestic, particularly when he feeds. Stooping, displaying his tail, turning his head this way and that, and casting his eyes on every side as to avoid a foe.

* *Cratægus oxycantha*.

Published according to Act of Parliament. April the first 1794 By James Bolton at Sturtevant near Halifax.

NEST AND EGGS OF THE BLACKBIRD.

PLATE VIII.

The Blackbird breeds in solitary places, and conceals her nest very artfully in the bottom of some close bush near the ground. The nest before me was built in an hawthorn, where it was concealed by surrounding branches.

The outside is composed of various kinds of moss, which is wove and platted together with blades of grass, dried leaves, &c. These are brought in plenty and firmly bound together. Upon this is a coat of plaster, composed of a mixture of clay and cow's dung, well wrought and tempered together. And over this a soft covering of the dried blades of hair-grass, which is neatly wove and platted together in the bottom and sides of the cavity, as well as upon the brim of the nest.

In the nest was four eggs of a dusky blue green, with numerous small points of a darker colour.

The Blackbird sits concealed while he sings. In breeding-time, his whistle is so loud and shrill as to make the dales re-echo. When two are singing at the same time within hearing of each other, they will contend in song like the nightingale, each keeping silence alternately till the other has repeated his song.

The Ouzle, as well as other birds of the thrush kind, when taken in traps, or otherwise, are easily reclaimed by being put in large cages with tame birds of the same species, placing for a few days, haws, hips, worms, &c. in the cage, still giving him fewer and fewer every day, and in the space of a fortnight he will wean himself, and take the tame birds' food.

PROPERTY
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TURDUS TURQUATUS.

Syst. Nat. 296.

THE RING-OUZLE, OR HEATH-OUZLE.

PLATE IX.

THIS bird, in shape and size, is equal to the ouzle or blackbird. In the bird before me, the bill is of a yellow ochre colour, except the point, which is dusky. The mouth is yellow within. The eyes a dark brown. The whole upper side of the bird, from bill to tail, is black, with a cast of brown somewhat bright and shining. The head is of a fuller black than the other parts of the body. The quill feathers of the wing are the same colour as the back, except their exterior edges, which are white. The first and second coverts also have white edges. The tail is composed of twelve black feathers, with pale coloured edges.

On the breast of the cock is a lunated mark of a clear white, terminating in a point on each side of the neck; else the whole underside of the bird is the same colour as the back. The hen differs from the cock, in that the mark is not white on the breast, but of a dusky brown. The colour of the back is more *fuscus*. The feathers on the breast have grey borders, and the bill is dusky. The feet and legs in both are of a dusky horn colour.

These birds sometimes visit the mountainous parts of the West Riding of Yorkshire, where they breed. They come in April, and leave us in October; but whence they come, or whither they go, I know not. A remarkable circumstance is, that they do not visit us regularly every year. Sometimes a few pairs visit my neighbourhood, sometimes they come in plenty, and sometimes for the space of two or three years we see them not. They feed on fruits and insects. I have figured the flowers and fruit of the * *mountain-ash*, or *quicken-tree*.

* *Sorbus aucuparia*.

NEST AND EGGS OF THE RING-OUZLE.

PLATE X.

The nest I described was composed of many small sprigs and branches of heath, mixed with moss and dried stalks of plants. These were plentifully bestowed on the bottom and sides of the nest, and with them the figure and cavity thereof was formed; within this was a coat of plaster, composed of mud mixed with small blades of grass and fibres of roots, and upon the plaster was another coat of fine soft grass, which also covered the brim of the nest, and was very neatly and smoothly laid, as in the nest of the blackbird.

The eggs were four in number. In size and colour much like those of the blackbird, but are splashed with broad spots of a red brown, by which they are at once distinguished from the eggs of that bird.

The outside of the nest was quite covered with dried oaken leaves, warped or sewed to the other materials with blades of grass, fibres of roots, &c.

This nest was built on the ledge of a rock, about six feet from the ground, artfully hid amongst surrounding heath, mixed with fallen oaken leaves.

The cock sings sweetly in breeding-time. His voice is less loud than any of the foregoing; but it is soft and mellow, and he has a pleasing variety of warbling notes.

LOXIA PYRRHULA.

Syst. Nat. 300.

THE BULLFINCH, OR NOPE.

PLATE XI.

The bill is very thick, short, hooked, and black. The eyes are brown and small. The head is of a silky black, with a gloss of purple, which colour reaches down to the nape of the neck. The back is of a bluish ash colour. The rump a pure white. The covert feathers of the tail, as well as the tail itself, are black, with a purple gloss.

The first quill feathers of the wings are of a dusky black; the second quills, a bright glossy black purple, the innermost excepted, which is red on the exterior side of the shaft. The greater coverts are black, deeply pointed with a pale ash colour. The lesser coverts the same colour as the back. The upper part of the throat, and the lower jaws, are surrounded with a list of black, which unites with the black of the forehead at the eyes. The cheeks, breast, and upper part of the belly, are of a soft reddish crimson. The lower part of the belly, and covert feathers under the tail, are white. The tail consists of twelve feathers of a glossy purple black.

The Bullfinch is not valued for his own song, but for his beautiful plumage, his great docility and aptness to take the song of other birds, to whistle after the pipe, or even to speak. Their food is insects and the buds of fruit-trees, particularly the apple, pear, and peach. Therefore they are very destructive to the fruit, when permitted to haunt fruit-gardens and orchards. I have figured the cock on a branch of the * *wild-apple*, or *crab-tree*.

* *Pyrus malus*.

NY
USA

NEST AND EGGS OF THE BULLFINCH.

PLATE XII.

The hen Bullfinch differs from the cock, in that her breast is not crimson, but of a dusky red brown. The back is of a dirty ash colour, and the black of the head, tail, and wings, less bright and glossy.

She builds her nest in woods, particularly where sloe-bushes and crab-trees abound. For the ground-work she makes use of a number of small sticks broken off a proportionable length. These she places cross-wise on the divisions of a suitable branch, and upon these the nest is built of woody roots, the largest near the bottom and round the sides, the smaller within.

The inside, or lining, is made of very fine fibres of roots, without any other materials.

In the nest before me, the diameter of the cavity is upwards of two inches and an half, the depth an inch.

This nest contained five eggs of a pale blue green, with dark purple blotches, and small red spots.

Those who would bring up Bullfinches from the nest, with a view of teaching them to whistle, or to imitate the song of other birds, should take them about four days old; for if they are left to the age of ten or twelve days, they acquire some of the harsh notes of the parent, which they will never quit.

UNITED STATES
CITY
USA

LOXIA CHLORIS.

Syst. Nat. 304.

THE GREENFINCH.

PLATE XIII.

The bill is thick, straight, and sharp-pointed, of an horn colour, except the tip, which is dusky. The eyes are brown, the eye-lids white. The fore part of the head, and the cheeks round the bill, are yellow, with a cast of olive. The head and back are olive, with a shade of brown. The rump inclines more to yellow. The outer borders of the seven first quill feathers are of a bright yellow, as are also those of the bastard wing. The next quills are edged with a dusky green, and the last are wholly dusky. The first row of coverts are of a dusky ash colour, the second a yellowish green, brighter than the feathers on the back.

The throat and breast are a green yellow, the belly more yellow, and becomes almost white about the thighs.

The tail is a little forked, consisting of twelve feathers, the two middlemost of a dusky black, except the upper part of the exterior margins, which are olive-coloured.

All the rest are yellow, except about half an inch of the lower part, which is dusky.

The legs and feet are of a dusky horn colour, and the claws black.

The colour of the hen is in all parts more dusky and dull, and in old birds the feathers of the back and breast have brownish dashes down their shafts.

near Halifax, Yorkshire.

NEST AND EGGS OF THE GREENFINCH.

PLATE XIV.

The Greenfinch makes her nest in some close hedge or bush, more frequently in an holly than any other tree.

She lays for the foundation a number of small sticks, which cross each other every way, in the same manner of those of the bullfinch. Upon these, in the nest before me, is laid a great quantity of coarse moss, mixed with sticks, roots, and cow's hair; and upon these, immediately under the lining, is a thick coat of roots firmly entangled together, and over these is a thick coat or lining of red cow's hair.

The diameter of the cavity is two inches, the depth an inch and an half. The brim of the nest is ragged and uneven, and the whole very roughly fabricated.

In this nest was six eggs of a pale bluish white, or milk and water colour. They are marked with brown and purple spots.

The Greenfinch feeds on grain, berries, the buds of trees, and insects.

The song of the Greenfinch is harsh and unpleasing; but the beautiful colours and fine shape of the cock, together with his docility and aptness to learn, renders him well worthy the esteem of those who delight in this branch of natural history.

The Greenfinch is a stout and hardy bird, and not subject to diseases, if you keep him clean. They are sometimes kept in cages in order to ring a chime of small bells.

They should be fed with rape and canary seeds, for that of hemp makes them grow fat and lazy.

EMBERIZA MILIARIA.

Syst. Nat. 304.

THE COMMON BUNTING.

PLATE XV.

The bill is large, thick, sharp pointed, and of an horn colour. The lower chap has a remarkable rising angle on the side, which rests on the outside of the upper chap when the mouth is shut. The eyes are brown, having a narrow circle of white round the eye-lids.

The head is large, covered with feathers of a dusky olive or lark colour, each having a dark-coloured line along the shaft.

The back and rump are the same colour with the head, only they are darker along the middle of the feathers.

The quill feathers of the wings are dusky, edged with a pale brown. The covert feathers are also dusky, with broad borders of a pale bright brown.

The tail is a little forked, consisting of twelve feathers of a dusky black, with pale brown edges.

The throat, breast, and belly, are of a dull white, with a dark stroke down the middle of each feather. These dark spots are more black and distinct on the throat and breast. On the belly they become narrow and faint, and disappear below the thighs.

The legs and feet are of a pale horn colour. The claws crooked, black, and sharp.

The Bunting feeds on grain, and is particularly fond of the black oat, an ear of which he will snap off with his bill, and taking it to the next wall, will hold it with his foot, while he shells off the hull, and eats the grain.

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NEST AND EGGS OF THE BUNTING.

PLATE XVI.

The Bunting builds her nest in some clump of fern, briars, or tall grass, often near the root of some low shrub. In the nest before me, the outside is composed of straw, small sticks, broken rushes, and moss. The whole of the nest is composed of these materials, save that the lining has a few hairs mixed amongst it.

The whole is loosely and awkwardly put together, irregular, and incompact, the cavity is shallow, and the brim irregular and undefined.

The eggs are large for the size of the bird. The ground colour is white, and they are beautifully blotched, spotted, and streaked with black. Some of these spots and scratches are clear and distinct, others are dimly seen, appearing as if a blue pellicle was drawn over them. This last circumstance is not peculiar to the eggs of the Bunting, but common to those of most other birds which lay spotted eggs.

The Bunting continues with us all the year round. In winter is gregarious, flying in flocks, and frequenting fields of stubble. In breeding-time, the cock perches on the tops of trees, chirping out his ditty all day long. His notes are not unpleasant, though low. They are more mellow and more varied than those of the yellow-hammer.

The cock is a bold and stately bird, and well deserves a place amongst other birds, either in a cage, or an aviary.

The hen differs little from the cock, only her colours in general are paler and fainter.

EMBERIZA CITRINELLA.

Syst. Nat. 309.

YELLOW-HAMMER.

PLATE XVII.

The bill is straight, sharp-pointed, of a pale yellow at the base, black at the tip. It has a rising angle on the lower chap, as in that of the bunting, and the rest of the genus. The eyes are brown. The tongue short and thick. The whole head, cheeks, and upper part of the neck is of a bright yellow in the cock bird, each feather having a dash or line of black down its shaft. In some birds there are touches and strains of orange colour amongst the yellow. The feathers on the back are a mixture of olive, green, and orange colour, with a black dash down the middle of each. The lower part of the back is of a tawny orange colour.

The first quill feathers of the wing are of a dusky black, with yellow edges. The second also are black, but with broad margins of a *fulvus* brown.

The tail is a little forked, consisting of twelve feathers, with yellow-green edges. The two exterior feathers on each side have a large white spot on their inner webs.

The throat is yellow. The breast yellow-green, with orange strains down the feathers. The belly and covert feathers beneath the tail, are yellow.

The legs and feet are horn colour, the claws black.

The hen differs from the cock, in that her colours are much duller in all parts, and in having the head, &c. of a brown green, where the cock is yellow.

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PLATE XVIII.

In the specimen now by me, the outside is formed with broad blades of withered grass, fragments of leaves, dried stalks of plants, and various kinds of moss. These are well and closely compacted together, and with them the cavity is formed, and the general shape of the nest constructed. The lining consists of a thick coat of small fibres of roots, mixed with a few hairs. The diameter of the cavity is near three inches, the depth an inch and an half.

In winter they fly in flocks. They feed on insects, on grain, and the seeds of plants, and in spring are frequently seen pecking about the catkins of the * *hazle-tree*, birch, alder, &c. They also devour spiders and small beetles. I have figured the cock on a branch of the hazle-tree in blossom.

* *Corylus avellana*,

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EMBERIZA SCHŒNICLUS.

Syst. Nat. 311.

THE REED-SPARROW.

PLATE XIX.

The bill is straight, sharp-pointed, of a dusky yellow colour, and has a rising angle on each side of the lower chap.

The eyes are brown, having a narrow circle of white downy feathers round them.

The head of the cock is black. The cheeks brown red. Round the neck is a white ring, which takes its rise at the angles of the mouth on each side. The back is of a tawny brown, with a black line down the middle of each feather. About the rump there is a mixture of ash-colour with the brown. The quills are of a *fuscus* brown, with rust-coloured edges. The first and second covert feathers of a *fuscus* black, with broader edges, and tips of a rust-colour. The chin and throat in the male are black, the breast and belly white. On the sides, the middle of the feathers are dusky.

The tail is a little forked. It consists of twelve feathers, of which the middle two are black, with red edges; the three next, on each side, are dusky, with red edges; the fifth is white on the out border, and the sixth wholly white.

The hen has no black on the head or throat, and the general hue of her feathers is paler and duller than that of the cock.

The cock sings pleasantly. His voice, as well as his notes, are much finer and more pleasing than those of any other bird of the same family.

NEST AND EGGS OF THE REED-SPARROW.

PLATE XX.

The Reed-sparrow makes her nest near some river, lake, or pond. Sometimes concealing it amongst sedges, fern, or rushes. Rarely, she suspends it between the stalks of the common * *English-reed*, as in the instance before us. The nest I now describe was suspended between three stems of reed, the leaves whereof were drawn together in such manner as to form a slight kind of lattice-work, upon which the foundation of the nest was laid. The nest almost wholly consisted of broken pieces of dried rushes; the stronger placed near the bottom, the finer round the brim. A few sprigs of moss were mixed here and there amongst the rushes, and the whole artfully bound together with the blades of the growing reeds. The lining consisted of plenty of cow's hair. The reeds grew in a still pond, and the nest was placed about a foot above the surface of the water.

She lays four or five eggs of a dull white, very prettily veined, and spotted with dark purple.

The Reed-sparrow feeds on insects, on corn, on the seeds of grass, and reed.

The cock conceals himself while he sings, and warbles out his song in the night as well as the day.

* *Arundo phragmitis*.

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FRINGILLA CARDUELIS.

Syst. Nat. 318.

THE GOLDFINCH.

PLATE XXI.

The bill is straight, sharp-pointed, and of a pale yellow, except the tip, which is black. The eyes are small and brown. Round the base of the bill is a list of small downy black feathers, which on each side runs up to the eyes. The forehead, throat, lower jaws, and cheeks, are of a bright shining blood-colour.

On each side of the face is a bed of white feathers extended above and below the eye. The crown of the head is black, a list of which colour falls down behind the white, on each side of the face. The back part of the head, the neck, the back, and rump, are red-brown, with a cast of chesnut. The coverts of the tail are black, with white tips and edges.

The tail consists of twelve feathers. The two middle ones have white tips. The two outmost have each a white spot on the inner web. All the rest of the tail is black.

The quill feathers are black, having white tips, and half the length of their exterior edges of a lovely yellow. The lower half of the larger covert feathers are of the same yellow. The breast is of a reddish brown. The belly and under coverts of the tail white.

The Goldfinch feeds on the seeds of aggregate flowers, particularly those of the various species of thistle. I have figured him feeding on the common * *spear thistle*.

* *Carduus lanceolatus*.

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NEST AND EGGS OF THE GOLDFINCH.

PLATE XXII.

Goldfinches sometimes build their nest in hedge bushes; sometimes, as in the present instance, on the extreme branch of some tall tree, where they can conceal it among the leaves.

This nest was built on a branch of the greater **maple-tree*, commonly called plane-tree, or sycamore.

Several leaves were displayed like an umbrella over the nest; others hung down about the sides thereof. The tree was at that time in blossom.

The outside of the nest consists of various kinds of moss, very neatly platted together with small blades of dried grass, and a few small roots. The next coat consists of down gathered from the *receptacle* of the common †*dandelion*, mixed amongst which I find many of the yellow florets of the *aggregate*. The innermost coat or lining consists of very fine down, mixed with a few small fibres of roots.

The depth of the cavity is an inch, the diameter little more than two inches.

The Goldfinch lays five or six eggs. They are white, marked with spots of a dark brown-red, as figured on the bottom of the plate.

* *Acer pseudo-platanus*. † *Leontodon taraxacum*.

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FRINGILLA CŒLEBS.

Syst. Nat. 318.

THE CHAFFINCH.

PLATE XXIII.

The bill is straight, sharp at the point, where it is black. The base is of a yellowish horn colour. The eyes are brown, the eye-lids pale. The forehead is black. The crown of the head and hind part of the neck of a bluish lead colour, which colour is extended down the sides of the neck almost to the throat, where it terminates in a point. The upper part of the back is a red-brown, with a cast of olive. The lower part towards the tail a yellow-green.

The first quill feathers of the wing are black, with the extreme edges light-coloured. The second quills are also black, having the edges green. The tips of the larger coverts are white. The lesser wholly white, which form two elegant bars of white on the extended wing.

The throat, breast, shoulders, and cheeks, are of a pleasant red-brown. The belly and coverts under the tail are white.

The two middle feathers of the tail are of a dusky ash-colour, with green edges. The two outmost on each side partly white, all the rest are black.

In the hen, the head and breast are of a dull olive colour, and her colours in general are obscure and dull, in comparison of those of the cock.

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NEST AND EGGS OF THE CHAFFINCH.

PLATE XXIV.

Chaffinches build their nests in hedge bushes, most frequently in the hawthorn; but that which I described was built in an * *holly-tree*.

The outside is made of fine soft green moss, wove and platted together with wool, cotton, and spider's webs; and amongst these, here and there, a piece of the common † *grey-liverwort*. The next coat consisted of slender blades of fine dry grass, and the inmost coat or lining is made of cow's hair, with a few feathers here and there. The diameter of the cavity is two inches, the depth an inch an half. The whole is very neatly made, and smoothly finished, round, soft, and pretty.

The eggs are five or six in number. They are of a bluish white, splashed and spotted with purple.

The Chaffinch sits on high trees while he sings. His song is short, but sprightly, and is ingeminated with courage and boldness. The cock is frequently kept in cages, as well for his song, as for the beauty of his plumage.

The Chaffinch feeds on seeds and grain, assembles in large flocks, in winter, mixing with the yellow-hammer and the bramblin. Their haunts are stubble fields, and in very severe weather, farm-yards, where they feed among the chaff and refuse of the corn; hence they get the name of Chaffinch. In Yorkshire this bird is known by the name Bullspink.

* *Ilex aquifolium*,

† *Lichen perlatius*,

Published as the Act directs. April the 1st 1794. By James Bolton. Engraver and Printer. Halifax.

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FRINGILLA SPINUS.

Syst. Nat. 322.

THE SISKIN, OR ABERDAVINE.

PLATE XXV.

The bill is short, straight, sharp-pointed, and yellow, except the tip, which is black. The eyes are a bright brown, the eye-lids pale. Over each eye is a narrow white line. The head and upper part of the neck are of a very dark green, with a black spot down the middle of each feather.

The middle of the back is green, but less dark than the head. The lower part of the back yellow-green. The feathers in both having black strokes down their shafts.

The first quill feathers are dusky, having their outer webs green. In the second quills, the lower half of each feather is yellow, the upper green. The greater and lesser coverts are dusky, with green edges.

The throat, breast, and belly, are yellow-green; stronger towards the head, paler near the belly; and the feathers on the sides of the breast have dusky coloured lines down their shafts.

In the tail are twelve feathers; the middle two are black, with grey tips; the upper half of all the rest are of a bright yellow; the lower half black, with grey tips.

The feet and legs of a dark horn colour, the claws black.

The hen wants the dark colour on the head. The yellows are dull and faint, and the breast and belly paler and more spotted than in the cock.

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EGGS OF THE SISKIN, OR ABERDAVINE.

PLATE XXVI.

The nest of this bird I have not had an opportunity of examining. I am informed from Westmoreland, that the Siskin breeds in that county; that it builds its nest in juniper bushes, and inhabits only those places where these bushes grow in plenty; that it feeds upon the buds or berries of that shrub, and goes away before winter.

The eggs are white, near the bigger end marked with a few purple blotches; in other parts with small purple spots or points.

The eggs from which I took my figure and description, were brought from Berlin, and were preserved in a cabinet, and placed in a shell, as represented in the plate.

LA LINOTTE.

Brisson 3—121.

COMMON LINNET.

PLATE XXVII.

The bill is thick at the base, sharp at the point. The upper chap of a dusky black, the lower a yellow horn colour. The eyes are brown. The head brown, with a cast of ash-colour, and a black, or very dark brown stroke down the middle of each feather.

The feathers on the back are red-brown, with a black stroke down the shaft of each.

The first quill feathers are black, with white edges; the second are also black, but with the edges brown.

The greater and lesser covert feathers are brown, with pale brown edges.

The throat and upper part of the breast are white, with a few dusky touches pointing downwards.

The lower part of the breast is of a bright shining crimson colour, edged off with a cast of orange. The belly and covert feathers under the tail, are a dusky white.

The tail consists of twelve feathers, and is a little forked. The two middle feathers are shorter than the rest, and black, with red-brown edges; all the rest are bordered with white. The cock has sometimes a black stroke under his throat, not always.

The legs and feet are a dusky black.

The hen wants the crimson colour on the breast. The white feathers in the wing and tail are less bright, and the general hue of colours more dusky than those of the cock.

The Linnet feeds on downy seeds. I have figured the * *water ragwort*, with the birds, on plate XXVII.

* *Senecio aquatica.*

NEST AND EGGS OF THE LINNET.

PLATE XXVIII.

The Linnet inhabits dry, barren, and hilly grounds, where there is plenty of heath, furze, and other low bushes, in which she makes her nest. The specimen before me was built in a low branch of the **black-thorn*, or sloe-tree, which was at that time in blossom.

The outside of the nest is formed of dry stubble mixed with hay. The middle coat is formed with finer hay, mixed with hair, very firmly and neatly platted together. The inner coat or lining consists of hair, wool, and the down of the seeds of willow, over which is a lay of fine fibres of roots. The whole is a neat piece of work, round, well finished, and very handsome.

The eggs are white, with a cast of blue, spotted more or less with purple spots.

The Linnet gives place to few birds in point of song. His tone is mellow, and his notes sprightly, artfully warbling into the plaintive strain, and returning again to the sprightly, with the greatest address, and most masterly execution.

The Linnet, in his wild state, feeds on the downy seeds of rag-worts, thistles, &c. When kept tame, on hemp, rape, or poppy seeds. The cock is one of the most common birds kept in cages, and the method of treating him so well known, that nothing needs be said of it here, only I would at all times recommend cleanliness, pure water, and sweet sound seeds for food.

* *Prunus insititia*.

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FRINGILLA CANNABINA.

Syst. Nat. 322.

GREATER RED-HEADED LINNET.

PLATE XXIX.

The bill is short, thick at the base, and sharp-pointed. It is of a yellowish horn colour, except the tip, which is black. The eyes are brown.

The crown of the head is a deep shining blood-colour. The rest of the upper part of the head and neck, of a brown ash-colour. The cheeks pale brown. The back of a red-brown, with a black mark down the middle of each feather. The rump is a paler brown, and the black marks are less visible.

The first quill feathers of the wing are black, four or five of the principal having their exterior edges white. The second quills are a dusky black, with brown edges, and both the one and the other are light-coloured at the points. The coverts are brown, with pale-coloured tips and edges.

The throat and upper part of the breast are a dull white, with small dusky strokes down the feathers. The lower part of the breast is tinged with a fine blood-colour, similar to that on the head. The belly is of a dusky white and unspotted.

The hen wants the crimson on her head and breast. The white in the quill feathers is less bright, and the brown in the back and wings more dull and *fuscus*. The legs and feet are small, and of a dark horn colour; the claws black.

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NEST AND EGGS OF THE GREATER RED-HEADED LINNET.

PLATE XXX.

These birds, like the common linnet, inhabit steep, rocky, and barren grounds, where is plenty of heath, furze, broom, and such like small bushes.

They build their nest near the ground, forming the outside of various kinds of moss, hay, and stalks of dried plants, adding some stout fibres of roots to strengthen the work. These materials are brought in plenty, and firmly platted together.

The lining is a thick coat, made of the down gathered from the catkins of the female willow-tree. In the nest I now describe, I find many seeds still adhering to the down. The whole is neatly made and finished.

In the nest were six eggs of a blue-green colour, spotted with purple spots.

The song of the Red-headed Linnet is mean, but his beauty entitles him to a place in the esteem of those who are fond of pretty little birds.

In winter they are gregarious, assembling in flocks, sometimes mixing with the common linnet, goldfinch, &c.

Their food is seeds and grain, particularly the seeds of ragwort, and the various species of thistles.

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FRINGILLA LINARIA.

Syst. Nat. 322.

RED-POLE, OR LESS RED-HEADED LINNET.

PLATE XXXI.

The bill is sharp-pointed, and short. The upper chap black at the tip, all the rest of the bill yellow.

The eyes are brown and very bright. The forehead is of a bright shining crimson colour. The back part of the head, the neck, and back, quite to the tail, are of a red-brown, mixed with touches of ash-colour. The middle of each feather being brown, the edges ash-colour.

The quill feathers of the wing are of an uniform dusky black, with pale-coloured edges and tips.

The covert feathers, both greater and less, are of the same colour, with deep white tips, which make two white bars across the extended wing.

The tail is forked, consisting of twelve feathers. The two middle ones shorter than the rest, and pointed, having brown edges. All the rest black, with narrow edges of a pale brown.

The cheeks, in the male, are white; in the female, a rusty brown; in both, the throat, just under the bill, is dusky.

In the male, the lower part of the throat, and the breast, are of a fine shining crimson; in the female, of a dirty white, with a faint dash of crimson on some of the feathers. The female has sometimes a few pale crimson feathers on her forehead. The belly, in both the one and the other, is of a dusky white. The legs are small, short, and of a brownish colour. The claws sharp and black.

The bird in many parts of the kingdom is known by the name Redpoll.

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NEST AND EGGS OF THE LESS
RED-HEADED LINNET.

PLATE XXXII.

The Redpoll, or Less Red-headed Linnet, builds her nest in heath, briers, or low bushes. The nest before me was built in a branch of * *common broom*, just at the time when the buds were swelling for leaves, as represented in the plate. Below the nest I have thrown a sprig of broom flowers by way of decoration.

The outside of the nest consists wholly of dried stalks and blades of grass, neatly folded and interlaced together. The lining consists wholly of willow down, but between this and the outside is an intermediate coat or stratum of small roots, and a few hairs. This nest, as well as some others, are beautiful to admiration; and it is not without regret that I find myself under a necessity of tearing them to pieces, in order to give faithful descriptions of them.

There was five eggs in the nest of a dusky green-blue, thickly spotted at the big end with small purple spots.

The song of the cock is mean, but in beauty he gives place to none of the British Linnets.

Our birdmen here call it *chisaree*, in imitation of a particular cry it makes in breeding-time.

* *Spartium scoparium*.

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LA CABARET.

Brisson 3—142.

THE TWITE.

PLATE XXXIII.

The bill of the male is entirely yellow, in the female dusk; it is short, straight, and sharp-pointed. The eyes are brown. The cheeks are a pale brown, which colour is continued round the eye. The feathers on the head and upper part of the back are black, with brown edges. Those of the lower part of the back are also brown, but in the male are glossed over, as it were, with a beautiful shining scarlet or crimson colour, but not so in the female.

In the bird before me, the three first quill feathers of the wing are wholly black, the next five have their outer edges for more than half their length white, and all the second order of quills, as well as the greater coverts, have light-coloured tips; the lesser coverts are the same colour as the back.

The tail consists of twelve feathers, all of them obliquely pointed. The two middle ones shorter than the rest, black, with red-brown edges. The three outmost on each side have their exterior borders white.

The throat and upper part of the breast are of a faint dusky red, with dark strokes down the middle of the feathers. The belly and covert feathers under the tail are white. The legs and feet are black. The claws curved and sharp at the point.

The Twite goes among our birdmen by the name Grey Linnet.

NEST AND EGGS OF THE TWITE.

PLATE XXXIV.

The Twite, like the rest of the linnets, inhabits low bushes and shrubs. The nest, which now lies before me, was found in a shrubbery, on a low branch of the * *berry-bearing alder*.

The bottom or foundation of the nest is made of a mixture of moss, hay, and stubble. These are brought in plenty, and laid loose and flat. On this bottom the sides and brim of the nest are formed entirely of roots, the larger and stronger placed on the outside, the smaller and finer within. They are warped and entangled together with much labour, but being of an hard woody nature, they close so ill together, that the light shines through every part of the nest.

The lining consists of very fine roots, amongst which a few black hairs are mixed.

In this nest was six eggs, white, with a faint cast of blue, marked with pale red spots, and brown zigzag scratches, as figured on the plate; by this mark alone the eggs of the Twite are distinguished from those of all the other linnets; all the rest being marked with spots only, these with spots and scratches.

The Twite, like the rest of the linnets, feeds on the seeds of plants, particularly those of the *aggregate* downy flowers. In winter they assemble in flocks, mixing with other small birds; and being caught, soon become tame and familiar.

* *Rhamnus frangula*.

FRINGILLA CANARIA.

Syst. Nat. 321.

THE CANARYBIRD.

PLATE XXXV.

The Canarybird, though not originally a British species, has so long been propagated in this kingdom, that it cannot properly be omitted in an History of British Song Birds. At what time they were first introduced into England is not exactly known. GESNER, who wrote in 1585, makes mention of them; and ALDROVANDUS, in his *Ornithology*, printed at FRANKFORT, in the year 1610, gives the first good description of them. Vid. vol. 2. p. 355.

What colour they are in their original native country, is not clearly ascertained. Writers seem to concur in supposing them to be green and yellow, and to bear a near resemblance to our siskin, or aberdavine. Aldrovandus, in the place above cited, describing the Canarybird from Gesner, says, "*Avis est vulgaris parva magnitudine, rostro parvo et in acutum tendente: alarum, et caudæ pennis totis viridi color,*" &c. He has given a small figure, which he calls *canariam*, table 14, figure 31. It is, however, probable, the Canarybird was not known in England till after the time of Aldrovandus, though Willughby, in his History of Birds, tells us, they were common enough in his time.

But whatever they originally were, their colours are so much mingled and changed by domestication, and their number so greatly encreased, that to give particular descriptions, would be an almost endless, as well as unnecessary task.

NEST AND EGGS OF THE CANARYBIRD.

PLATE XXXVI.

The nest I described was built in a green-house, on the branch of a small-leaved myrtle. The general shape of the nest was the same as that of a linnet or goldfinch, round and handsome. The materials of which it was composed were such as had been brought in for the purpose by the gardener; moss, wool, feathers, &c. which were all indiscriminately blended together. And the gardener told me, that if he brought her a little down, wool, or a few feathers, after she had begun laying, she would place them on the outside, or round the brim of the nest, still encreasing it till the time she began to sit.

Three eggs were in the nest at the time I made the drawing. They were white, spotted with small red spots.

If the breeders of Canarybirds would furnish the rooms where they are kept with myrtles, or other sweet smelling shrubs, in which they might make their nests, and take care to keep the room clean and well aired, it would not only contribute much to the beauty and health of the birds, but would be more agreeable to nature, less trouble to the owner, and would afford greater gratification to the curious, than when they are confined in small, and perhaps, dirty boxes, as is now in many places the custom.

The food and song of the Canarybird are so generally known, that nothing need be said of them here; only for the sake of the little pretty warblers, let me once more recommend sweet food, pure water, and a clean room.

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MUSCICAPA GRISOLA.

Syst. Nat. 328.*THE SPOTTED FLY-CATCHER.*

PLATE XXXVII.

The bill is black, broad, and flat at the base, and has a rising angle along the upper chap.

The eyes are brown, the eye-lids white, the nostrils round and naked. At the angles of the mouth are a few black hair-like feathers. The head is of a perfect mouse-colour, with a small dark line down the middle of each feather. The back is mouse-coloured, only a little inclining to a red-brown near the tail. The tail is composed of twelve feathers, all of an uniform dark mouse-colour.

The first quill feathers are the same colour as the tail, only the tips are a little paler.

The covert feathers are a pale mouse-colour, with brown edges.

The cheeks above and below the eyes are white. The throat and upper part of the breast are a dusky white, with brown touches down the middle of the feathers.

The sides under the wings are a pale brown-red. The belly and feathers under the tail white.

The legs, feet, and claws, small, and black.

The cock has a pretty sweet warbling song. He sits on the branch of some tree, with his wings quivering and half raised; when a fly approaches, he hops off to seize it, and immediately returns to his branch, and to his song.

The Spotted Fly-Catcher is known in some places by the name Beambird, or Postbird.

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NEST AND EGGS OF THE SPOTTED
FLY-CATCHER.

PLATE XXXVIII.

These birds build their nests in low places, amongst trees, in fruit-gardens, or near some precipice, where they are secure from wind and weather.

The nest before me was built on the ledge of a rock, overhung with trees and bushes. It was placed amongst, and partly hidden by, the growing leaves of the great * *hairy wood-rush*.

The outside of the nest is composed of various kinds of moss, grass, stubble, and stalks of dried plants. The inside, or lining, is made of the same materials, but softer and finer, and mixed with a few roots and black hairs. It is a loose mean structure. The diameter of the cavity is about two inches, the depth less than an inch.

Six eggs were in this nest. They are large for the size of the bird. The ground colour is white, and they are all over splashed with spots of a pale red.

The Fly-catcher is a bird of passage, comes to us about the end of April, and leaves us again in October. The cock ceases to sing about the end of June. His song has some resemblance of that of the blackcap, but his notes are fewer, less brisk, and less varied. The Fly-Catcher feeds on spiders, small beetles, and various kinds of small flies.

* *Juncus sylvaticus*.

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MUSCICAPA ATRICAPLLA.

Syst. Nat. 326.

THE PIED FLY-CATCHER, OR COLDFINCH.

PLATE XXXIX.

The bill is flat at the base, ridged along the upper chap. In the cock wholly black; that of the hen dusky near the base. The eyes are brown. At the angles of the mouth are a few black bristles like feathers. The forehead is white. The top of the head, the upper part of the neck, and the back, are black in the male bird, but of a dusky brown in the female. The covert feathers of the tail have white edges and tips in the male, not so in the female.

In the bird before me, the first and second quill feathers of the wing are black, with dusky edges, except four of the last, which have their outer webs white. The first coverts are of a dusky black on their upper part, the lower part a pure white.

The tail is black, only three feathers on each side have their outer edges white almost to the tip.

The whole underside of the bird is a pure white in the male, in the female a dusky white.

These birds are neatly figured by the late Mr. EDWARDS, in his ORNITHOLOGY, *vol.* 1. *pl.* 30. but he has made the wings much too short and crooked.

In my birds, the wings reach within about half an inch of the end of the tail.

FRISCH, in a NATURAL HISTORY of BIRDS published at BERLIN, has given an excellent figure of the male of this species. *Vol.* 1. *plate* 24.

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NEST AND EGGS OF THE COLDFINCH.

PLATE XL.

The manners and haunts of these birds are similar to those of the last species. The nest I described was built in a fruit-garden, on the branch of an almond-tree, where it was well concealed behind other branches then in flower.

The nest was loosely fabricated. The outside with moss, hay, small sticks, roots, &c. and lined with finer roots, hairs, and a few feathers.

Five eggs were in the nest, all over of a pale bright blue colour.

The cock sings in breeding-time, perched on some branch not far from the nest. His song resembles that of the last species, but is more sprightly, and delivered with more spirit.

The Coldfinch is a very scarce bird in many parts of this kingdom. They sometimes visit us in the West Riding of Yorkshire, but not regularly every year. They come to us in April, and depart with their young in September.

In the year 1782, I sent a pair of these birds, very neatly shot, together with their nest and eggs, to Her Grace the late *Duchess Dowager of Portland*. Her Grace expressed a particular satisfaction and pleasure on receipt of them, and afforded them a place in her valuable and extensive museum.

END OF THE FIRST PART.

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HARMONIA RURALIS;
or,
AN ESSAY
towards
A NATURAL HISTORY
of
BRITISH
S O N G B I R D S.

VOLUME THE SECOND.

ILLUSTRATED
with Figures the Size of Life, of the Birds, Male and Female, in their most natural
Attitudes ; their Nests and Eggs, Food, favourite Places, &c., &c.;

FAITHFULLY DRAWN, ENGRAVED, AND COLOURED,
AFTER NATURE,
ON FORTY COPPER-PLATES.

BY JAMES BOLTON.

The Warblers are heard in the Grove,
The Linnet, the Lark and the Thrush,
The Blackbird, and soft-cooing Dove,
With Music enchant every Bush.

NATURA SEMPER EADEM, SED ARTES SUNT VARIÆ.

PRINTED FOR AND SOLD BY THE AUTHOR, AT STANNARY, NEAR HALIFAX;
SOLD ALSO BY B. AND J. WHITE, IN LONDON; AND MAY
BE HAD OF ALL OTHER BOOKSELLERS.

1796.

TO

JOHN MILNES, ESQ.

of

Wakefield;

A JUDGE AND PROMOTER OF THE POLITE
ARTS,

A REWARDER OF MERIT IN OBSCURITY,

A LOVER OF HIS COUNTRY,

AND A FRIEND TO MANKIND;

THIS SECOND VOLUME

of

HARMONIA RURALIS,

(from a Sentiment of Gratitude)

is most respectfully inscribed, by

The Author.

NOTE.

It may be proper to observe, that most of the birds in this second volume make their nests on the ground, in walls, or in the chinks or crevices of rocks; consequently, they could not be represented on shrubs or trees, with the same propriety as in the former volume.

The birds, also, which are the subjects of this volume, being fly-catchers, or such as feed on insects, and not on fruits or seeds, exclude vegetable decorations from the plates on which they are engraved.

Flies, being food of the birds, may, undoubtedly, on that account, be introduced with propriety; besides, making an addition to the number of the subjects figured and consequently adding to the value of the book, they have their æconomical use, in giving an apparent reason for representing the birds in such actions as best display the beauty of their shape, and the arrangement of their feathers. They also serve to occupy such spaces in the plates, as, if left without any kind of object, would give an appearance of poverty and emptiness to them. It is not meant that in every instance the insect represented is the food of the bird which it accompanies; I do not suppose, for instance, that the Nightingale feeds on the Tortoise-shell Butterfly; or the Hedge-Sparrow on the large Tyger Moth; but it may be from hence inferred, that both these birds feed on flies.

If it should be said, that the same attitude (I mean that of stretching after a fly or in the action of song) is too often repeated in the figures, my answer is, that there is no other attitude which they are capable of, in which they appear either so beautiful or so animated.

In the two families of birds which are the subjects of this volume, the Larks and the Warblers, such a similarity obtains between the species in each, that to write separate descriptions of the individuals is rather an irksome task. The description of one in each family, might almost serve for the whole; the bills, the feet, the size, the arrangement of the feathers, &c., are so near alike throughout each family, that the idea of them, when conveyed by description only, will be very near the same, however the words may be varied.

FRONTISPIECE

to the first volume.

THE DARTFORD WARBLER,

Is a very rare species in England. The bird, in excellent preservation, was lent me to take a drawing of, by my good Friend, John Latham, Esq., of Dartford, in Kent; in whose neighbourhood it was taken, and whose description is as follows.

“ This is scarce bigger than a Wren, but as the tail
“ is about half the length, measures about five inches.
“ The Bill is black with a white base, and the upper
“ mandible a little curved at the tip. Irides, red; eye-
“ lids, deep crimson. The upper part of the head,
“ neck, and body, a dusky reddish brown. Breast
“ and belly, deep ferruginous; the middle of the belly,
“ white. Quills, dusky, edged with white; bastard
“ wing, white; the exterior web of the outmost tail
“ feathers, white; the rest dusky, and half the length
“ of the bird.

“ A pair of these birds was brought to me, killed
“ by a friend on Boxley-heath, near Dartford, sitting
“ on a furze bush. They feed on flies, springing from
“ the bush on spying one within reach, and returning
“ again to the same place repeatedly.

*See “ Latham’s General Synopsis of Birds ;”
volume 4, p. 435, No. 27.*

ALAUDA ARVENSIS.

Linnæi Systema Naturæ, p. 278.

SKY-LARK.

PLATE XLI.

The bill is black at the tip, pale at the base. Eyes brown, cheeks brown, with a tawny cast; the top of the head is also of a strong brown, each feather having a black stroke down the middle. The feathers on the crown are long, and capable of being erected in form of an upright conical crest, as we frequently see them in breeding time, but not at any other season of the year. From this circumstance originated the fabled bird, known amongst Ornithologists by the name *Greater Crested Lark*. This bird was invented and first put on record by Aldrovandus, and has been continued by all writers on birds down to this time.

But to return to the Sky-lark. The feathers on the back and rump are the same as on the head. The quills are of a dusky black, edged with brown; those next the back are broad and long, reaching to the end of the first. The tail is of a dusky black, the feathers having brown edges, except the outmost on each side, which have their outer webs white. The throat and cheeks are of a pale tawny brown; the breast a darker brown, with black strokes tending downwards. The lower part of the breast and the belly are of a dusky white, except in old male birds, which are brown in those parts. The legs and feet are a brown orange colour, the hind claw very long, and but little curved.

The Butterfly is called *Wood-Lady*,* the Caterpillar feeds on Wild Rape, Ladysmock, &c.; changes to a chrysalis in July, and flies the May following: haunts rivulets and moist meadows.

* *Papilio Cardamines. Linn.*

Published as the Act directs April the 1.st 1794. By James Bolton Stationery Halifax.

NEST AND EGGS OF THE SKY-LARK.

TABLE XLII.

This bird, like the rest of the family, builds its nest on the ground, in some furrow, or under a tuft of grass or weeds. The whole outside of the nest before me, is formed with dried stalks and blades of grass; the intermediate coat between the outside and the lining, is composed of the same materials, but chosen thinner, finer, and softer; the lining consists of the very finest parts of the same stuff, mixed with a few hairs.

The eggs are four in number, of a kind of dusky gray colour, spotted with minute dark spots or points, most so at the bigger end. The eggs of the Sky-lark are constantly of the same colour, not being subject to that variety of appearances which prevails in some species of the same family.

Those who keep Larks in cages, besides sweet food and pure water, would do well to give them every day a fresh turf of white or red clover; and when these plants are not to be had, give them the seeds of them, now and then, along with their food.

Nest & Eggs of the Sky Lark, drawn on the plate from Nature.

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ALAUDA ARBOREA.

Linn. Syst. 287.

THE WOOD-LARK.

PLATE XLIII.

The bill is black at the tip, of a dusky colour at the base; the crown of the head is of a reddish brown, each feather having a dark stroke down the middle; at the base of the bill, on each side, arises a pale coloured line, which passes over the eyes, and is extended round the head, in form of a wreath; the back part of the head, below this line, is the same colour as the crown. It should be observed, that the feathers above and below are separated by this line; those on the crown being longer, and forming an elegant crest, at the will of the bird. In breeding time, the male bird erects the crest when he sings; not only when at liberty, in his natural haunts, but at the same season of the year, even when confined in a cage; hence has arisen that other fabled bird, the *Lesser Crested Lark*. FRISCH has contributed to the propagation of this error, by mistakenly giving the names *Heide Larche*, *Alauda Gallarita*, and *Allouette Houpee*, to a most accurate* figure of the Woodlark. He has drawn his bird with the crest half raised; which gives so just an imitation of the Woodlark in that state, that none can doubt the truth of his pencil, or the error of his pen. I have added the head of his figure on the bottom of my plate.

* Vide Frisch's History of Birds, pl. 15.

A Cock and Hen of the species is Drawn & Engraved by J. Bolton W. m

NEST AND EGGS OF THE WOODLARK.

PLATE XLIV.

The nest before me was built in a furrow, amongst stubble ; under the bottom of it, was a soft bed of fine green moss, which was laid of a considerable thickness, but which did not at all adhere to the nest when it was removed from its place. The first coat of the nest consisted of dried blades of grass, and other dried weeds ; the middle coat was made of a finer kind of the same stuff ; as was also the lining, with the addition of a few hairs.

The eggs in this nest were four; the ground colour a dull brownish white; and they were sprinkled with numerous very minute spots of a reddish hue, which gave them an appearance like red sand.

The song of the Woodlark is too well known to need description. In my opinion, no bird is equal to it for soft, sweet, and agreeable notes; the Nightingale not excepted. About eleven o'clock in a still summer evening, his song is charmingly melodious: 't is unfortunate their time of singing is confined to so small a part of the year.

Mr. Albin says, the Woodlark breeds very early, having young ready to fly by the middle of March; but here, in this degree of north latitude, they are not so early by a month at the least.

End Eggs of the Wild Duck. Drawn and engraved by J. Beil.

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Syst. Nat. 287.

PLATE XLV.

The Titlark is of a genteel and slender make ; his song, though short, is pleasing ; and the display of his wings and tail whilst singing, together with the line which he describes in rising and falling, are truly beautiful.

The Titlark Drawn from life and published as the Act directs April the 1st 1794. J. Bolton del.

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NEST AND EGGS OF THE TITLARK.

PLATE XLVI.

The foundation of the nest before me, consists of a mixture of moss and dry grass, with which also the greatest part of the work is constructed ; only the finest part is employed in the inside and about the lining, in which a few fine fibres of roots, and a few hairs are mixed. The number of eggs is most commonly five. I know no bird whose eggs are so variable in colour as those of the Titlark. I have figured the most beautiful variety in the nest, plate 46. There is a variety which is of a dirty gray, having spots of a dark dusky colour. There is another with the ground a dark dull brown, and the spots black. ALBIN saw them of a dark brown colour, and Mr. WALCOT met with them of a pale green.

But in all these states, the species may be known by having a regard to the spots ; for they are not only larger than the spots on the eggs of any other species of Lark, but they are also softened into the ground colour, like the spots on the eggs of the Chaffinch, which those of the eggs of other Larks are not.

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ALAUDA MINOR.

Gmel. Syst. 793.

THE FIELD-LARK.

PLATE XLVII.

The bill is black at the point, of a dusky flesh colour at the base. A line of pale straw colour passes over the eyes; and the cheeks below the eyes are of a dusky straw colour. The upper part of the bird, from head to tail, is a dusky olive. On the head and back, each feather is dusky in the middle; the edges being lighter, but not so on the rump. The feathers of the wings are of a dusky black, with olive coloured edges. The tail feathers are of a dull black, with pale brown or olive edges, except the outmost two on each side, the first whereof is white, the other partly so.

The throat is a pale kind of buff colour, and destitute of spots. The breast is a darker buff, and marked with numerous black spots, tending downwards. The belly is of a dusky white. Legs and feet, a pale flesh colour.

This bird greatly resembles the Titlark, in description, but is distinguished from that bird by being of a shorter body and a paler colour; and above all, by the hind claw, which is shorter and much more curved. The Field-Lark most generally sits on walls or on the ground; sometimes, however (of which I have seen only two instances), it sits on trees, from which it ascends a little way in the air and sings. Its song is weaker and meaner than that of the Titlark.

The Black-veined white Butterfly* feeds on hawthorn, when in the caterpillar state; changes to a chrysalis in May, and appears on the wing in June and the beginning of July.

* *Papilio Crategi.*

The Field Lark & black veined White Butterfly drawn & etched from life, by J. Bolton.

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NEST AND EGGS OF THE FIELD-LARK.

PLATE XLVIII.

This nest, like that of the Woodlark, had a bed of moss for its foundation, which fell off when the nest was taken up. The whole outside is made of the stems and blades of dead grass, and the middle lay or coat, of a finer sort of the same matter; the lining was made of the finest part of the grass, with a few hairs. Most birds vary in the choice of their materials; whether from carelessness, necessity, choice, or what other cause, I know not, but so we find them. The nest I now describe is lined with the finest blades of grass, mixed with a few hairs. I have seen nests of the same bird, with a thick lining consisting wholly of hair, and others quite destitute of that article.

Five eggs are in this nest, of a brown mottled colour, having a kind of dull purple cast; a colour more easily expressed by the pencil than described by the pen.

MOTACILLA BOARULA.

Lin. Mentis, 527.

THE GRAY WAGTAIL.

PLATE XLIX.

The bill and eyes, black ; cheeks, ash-colour ; over the eye, a white line, which takes its rise at the base of the upper mandible : another white line arises at the base of the lower, is extended below the cheeks, and curved towards the back part of the neck, dividing the gray colour of the cheeks from the black of the throat. The top of the head and back, are a grayish ash colour ; the rump, a dull greenish yellow. The tail is long and a little forked ; the two outmost feathers on each side, white ; the rest black with green edges : the first and second order of quills are black with gray edges ; the last order have broad margins of a pale gray, and are very long, the third from the body, reaching to the tip of the first quills, as in the Larks. The throat in the male is black ; in the female, a dusky yellow.

The breast, belly, and covert feathers under the tail, in both sexes are a bright yellow.

The little Dragon-fly* figured on the plate, is on the wing in May. Its haunts are near ponds and rivers ; it is frequent amongst the bushes beside the river Calder, near Halifax, and is, I think, the prettiest species of Dragon-fly we have in England.

Libellula Minus Linnæi.

... and the

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NEST AND EGGS OF THE GRAY-WAGTAIL.

PLATE L.

The Gray-Wagtail comes to us in April, and leaves us before winter. Its haunts are constantly stony brooks or rivulets. The nest is most generally placed on the ledge of some rock whose foot is washed by the current. The materials are dried grass, moss, and fibres of roots. The nest I now describe, was placed on a moist overshadowed rock, about six feet from the surface of the water.

The outside consists of roots, moss, and grass ; the next coat consists of the same materials, but smaller and finer ; the lining, immediately under the eggs, is a plentiful mixture of black and white hair. The nest is firm, round, and compact.

The eggs are four or five; the ground colour a dead white, and are speckled with small brown spots.

The cock has a pleasing song in breeding time ; his voice is low, but the notes are soft and well varied.

I am informed that this bird abides in England all the year, that it comes into the north in summer to breed, and retires to the south to spend the winter.

Gray Wagtail. Drawn from Nature by J. Bolton. And published as the Act directs.

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MOTACILLA LUSCINIA.

Lin. Syst. 328.

THE NIGHTINGALE.

PLATE LI.

The bill is black at the tip ; of a pale flesh colour at the base. The mouth within, orange colour ; the head black. The wings and tail are of a tawny brown, only the upper part of the tail, and the edges of the wing feathers, are of a stronger and brighter hue, inclining to an orange red.

The throat and breast are of a dusky white, having faint touches of a darker hue tending downwards. The belly is white ; the feathers under the tail, a very pale buff colour.

The hen is distinguished from the cock, by being a smaller bird ; by being of a more dull colour ; and by having a greenish shade on the back.

The Tortoise-shell Butterfly* feeds on nettles when a caterpillar ; changes to a chrysalis the beginning of June, and appears on the wing about the end of the same month. There is a second brood, which are in chrysalis the beginning of August, and are on the wing before September.

The shell, on the plate, is a curious variety (with brown and yellow stripes) of the common land Snail.†

* *Papilio Urtica.*† *Helix Nemoralis.*

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NEST AND EGGS OF THE NIGHTINGALE.

PLATE LII.

It was never my good fortune to find a Nightingale's nest, neither have I been able to procure one from my friends, though I have (for the sake of this work) made repeated applications to gentlemen residing in such parts of the kingdom as the Nightingale frequents. The nest figured on my plate, is exactly copied from a coloured drawing, generously sent to me by my worthy friend John Latham, Esq., who caused his daughter to make it from a perfect nest in his possession.

The song of the Nightingale is too well known and too much celebrated to require any of my dull encomiums. Plinie's description of it is beautiful and curious, vide *Plin. Hist. Nat.* lib. 10, chap. 29. Which (translated into English) you may find in Plinie's Natural History, by Philemon Holland, Doctor of Physic, published in London in the year 1634. Not only in the time of Pliny, but long before him, and since, down to this day, this poor bird has been the butt of whining lovers, theatrical writers, romancers, novelists, poets, poetasters, and liars of many other denominations.

The Nightingale was a favourite of Milton, who, in one place prettily and truly says,

—————The Wakeful bird
Sings darkling; and, in shadiest covert hid,
Tunes her nocturnal note.

In another place he says,

She all night long her am'rous discant sung.

Which is false, for *she does not sing all night long.*

The caterpillar of the Peacock Butterfly,* feeds on nettles; becomes a chrysalis the beginning of July, and appears on the wing in the beginning of August.

Papilio Jo. Linn.

Nest and Eggs of the Nightingale Drawn from Nature by Miss A Latham. and the Peacock Butterfly.

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MOTACILLA PHŒNICURUS.

Lin. Syst. 335.

THE REDSTART.

PLATE LIII.

The bill is black at the point, of a dusky flesh colour at the base; the eyes black; the inside of the mouth yellow. The brow, just above the bill, is black; the forehead white; the throat and cheeks black; the crown of the head, shoulders, and back, a dark lead colour. The lower parts of the back and covert feathers of the tail, orange colour; as are also the breast and the tail, except the two middle feathers. The wings are a dusky brown; the belly and thighs, white; the legs and feet black.

The hen differs in colours from the cock, in wanting the white on the forehead; and the space of the throat, which is black in the cock, is of a mixed brown and yellow in the hen. The head and back are of an olive brown, and the belly of a pale dusky yellow. In all these parts where the cock is red, the hen also is red, but of a duller hue.

The black and yellow fly, on the plate, is the *Conops Macrocephalus* of Linnæus; it has no English name. I have met with it about willow trees, in moist places; but it is not common.

The Star Cuck & Hen c. 1 nops macrocephalus. Drawn from Life and published as the Act Birds by J. Bolton, Halifax.

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NEST AND EGGS OF THE REDSTART.

PLATE LIV.

The Redstart makes her nest in walls, crevices of rocks or hollow trees: the materials are moss, dried herbs, wool, and feathers. The nest, now before me, consists, for the most part, of various kinds of moss, with here and there a little wool mixed amongst it, and is loosely bound together with dried blades and stalks of grass. The lining is of red cow's hair, with a few feathers laid upon it. The eggs are five or six in number; blue, with a cast of green, and destitute of spots. The Redstart is one of our summer visitors; comes in April and leaves us in September. The Cock sings pleasantly in breeding time; his song nearly resembles that of the Redbreast, but is lower and not so well varied.

What is recorded by Ray and others concerning the sullenness of this bird, I have not, on trial, found to be true.

Nest and Eggs of the Redstart. Drawn on the Copper by J. Bolton, Halifax.

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MOLACILLA RUBECULA.

Lin. Syst. 337.

THE RED BREAST.

PLATE LV.

The Bill is black at the tip, brown at the base ; the iris of the eyes a pale brown ; the pupil black ; the top of the head, the back and coverts of the tail, are of a dusky olive colour ; the wings and tail more dusky, but the borders of the feathers in both are of the same olive colour. The forehead, throat, and breast are of a dull orange colour ; the belly, dusky white ; the legs and feet black.

I have figured the cock in the attitude which he frequently assumes when in his summer retreats, amongst trees and bushes, where he perches himself upon a spray not far from his mistress and family, and sings delightfully.

I have figured the female as we see her in time of snow, when contracted to a ball, and shivering with cold. She stands on a log at the back door, praying to be admitted within the warmth of the kitchen fire.

The Brimstone Butterfly,* when a caterpillar, feeds on the leaves of Buckthorn ; changes to a chrysalis in May, and to a Butterfly in June ; frequents hedges and the borders of woods, and is easily taken.

* *Papilio Rhamni* Linn.

1794. by James Bolton, Scannary, Halifax.

NEST AND EGGS OF THE REDBREAST.

PLATE LVI.

Redbreasts place their nests on or near the ground, fixing them against the root of some old tree or mossy wall, in a shady and quiet situation; sometimes they nest about farm yards or hay ricks.

In the nest before me, a large quantity of moss, mixed with a few oak leaves and small sticks, form the outer coat; being bound together with blades of grass and straw. The middle coat consists of the same material, but finer and softer.

The lining consists of a large quantity of cow's hair. The whole is loosely compacted, and the cavity shallow.

The eggs are five or six, of a sort of cream colour, with brown red spots, most numerous on the larger end.

The Redbreast, when kept tame, is a pleasant bird, and will sing in winter when most others are mute.

REDBREAST NEST and EGGS, *ad vivum dil.*

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MOTACILLA ATRICAPILLA.

Syst. Nat. 332.

THE SUMMER BLACKCAP.

PLATE LVII.

The Bill is black at the point, elsewhere of a dusky colour; the eyes are black; the crown of the head, black; the back, mouse colour, with a cast of olive; the wing and tail feathers, dusky, with olive edges; the throat, breast, and belly, white; the legs and feet, black.

The hen differs from the cock only in being the lesser bird, and in that the feathers on the head are not black, but of a reddish brown, as figured on the bottom of the plate.

The fly is called *Musca Muliebris*; it has no English name. The figure is magnified, the natural fly being only about two lines long; it is a scarce species.

Fig. 2. And *Murca multiebris* Published as the Act says

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NEST AND EGGS OF THE BLACKCAP.

PLATE LVIII.

The Blackcap comes to us in April and leaves us again in September; inhabits shady woods. The nest before me is made of small stalks of dried plants, having little tufts of soft moss here and there intermixed; the middle coat consists of a finer choice of the same materials; and the lining is very fine fibres and black hair. This nest was built in a low bush, about two feet from the ground. The eggs are five or six, of a dull white, with dusky spots.

The Blackcap, as Mr. Pennant justly observes, “sings finely; it has usually a full, sweet, deep, loud, “wild pipe; yet the strain is of short continuance, and “his motions are desultory: but when he sits calmly “and earnestly engages in song, he pours forth very “sweet but inward melody, and expresses great variety “of sweet and gentle modulations, superior perhaps to “those of any of our warblers, the nightingale except- “ed; while they warble, their throats are wonderfully “distended.”

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MOTACILLA MODULARIS.

Syst. Nat. 329.

HEDGE WARBLER, OR SPARROW.

PLATE LIX.

The bill, in the specimen I describe, is of a dusky yellow; in some the bill is black; the eyes are brown; the head brown, with a shade of ash colour, and having a black dash down the middle of each feather. The back is of an orange brown, the middle of each feather black; the rump, olive colour; the wing and tail feathers are of a mouse colour, having their edges brown. The throat and breast are a greyish lead colour; the belly, a dusky white; the legs and feet, yellowish.

The hen differs from the cock in being smaller, and the feathers of the back of a duller colour. The cock has a soft, melodious, warbling song, most pleasing when heard alone.

In winter it is a domestic bird, frequenting gardens and farm yards; in summer, retires to hedges of Holly trees to breed; sings on some low bush, seldom mounting tall trees. Is known at Halifax by the name, Dun-nock.

The Caterpillar of the large Tyger Moth*, feeds on nettles and grass; changes to the chrysalis the beginning of June; is on the wing in July; frequents meadows, and is commonly found among new hay.

* *Phalæna caja* Linn.

Drawn and

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NEST AND EGGS OF THE HEDGE SPARROW.

PLATE LX.

The Hedge Sparrow most commonly makes her nest in a Holly tree, or some other sempervirent shrub. The nest I describe is made of coarse green moss, mixed with wool and small sticks, and loosely tied together with long blades of coarse grass. The lining consists of red cow's hair, brought in abundance, and rudely disposed of. The cavity is shallow, and the whole but loosely and awkwardly fabricated. The Hedge Sparrow lays five or six eggs; they are blue, and have a cast of green.

James Audubon del. John Audubon sculp.
Six Eggs of the Hedge Sparrow. Published as the Act directs April 7th 1794

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MOTACILLA HIPPOLAIS.

Syst. Nat. 330.

THE PETTYCHAPS.

PLATE LXI.

The bill is slender; black at the point, yellowish at the base; the mouth, yellow within. A yellow line passes over the eye, and there is a small touch of the same colour below the eye; and between the base of the bill and the eye, a dark coloured line. The head, back, wings, and tail, are of a dusky mouse-colour, with a shade of olive. On the angle of the wing is a yellow spot; the throat and upper part of the breast are a dusky white, with a few touches of a pale yellow; the lower part of the breast is white; the belly and coverts under the tail, pale yellow.

The colours of the cock are a little stronger than those of the hen, and he is the larger bird. He sings mounted on some high tree. His song consists of a few notes, but it is loud, chearful, and repeated with frequency, and great spirit.

Allychaps Cochus Glen: and Pellala parous Drawn from life and etched by Geo. S. S. 1851

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NEST AND EGGS OF THE PETTYCHAPS.

PLATE LXII.

This little warbler makes its nest near the root of a tree or on some sunny bank, under a furz bush, or a tuft of grass. The nest before me, consists wholly of the stalks of dried grass, the coarser on the outside, the finer within, only a few black hairs are mixed in the lining. The form of the nest is a little odd; it was placed on the steep side of a little hillock, under a tuft of fern. The fore part and sides of the brim are narrow, the back side broader and raised, but not properly arched, as in the nest of the Green Wren next to be described. The eggs are from eight to twelve in number; they are of a pure white and spotted with small red spots.

In Yorkshire this bird is called Strawsmall or Beam-bird.

Nest and Eggs of the Tody Chaparral. Published as the Act Direct April 1st 1796

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MOTACILLA TROCHILUS.

Syst. Nat. 338.

GREEN OR YELLOW WREN.

PLATE LXIII.

The bill is horn colour, with a black tip; the eyes black; the inside of his mouth yellow. Over the eyes is a yellow line, the head and back are green, with an olive shade; the rump more yellow. The wings and tail, dusky olive, the feathers of both edged with a paler olive; the throat, breast, and belly, are a bright yellow, in the male; paler in the female, her belly being of a dusky white. The covert feathers beneath the tail, in both male and female, are of a pale buff colour. On the angle of the wing is a spot of a beautiful yellow, in both sexes.

The song of this little bird is loud and shrill, and his notes sprightly and pleasant; he perchès on the branch of some tall tree; and, with mouth wide open, wings half raised and shaking, and bill erect, he makes the woods re-echo. The cry of this bird, when disturbed, or in distress, is not unlike that of the Grasshopper Warbler, re, re, re, often repeated; and is accompanied by a restless motion, continually hopping from spray to spray, but will not be driven far from the place of his residence.

The fly figured on this plate is the *Sphex Perturbator*. It frequents dry banks; and burrows in the sand, to make a lodging for its young. It is an insect of prey, feeding on very small flies, caterpillars, &c.

J. Bolton del et scul.
Green Wren male and female. & *Sphex perturbatrix*. Drawn from Nature & published as the Act directs April 4th 1811

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NEST AND EGGS OF THE GREEN WREN.

PLATE LXIV.

The manners of this bird greatly resemble those of the Pettychaps, particularly in regard to nesting. The nest I describe, was built amongst moss, under a billberry-bush. The first coat consisted of a few sprigs of moss, with a great many stalks of dry grass. The nest is pretty deep, and to the north side arched over with windlestraws, and other dried stalks of plants ; so that the bird enters by one side, as does the Brown Wren. The lining consists of soft bents and feathers. In this nest was eight eggs, white, and thickly covered near the big end with blood-red spots.

*... drawn on the Copper immediately from Nature
by J. Bolton.*

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...USA

MOTACILLA REGULUS.

Syst. Nat. 338.

GOLDEN CROWNED WREN.

PLATE LXV.

This is the smallest of the British birds, being not more than four inches long; the bill is black at the point, flesh-colour at the base, from whence arises a white line that runs over the eye. The sides of the head, immediately above this line, are green; above which, on each side, is a narrow list of black feathers; and on the crown of the head, above these black lists, is a little tuft or crest of soft silky feathers: in the male, of a bright orange colour; in the female, yellow. The bird has a power of erecting this crest at will; and, also, of hiding it entirely by contracting the skin of the crown, and drawing together the two black lists, between which the crest is placed. The back is green, with a shade of olive; the quills and tail feathers are dusky, with green edges; the first row of coverts are green, with tips of a pale buff-colour; the quills are black near the root, which make a remarkably black spot on the wing. One or two of the last quills have their-outer borders white in the male bird; the throat, breast, and belly, are of a pale buff or cream-colour; the legs and feet dusky.

The fly is the *Musca Demano*, found in May and June, about stagnant waters.

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NEST AND EGGS OF THE GOLDEN CROWNED WREN.

PLATE LXVI.

The Golden Crowned Wren makes her nest against some mossy wall or ivy-twisted tree. The nest I now describe was artfully hid in a close bunch of ivy, which hung down from the side of an old hazle-tree, about ten feet from the ground ; it is nearly of a globular figure, and was placed so as the mouth leaned a little to the sun ; the outside is formed of soft green moss, wove and pletted together with wool, spider's webs, and the white down which grows on the catkins of the willow-tree. The lining consists of willow down and a great number of small soft feathers. The whole is a beautiful little structure, well suited to its inhabitant. With the nest, I have also figured the ivy branch in which it was suspended. There were eight eggs in this nest, of a kind of cream-coloured brown, and destitute of spots ; in size, not larger than represented in the figure.

Nest of the Golden Crowned Wren. J. Bolton del et sculp.

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MOTACILLA TROGLODYTES.

Syst. Nat. 337.

BROWN WREN.

PLATE LXVII.

The bill is slender, black at the point, dusky at the base. The iris is narrow, and of a pale brown; the pupil, black. Over the eye is a line of pale brown; the head, back, wings, and tail, are of a strong tawny brown, the feathers being checquered or barred across with black; which barring is most conspicuous in the wings and tail. The throat, breast, and belly, are of a pale dusky buff-colour; the last faintly crossed with small brown bars. The legs and feet are a pale brown.

“The Wren,” says Mr. Pennant, “may be placed amongst the first of our singing birds; it continues its song throughout the winter, except during the frosts.” And the Honourable Daines Barrington allows it a considerable place in his Balance of Singing Birds; ascribing to it, twelve degrees of sprightly notes, four degrees of composition, and four degrees of execution.

Male and female. *Musca levidus*

in *Act. Acad. Sci. Paris* the first 1792. by James Bolton at Stannary near Dalkey.

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NEST AND EGGS OF THE BROWN WREN.

PLATE LXVIII.

The Wren builds her nest beside hollow ways, where the earth overhangs, or against the side of some mossy wall or rock, where it is thickly shadowed above. The nest is of an oval shape, smallest at the upper end, and an hole is left in the side, for the bird to go in and out. The specimen which lies before me, is composed chiefly of green moss, having on the outside several dried leaves and branches of fern, tied with blades of grass ; within this coat is another made of wool and fine soft moss; and, within that, the lining, which consists of wool and feathers. The eggs are of a roundish figure ; white, and spotted, near the big end, with small red spots.

A strange thought entered into the head of an English ornithologist, concerning the nest of this bird. He says, “ It is strange to admiration, that so small a “ bird should cover so great a number of eggs ; and “ more strange, that it should feed such a company of “ young and not miss one, and that in the dark too.” A more modern English writer says, “ and that too in “ utter darkness.” I believe I ought not to have said a strange thought, but a strange want of thought. Any one who thinks about it, and compares the dimensions of the window, with the dimensions of the house within, will instantly perceive, that a Wren’s nest is more strongly lighted than any gentleman’s palace in the kingdom.

Wren's nest. Published by J. B. Colver.
"1." of the common Wren. Drawn on the Copper by J. Bolton.

MOTACILLA SALICARIA.

Syst. Nat. 330.

SEDGE-WARBLER OR WILLOW-LARK.

PLATE LXIX.

The bill is black; the head brown, marked with dusky touches down the middle of the feathers; over each eye a white line, and over that a black one; cheeks, brown; the throat of a pale yellow; breast, white; belly and covert feathers beneath the tail, pale buff. The head and back, olive-brown, spotted with dark spots. The feathers of the wing and tail, dusky, edged with olive-brown; the tail, when spread, is fan-shaped, the middle feathers being longest, those towards the sides gradually shortening.

This bird inhabits watery places, where sedges, rushes, and reeds, abound. It skulks, like the Grasshopper-Warbler, and is not often seen. It sings by night; and, in some parts of Lancashire, is taken for the Nightingale. Its song is a mixture of that of other birds; its pipe, loud and clear. It makes very pleasing melody in summer, when

The night is still, the air serene,
Fann'd by a southern breeze;
The glimm'ring moon may just be seen
Reflecting thro' the trees.

The caterpillar of the admirable butterfly* figured on the plate, feeds on nettles; changes to a chrysalis in July, and to a butterfly in August; inhabits woods; and, on being disturbed or pursued, flies high, and alights near the tops of the trees.

* *Papilio Atalanta* Linnæi.

Coch. Ligeia Bird Admirable Butterfly and *Musca peruviana*. J. Bolton del et sculp.

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NEST AND EGGS OF THE WILLOW-LARK.

PLATE LXX.

The Sedge-Bird, or Willow-Lark, makes a pretty round nest, amongst sedges or rushes, beside still rivers or ponds of water. The specimen before me is made of moss and wool, bound about with the stalks of plants and flowery panicles of grass. The middle coat consists of wool, moss, and cow's hair; and the lining is a mixture of black and white hairs, with a few fine fibres of roots intermixed. The eggs are five or six, of a dull olive-colour, and unspotted; but having sometimes one or two black lines near the big end. This is a rare bird about Halifax, but plentiful in some parts of Lancashire, where it inhabits the borders of still ponds and marl-pits.

The Willow-Lark comes to us in April and retires in September.

Vase and Eggs of the Vasebird. Drawn on the Copper, from Life by J. Bolton

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MOTACILLA ARUNDINACEA.

Phil. Trans. vol. 75.

THE REED WARBLER.

PLATE LXXI.

The bill is black at the point, flesh-colour at the base; the eyes, brown; the inside of the mouth, orange-colour; from the bill to the eye, a pale line; the whole upper side of the bird is of a dusky olive-brown; the wings and tail, darker than the rest: the tail, when spread, is fan-shaped; the throat is white; the breast and belly, a pale buff-colour; the feathers under the tail, white; the legs and feet, of an olive-colour.

This bird was communicated to the Royal Society, as a new British species, by the late Rev. Mr. Lightfoot, in 1785, and was published in the Philosophical Transactions, vol. 75, part the 1st. Mr. Lightfoot first discovered it on the banks of the river Colne, near Uxbridge. He very properly conjectures, that the bird was not confined to that place alone; for it was known to me long before that time, though I knew no name for it. Its haunts in Yorkshire, are rushy places near rivulets; and its actions greatly resemble those of the White-Throat. I have seen several of their nests in Yorkshire: and the birds have also been sent to me from Lancashire, shot on the river Roch.

The butterfly is called the small garden White-She-Caterpillar, * feeds on cabbage, changes to a chrysalis in September, and flies the following May. A, the male; B, the female.

* *Papilio Rapæ* Linn.

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NEST AND EGGS OF THE REED-WARBLER.

PLATE LXXII.

The nest I describe, was built in a low hazle-tree ; the outside is composed of weeds and moss, woven together with stalks of plants and blades of grass ; the middle coat is made of the same stuff, but softer and finer ; and the lining consists of willow down, and black hairs. The whole is loosely wound about, not with pack-thread, as in Mr. Lightfoot's nest, but with stout double-twined woollen yarn, such as the poor people make stockings of. Of several nests of this bird which I have seen, this is the only one where any kind of twined bandage was made use of. The eggs are five or six in number ; of a dusky white, spotted more or less with dusky spots. The cock has a sweet song ; his notes partake of those of the White-Throat, and those of the Black-Cap ; and are often repeated with a shaking of the wings and tail, while he is perched on some low bush not far from the ground.

Nest and Eggs of the *Motacilla*

arundinacea. from Nature by J. Bolton.

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ALAUDA TRIVIALIS.

Syst. Nat. 288.

GRASSHOPPER-LARK, OR WARBLER.

PLATE LXXIII.

Not having a specimen of this bird in my possession, my figure on the plate was copied from a drawing, done by my good friend Mr. Latham of Dartford, author of the General Synopsis of Birds, in 7 vols. 4to.; and the Index Ornithologicus, in 2 vols.; the most complete work on birds that has hitherto appeared in this or any other language, whose description of the species under notice I here subjoin.

“ Size, small ; length, between five and six inches :
“ bill, dusky ; between the bill and eyes, white ; the
“ colour of the upper parts of the body, greenish brown,
“ each feather dusky in the middle. Under parts, yel-
“ lowish white, with a dusky tinge on the breast ; tail,
“ wedge-shaped, rather long, the outer tips of the fea-
“ thers rather pale ; legs, dusky-white ; the hind claw,
“ short, and sufficiently crooked to prove that it does
“ not belong to the Lark genus, among which it has been
“ placed by all authors before Mr. Pennant.” See La-
tham’s General Synopsis of Birds, vol. 4, page 493.

Painted as the Redstarts April the first 1794. — J. Latham del J. Bolton sc.

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NEST AND EGGS OF THE GRASSHOPPER-
WARBLER.

PLATE LXXIV.

This nest was placed in a branch of the round-leaved-willow, which grew near the ground, and laid prostrate thereon, in a very shady situation: the outside consisted wholly of small stems of dried grass and other plants; the next oval, consisted of the same materials chosen softer and finer; and, in the lining, a few fine fibres of roots, and a few hairs, were mixed. The eggs in this nest were five; of a dull white, with a tinge of green, and spotted at the large end with brown-red spots. This nest, like the bird to which it belongs, is so artfully concealed as to be very rarely seen.

Nest and Eggs of the Grasshopper Warbler. J. Bolton del et sc.

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MOTACILLA ŒNANTHE.

Syst. Nat. 332.*THE WHEAT-EAR, OR FALLOW-SMICH.*

PLATE LXXV.

The bill, eyes, and inside of the mouth, are black ; the brow, just above the bill, white ; which white is extended in a line over the eyes, and terminates above the ears. A line of black takes its rise at the base of the bill, in which the eyes are placed ; and it spreads backward and covers the ears. The top of the head and the back are of a grayish lead-colour ; the rump, a pure white. The tail consists of twelve feathers ; the two middlemost are black, except about half an inch of white at their bottoms ; all the rest are white, with black tips. The throat, sides of the neck, and upper part of the breast, are of a very pale brown : and in the male birds, when they first arrive here, there is a pretty blush of crimson over the brown, which fades in the course of the summer. The wings are black ; the legs and feet, long, slender, and black. In the female, the white line over the bill and eyes is wanting ; the black line, in which the eyes are placed, is narrow, and not extended over the ears ; the head and back are dusky brown, and the wings of a bistre colour. The cock, in breeding time, has a pleasing soft song. The Wheat-ear inhabits fields surrounded with stone-walls, on which it sits, seldom alighting on trees.

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NEST AND EGGS OF THE WHEAT-EAR.

PLATE LXXVI.

The Wheat-ear builds its nest in some wall or rock which faces the south, and is earthed upon the north side. The nest now lying by me, is loosely composed of straw, grass, and rushes; with here and there a little wool or moss intermixed. The lining consists of the same stuff, with more wool, and sometimes a few feathers. The nest is loosely made, and almost flat, having but a very shallow cavity. The eggs are five or six, of a longish figure, a pale blue colour, and unspotted.

These birds come to us in April; breed here, and return with their young in September.

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MOTACILLA RUBETRA.

Syst. Nat. 332.

WHINCHAT, OR EUTICK.

PLATE LXXVII.

The bill and eyes are black ; from the base of the bill a white line is extended over the eye to the side of the neck. The feathers on the head and back are black, with brown borders. The rump and covert feathers of the tail incline to a tawny-colour. The tail consists of twelve feathers ; their bottoms are white, the rest black ; as are also the wing feathers, except their margins, which are of a dusky-brown. The first wing coverts are mixed with white and black ; the second are wholly white, which make a conspicuous white mark on the extended wing. The throat is white ; the breast, of a tawny-brown ; the belly and under-coverts of the tail, white ; the legs and feet are long, slender, and black. In the hen, the line over the eye is a dusky-white ; the first coverts of the wing are destitute of white, and the second have light coloured tips. They inhabit meadows, and nest among the grass. They sit on a wall or some little hillock, frequently stooping, raising the tail, and repeating a cry like the word eutick. The male mounts a tree to sing ; his song is agreeable, and the notes well varied. His voice is astonishingly loud and shrill, considering the smallness of the organ.

Published as the Act Directs April the 1st 1794. by J. Motion at. &c.

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NEST AND EGGS OF THE WHINCHAT.

PLATE LXXVIII.

The Whinchat makes her nest in a field or meadow, under the shelter of some tuft of grass or weeds, just in the same manner as the larks. The nest now lying before me, is composed of much dry grass and cow's hair, placed in layers one over another. The first, or outer coat, is dead grass ; the next hair ; then another of finer grass ; and upon that the lining, which is wholly hair. The diameter of the cavity is three inches, the depth not quite one inch. This bird seems very indifferent with regard to the beauty of her nest, the materials being hurried together in a very careless and negligent manner ; and, apparently, with great dispatch. The eggs are five or six, of a glossy blue, and sometimes have a few latent dark spots near the larger end. The Whinchat has two or three broods in a year.

MOTACILLA SYLVIA.

Syst. Nat. 330.

THE WHITE-THROAT.

PLATE LXXIX.

The bill is black at the point ; dusky at the base : the mouth, orange-colour ; the iris of the eyes, brown ; the pupil, large and black ; the cheeks are olive-brown ; the head and back, red-brown, inclining a little to an olive-colour ; the feathers of the tail are dusky, with red-brown edges, except the two outmost feathers on each side, which have their outer webs white. The quill and covert feathers of the wings are dusky, with red-brown edges, except the first quill, which has its outer border white. The throat is white, thickly covered with short feathers ; which, when he sings, rise like a ruff round the base of the lower chap. The breast is tinged with a pleasant reddish brown ; the belly and thighs are white. The inner fore toe adheres to the middle one by a membrane ; the legs and feet are a dull orange-colour.

In breeding time the cock sings stoutly. Seated on some low bush, with head erect, mouth wide open, and throat distended, he pours out his variety of notes with boldness and great spirit.

The butterfly on the plate is the *dark clouded yellow*.* It frequents meadows, in the month of August, but is very rare in most parts of this kingdom.

* *Papilio Electra* Linn.

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NEST AND EGGS OF THE WHITE-THROAT.

PLATE LXXX.

The White-Throat builds in some low bush or briar, two or three feet from the ground. The materials in the nest before me are chiefly the dried stems of wood-roof and goosegrass, mixed with other small stems, and bound together with spiders' webs. A thin coat of these substances serves for the whole nest, there being only a few hairs put upon it for a lining; so that the whole, when finished, if held up against the light, appears like a piece of indifferent netting: but, by reason of the roughness of the goosegrass, and the tenacity of the spiders' webs, the nest retains its figure after handling, much better than many others which are of a heavier make. The White-Throat lays five or six eggs, of a dull green-gray, thickly spotted with brown spots.

FROM THE PRESS OF G. NICHOLSON, MANCHESTER.

Fig. 1. Nest of the Thrush. Published as the Advertiser April 1st 1846. From a drawing by

I N D E X;

with References to the Figures of Authors.

- P L A T E
- Aberdevine.* 25 Pennant, page 109, tab. 5.—Albin, vol. 3, t. 76.—Frisch, t. 11.
- Blackbird.* 7 Pennant, t. P. —Albin, v. 1, t. 37.—Lewin, v. 2, t. 61.—Frisch, t. 29.
- Blackcap.* 57 Pennant, t. 8, fig. 5.—Buffon, v. 5, t. 8, fig. 1.—Frisch, t. 23.
- Bullfinch.* 11 Pennant, t. U, fig. 34.—Albin, v. 1, t. 59, 60.—Hays, t. 37.—Lewin, v. 2, t. 37.—Schæf. El. t. 59.
- Bunting.* 15 Pennant, t. W, fig. 7.—Schæf. El. t. 43.
- Canary-Bird.* 35 Albin, v. 1, t. 65.—Frisch, t. 12.
- Chaffinch.* 23 Pennant, t. 5, fig. 23.—Albin, v. 1, t. 63.—Lewin, v. 2, t. 69.—Buffon, v. 3, t. 36.—Frisch, t. 1.
- Flycatcher, spotted.* 37 Pennant, t. P 2, fig. 4.—Lewin, v. 3, t. 87.—Buffon, v. 4, t. 25, fig. 2.—Frisch, t. 22.
- Flycatcher, pied.* 39 Pennant, t. S, fig. 1.—Edwards, t. 30.—Lewin, v. 3, t. 88.—Frisch, t. 24, male; *ib.* t. 22, fem.
- Goldfinch.* 21 Pennant, t. V, fig. 1.—Albin, v. 1, t. 64.—Hays, t. 34.—Lewin, v. 2, t. 81.—Frisch, t. 1.—Schæf. El. t. 24.
- Greenfinch.* 13 Pennant, p. 107.—Albin, v. 1, t. 50.—Lewin, v. 2, t. 69.—Frisch, t. 2.—Schæf. El. t. 1.
- Grasshopper-Warbler.* 73 Pennant, t. Q, fig. 5.
- Hedge-Sparrow.* 59 Pennant, t. S, fig. 3, 4.—Albin, v. 3, t. 59.—Frisch, t. 21.
- Linnet, Common.* 27 Pennant, p. 110.—Lewin, v. 2, t. 38.—Frisch, t. 9.
- Linnet, Red-headed.* 29 Pennant, p. 101.—Albin, v. 3, t. 72, 73.—Lewin, v. 2, t. 84.—Frisch, t. 9, fig. 1, 2.
- Lin. Lesser Red-headed.* 31 Pennant, p. 111.—Albin, v. 3, t. 57.—Lewin, v. 2, t. 85.—Frisch, t. 10.
- Linnet, Mountain.* 33 Pennant, 111.—Lewin, v. 2, t. 86.—Frisch, t. 10.
- Lark, Sky.* 41 Pennant, t. S 2, fig. 7.—Albin, v. 1, t. 41.—Frisch, t. 15.—Buffon, v. 5, t. 1.—Schæf. t. 18.
- Lark, Wood.* 43 Pennant, t. Q, fig. 3.—Albin, v. 1, t. 42.—Frisch, t. 15.
- Lark, Tit.* 45 Pennant, t. Q, fig. 6.—Albin, v. 1, t. 43.
- Lark, Field.* 47 Frisch, t. 16.
- Mistle-Bird.* 3 Pennant, t. P, fig. 1.—Albin, v. 1, t. 38.—Lewin, v. 2, t. 57.—Frisch, t. 25.—Buffon, v. 3, t. 19.
- Nightingale.* 51 Pennant, t. 8, fig. 1, 2.—Albin, v. 3, t. 53.—Frisch, t. 21.—Schæf. Mus. t. 23.
- Petty-Chaps.* 61 I find no figure of this bird.

- Ring-Ouzle.* 9 Pennant, t. P, fig. 1.—Lewin, v. 2, t. 62.—Buffon, v. 3, t. 31.—Frisch, t. 30.
- Reed-Sparrow.* 19 Pennant, t. W.—Albin, v. 2, t. 51.—Lewin, v. 2, t. 73.—Hays, t. 35.—Frisch, t. 7.
- Redstart.* 53 Pennant, t. S, fig. 6, 7.—Albin, v. 1, t. 50.—Hays, t. 40.—Frisch, t. 19.
- Redbreast.* 55 Pennant, t. S, fig. 2.—Albin, v. 1, t. 51.—Hays, t. 40.—Buffon, v. 5, t. 11.—Frisch, t. 19.
- Reed-Warbler.* 71 Philosophical Transactions, v. 75, t. 1.
- Starling.* 1 Pennant, t. P 2, fig. 1.—Albin, v. 1, t. 40.—Hays, t. 32.—Frisch, t. 217.—Schæf. El. t. 65.
- Song-Thrush.* 5 Pennant, t. P, fig. 2.—Albin, v. 1, t. 34.—Lewin, v. 2, t. 58.—Frisch, t. 27.—Schæf. El. t. 68.
- Sedge-Bird.* 69 Albin, v. 3, t. 60.
- Wagtail, Gray.* 49 Pennant, p. 105.—Edwards, t. 259.—Schæf. El. Orn. t. 33.
- Whinchat.* 77 Pennant, t. S 2, fig. 34.—Hays, t. 39.—Frisch, t. 22.
- Wheat-Ear.* 75 Pennant, t. S 1, fig. 5, 6.—Albin, v. 1, t. 55.—Frisch, t. 22, female.
- White-Throat.* 79 Pennant, t. S, fig. 4.—Albin, v. 3, t. 58.
- Wren.* 67 Pennant, t. 42.—Albin, v. 1, t. 53.—Hays, t. 38.—Frisch, t. 24.
- Wren, Golden-crowned.* 65 Pennant, t. S, fig. 3.—Edwards, t. 254.—Albin, v. 1, t. 53.—Hays, t. 38.—Frisch, t. 24.
- Wren, Green.* 63 Frisch, t. 24, fig. 2.
- Yellow-Hammer.* 17 Pennant, p. 112.—Albin, v. 1, t. 66.—Lewin, v. 2, t. 73.—Frisch, t. 5.—Schæf. El. t. 32.—Buffon, v. 4, t. 8.

In this index I have given no place to the nests, because each may be found on the plate next succeeding the bird to which it belongs.

THE BOOKS REFERRED TO IN THE FOREGOING INDEX, ARE,

Albin's History of Birds, 3 vols. 4to, with 300 plates, coloured.	London, 1731.
Edward's History of Birds, &c. 7 vols. 4to, with 365 plates, coloured.	London, 1743.
Pennant's British Zoology, imperial folio, with 132 plates, coloured.	London, 1766.
Hays's Portraits of British Birds, imperial folio, with 40 plates, coloured.	London,
Lewin's British Birds, 7 vols. imperial 4to, with painted drawings.	London, 1789.
Buffon's History of Birds, 10 vols. imperial folio, with coloured plates.	Paris.
Schæffer Elementa Ornithologica, 4to, with 70 plates, painted.	Ratisbon, 1779.
Schæffer Musæum Ornithologicum, 4to, with 4 plates, painted.	Ratisbon, 1789.
Frisch's History of Birds, 3 vols. folio, with 255 plates, most accurately and beautifully drawn, engraved, and coloured.	Berlin, 1763.

ERRATA IN VOLUME FIRST.

- page. 1, line 23, Preface, read, *of many*.
 1, 6, for *compresed*, read, *depressed*.
 18, 20, read, *both cock and hen*.
 35, 22, read, *canaria mas*.
 39, 1, read, *ATRICAPILLA*.
 39, 8, read, *brisile-like*.

VOLUME SECOND.

- 48, line 8, read, *is made*
 52, 35, for *fo* read *lo*.
 63, 6, read, *the mouth*.
 64, 6, read, *consists*.
 65, 22, read, *remarkable*.
 71, 27, read, *garden white; the*
 73, 3, read, *GRASHOPPER*
 74, 8, read, *next coat*
 76, 4, read, *up, on*
 82, 40, read, *40 plates*.