



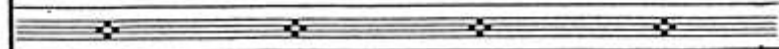
THE
COATE RESERVOIR
SYSTEM



WITH A MAP AND
TWO PHOTOGRAPHS



By J. B. JONES



Swindon Press Ltd.

The Coate Reservoir System

The River Cole, or Dorcan, born of the union of springs rising in Chisledon village and Burderop Park, passes underneath Coate Reservoir which its own waters create, flows past the Roman Ermin Street station whose lost name may be disguised in modern Covingham, and joins the Thames just below Lechlade. An insignificant stream to boast associations historical, literary and engineering! [Richard] Jefferies had its windings by heart, and thought of it mournfully as he lay dying in distant Sussex—“I have not forgotten the brook, but the brook has forgotten me.” What it meant to the poet [Alfred] Williams is well-known to readers.

Curious that Williams, passing strange that Jefferies, should have slighted so striking a name as Dorcan for the stream they both loved. At least neither ever mentions it, nor even its charming alternative Doreen, which I have heard used quite recently in Coate lower fields by a man mending barbed-wire fences. For Jefferies, it is just the “brook,” and once the “Roman Brook.” Yet the old terminology was there; has remained alive in that quiet countryside from Anglo-Saxon times till now. Beside Doreen, I have also heard During; both this year. Other variants for it are as numerous as odd, Dorca, Dorcyn, Dorterne, Dorceri, but these occur in old charters only; a source, it may be remarked, which gives Lidd and Lynt as Cole’s Liddington and Bishopstone tributaries.

Coate Reservoir was originally intended to supply the neighbouring Wilts and Berks Canal, now long disused. Communication was not by pipe-line, but by a long open ditch in the Walcot fields, east of Swindon. Straight segments follow one another disjointedly across the two-mile stretch of low meadowland between Coate and the canal, and midway, at Partridge’s Farm, through which the “cut” passes, describe a formidable double bend as a motorist would say. If the Great Western killed the canal before the latter could get into its traffic stride — a dated keystone on the reservoir lower dam is inscribed 1822, and the railway reached Swindon by 1840—yet Coate could supply the Stratton powder (ammonium nitrate) works in 1915, and even in 1944 fills a large static water tank standing in the canal bed.

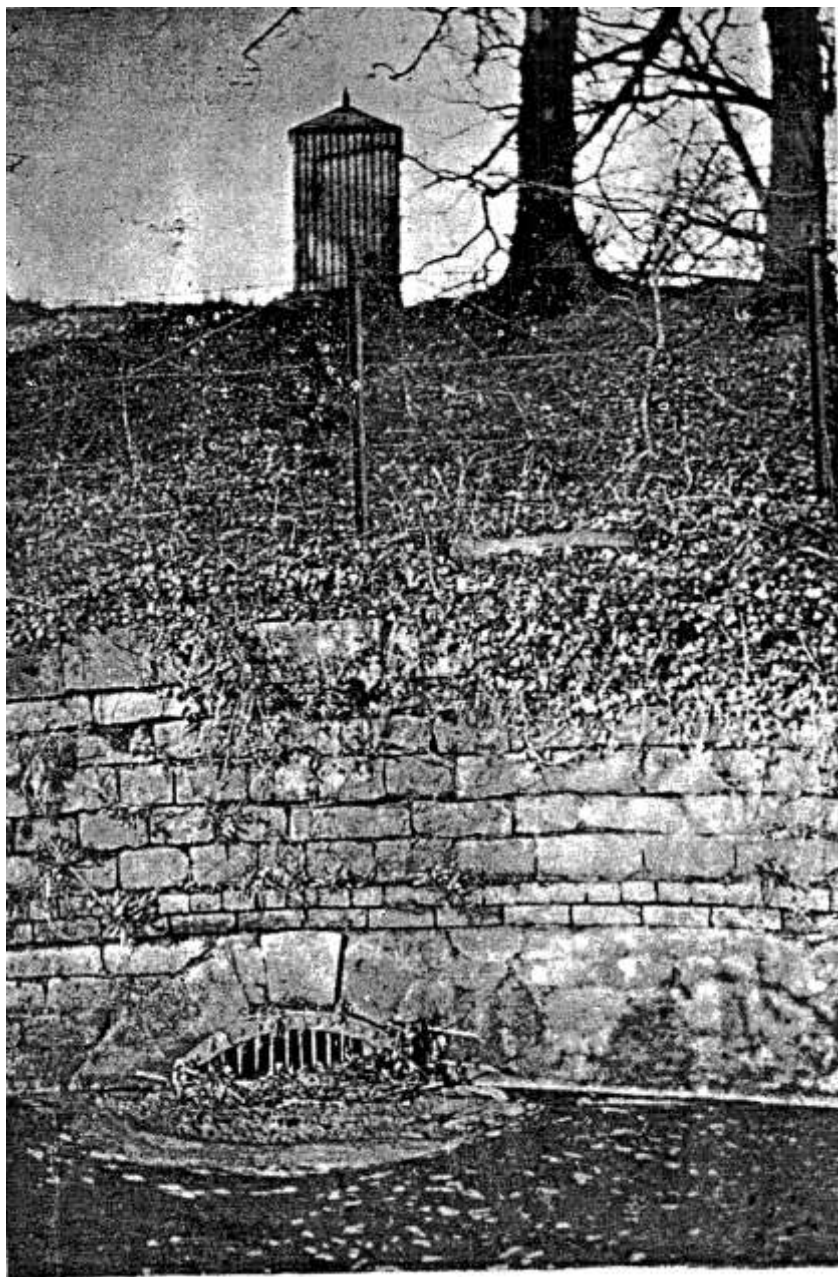
An open brick conduit, some 10 feet high and 130 yards long, carried the reservoir water over the intervening Church Farm rivulet, or Nythe brook, which here bends east close to the canal to join the Cole at Lotmead Farm. I recently stood on this bijou aqueduct garishly reconstructed in concrete in 1915, and watched it still contributing a

trickle from distant Coate. As I tracked the lowly feeder from its mock-grandiose termination on the derelict canal to its commencement at the big hatch in the Cole under Upper Snodshill Farm, there was the same spell, if in almost unrecognisable miniature, as had accompanied me along many miles of Wiltshire's deserted Fosse Way. What is this fascination? How could such be possible near Swindon? Skill had traced, sweat had dug this hedge-darkened slit. Were these the human factors whose memory yet lingers in that lush grassland? Will both, plentiful on the site of the Swindon Railway Works, exhale a like aura when the factory is long dead and gone?

A last word on Walcot. The bridges across its deep trough have been replaced by thick shapeless slabs of concrete, dumped down on the decayed piers. "Rocks" they are termed locally; you may hear yourself directed to "cross the feeder by that rock yonder." Irrigation trenches and sluices abound, and an auxiliary feeder (?) leaves the Cole behind Prince's Cottages at Coate to enter the main where this comes westward from Upper Snodshill hatch. Happily the big wet ditch is without history. But had some brutal Wilts and Berks foreman been liquidated here by an avenging shovel, the gloomy tradition would haunt today the booby-traps of outrageously twisting Dorcan. But it is time to cross the Marlborough Road and look at the southern and far more important member of the Coate Reservoir system.

Two miles from Chisledon in the course of the Cole is Greenhill hatch. From here starts Day House loop which, missing the Reservoir and dawdling through Coate hamlet, links up with Cole at Lower Snodshill in time for Walcot. A quarter of a mile below Greenhill is the chief sluice of all, which, until now nameless, may with justice be called Lawrence's. At this critical point the Cole is split; one part is allowed to follow its natural runway; the other, destined to fill the reservoir half-a-mile still lower down, has had a bed made for it. The two lead roughly parallel courses not far apart, but the gradient for the new "brook," as Jefferies always poetises this feeder, is constructed so that the supplanter arrives at the reservoir at a higher level than the true Cole close by. All the way from Lawrence's hatch, the "cut" can be recognised by its Walcot-like straight lines, by its banked-up sides at first, and by more or less fragmentary brick bridges and tunnels. Cicely's Bridge, which is in fair preservation, is the one nearest the reservoir.¹

¹ See *Round about a Great Estate*.



CULVERT INLET WITH SLUICE

Two earthen embankments, with trees on their ridges and outer slopes, enclose the impounded Cole water. The lower, or northern dam, near the Swindon Road, hinders the stream from flowing Thamesward; the farther one, about one mile to the south, prevents the imprisoned water flooding back up the valley in the direction of Chisledon. Broom Manor Lane, by the Bird Sanctuary, may be looked on as forming a third embankment. Altogether the lake had an area of nearly 80 acres.

Riparian rights, the authentic though wizened Cole, and presence of a small but persistent spring thrown out by the limestone bastion against which the Day House end of the Upper dam abuts, provided the reservoir builders with some pretty complications of an already stiff problem. They handled them ingeniously, the last two items uniquely. A civil engineer of wide reputation says he has not met with the like during the whole of his long experience.

To provide a single underwater passage for both spring and Cole, a brick culvert of circular section, 44 inches in diameter, was built along the bottom of the reservoir site, following for the most part the old river bed. The Swindon Corporation boundary fence descending steeply from high ground at the Upper dam indicates precisely the position of both source and culvert-inlet. Here the low-lying Cole is seen to be deflected from its head-on approach to the dam by a short artificial willow-lined channel which hugs the foot of the dyke to join the spring. The fate of the latter is odd. It emerges from a rocky cave whose size would admit a biggish dog, then after no more than a few seconds of daylight, is engulfed with the Cole in the black darkness of the culvert. A sluice-box standing gauntly on the dam points out the tragic spot; a similar box on the main embankment marks the culvert's end. Jefferies must have suffered from claustrophobia or he would have made his Bevis seek adventure in this tunnel. There is a legend that someone tried to crawl through, but lost his life as the result. An iron grating at the inlet, framed pleasingly by masonry, keeps out floating rubbish. The lower end is left plain: Jefferies has seen coots and moorhens enter here.

This brick tube has cracked more than once. Closing the hole or holes is a troublesome matter; on an early occasion, bales of hay were used by water-bailiff Lawrence, and used successfully it appears; on another, in 1931, bags of cement. The culvert is generally leaking, but it must be remembered that it is considerably over 100 years old, and so may be regarded as having worn well. With the thorough-going restoration of the main embankment due by 1948, centenary of

Jefferies' birth, the engineer must include the question of the culvert, essential feature of the Coate system.

The reservoir is evacuated, when desired, by the main sluice near the turnstiles. Here also is the keystone bearing the date of opening, 1823. Silting is an unusually great nuisance, for the feeder from Lawrence's hatch runs over a stratum of gault, and splays the black mud as sediment upon the bed of the lake. At this end of Coate Water, the filth is 5 or 6 feet thick; should it happen to be exposed, it cakes over deceitfully, but never dries up. Cows breaking through the hard crust have had to be dragged out by horses or lorries. A man attempting to make a short cut in front of the Upper dam was halfway across when he promptly sank in up to his knees. Fortunately he threw himself at once on his face, and by distributing his weight, just managed to crawl to firm ground. As he pulled his legs out to start, the ooze let them go with a sickening pf . . . ew! All these cases occurred as late as 1944.

One cannot leave this subject without reference to the Genius of the Place, Richard Jefferies, not however to repeat the facts of his life, nor to extol again his inimitable literary achievements. Jefferies was a poet, not a Dryasdust. In his early, hastily-written History of Swindon he suggests that the spring behind the Upper dam was the only reason for the Coate culvert, and seems quite to forget that the River Cole, shrunken though it was, was the main item to be considered. His carelessness here had unfortunate results for Alfred Williams. Writing of the Reservoir, Williams pokes gentle fun at the local folk for imagining that an actual stream ran under the Tezzievoy, as some of them called it, and "kept its waters unmixed with those of the lake." Yet they were entirely correct and the poet of South Marston was the one in the wrong. Had he supplemented Jefferies' incomplete description by the use of his own feet and eyes as was his wont, he would not have opened Chapter II as he has done in his *Wiltshire Village*.

Edward Thomas, Richard Jefferies' biographer, looks on the reservoir "cut" below Lawrence's hatch as an ordinary rivulet. Certainly, frequent impenetrable hedges like those often shrouding the Walcot feeder may mask its real character. None the less, Thomas' misplaced lyricism is amusing where he dilates on "the brook that enters the reservoir; its bed is of the narrowest, and is among willow-herb and calthropped sedge, and under the overhanging briar and thorn which the delicate white bryony climbs over." Jefferies, of course, could distinguish between the two Coles, but failing to do so in the printed word, misled Thomas who consequently took the "brook" of

“Sport and Science” and of *Round about a Great Estate*, as a child of Nature.

A few geological facts may be assembled here. Walcot: is entirely Kimmeridge Clay. The reservoir area belongs to Kimmeridge, Portland, and Greensand strata, the two former much eroded, with the latter overlying them unconformably. From this red capping, lumps of black carstone are often kicked out by rabbits. The Portland limestone forming the lakeshore cliffs rests on Swindon Clay, thus causing the spring behind the Upper dam. Kimmeridge “doggers” are plentiful on the south and west margins of the mere. Except for a brief band of Greensand by the rear gate, the course of both Coles (real and feeder) is over Gault: molehills, red to black in quick succession, give the facts away. The geological section at the “precipices” — Jefferies’ term — is of such scientific value that no “development” should be permitted to obscure it. It must remain rough.



COATE "PRECIPICES"

The future of Coate Water has engaged considerable attention of late. The Reservoir became the property of the Swindon Borough in 1914. When the main dam was reported by Government inspectors to need reconstruction, the Corporation's remedy, instead of rebuilding, was to allow a large amount of water in the lake to run permanently

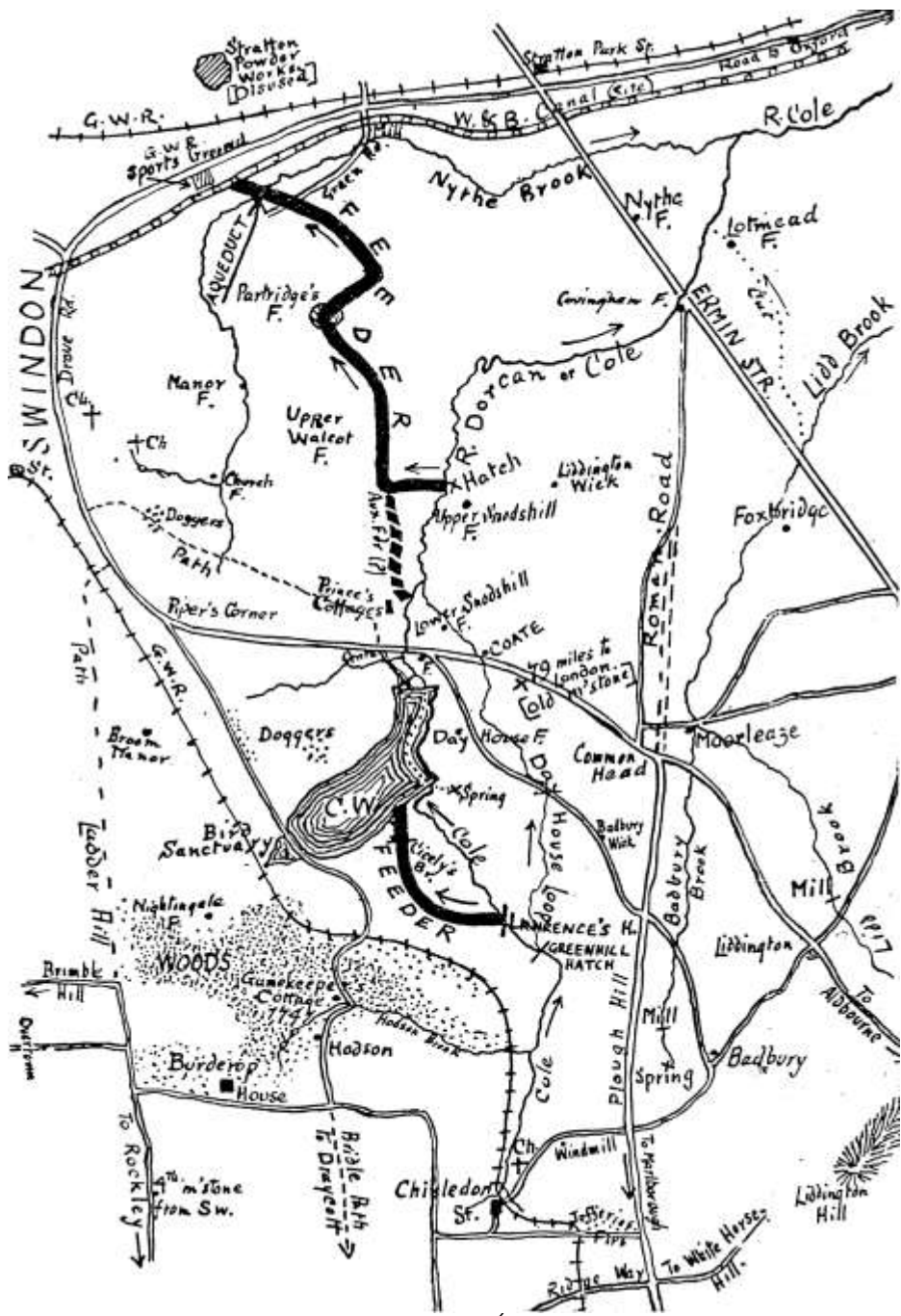
to-waste. By this lowering of the level, Coate Pond, or better, Jefferies' Pool, soon became a fetid swamp for half its area, and Swindon lost an important source of water supply in case of drought. It goes without saying that owing to the lip let into the dyke, the Reservoir can never fill again until the gap is sealed.

After many years of this, a movement for the restoration of Coate Water to its former status of beauty spot began in 1944; and 1948, *terminus ad quem* of the thrice repeated Government ultimatum on the subject, should see the completion of this indispensable work. According to official assurance, July 1944, "there is no insuperable obstacle, legal or engineering, to prevent the restoration of the original water level in Coate Reservoir, and in due course the Town Council will give full and sympathetic consideration to the carrying out of the requisite works to bring about this restoration."

In other words, we may soon see Swindon's charter of hope to the Longpond translated into fact. The whole Guild of Friends of Coate Water must watch and work to speed this fruition. How heartening to behold again the old Reservoir as Richard Jefferies saw it when he wrote: —

"It is a beautiful sheet of water, approaching a mile in length, and has so much the appearance of being natural that it is difficult even upon examination to consider it the work of man. The illusion is kept up by the numerous trees and the romantic scenery around."

November 1944



Future of Coate

1/8/44 Water

Sir, - I have received official assurance that there is no insuperable obstacle, legal or engineering, to prevent the restoration of the pre-1933 water level in Coate Reservoir, and that, in due course, the Town Council will give full and sympathetic consideration to the carrying out of the requisite works to bring about this restoration.

Without return to its original level nothing can render Coate Water even presentable. Here also lies the only satisfactory basis for artistic development, if that be deemed desirable, though personally I prefer wild nature minus her adornment by human agency. But this is secondary. The main point for which I have been striving has now been gained, a heartening vision of Coate's once beautiful lake return for the greater glory of pike and mallard, boats, visitors, swimming, diving, and even, ad majorem Dei gloriam, Coate, as it now promises to emerge from the hand of engineer and perhaps of landscape architect, should after the late lamentable interval of ruinous neglect, enter upon a new lease of joyous life, fulfilling that mission of spiritual healing whose secret beauty alone possesses.

Swindon's citizens, the whole of them, should now regard themselves as a greater Watch Committee with function to speed up and secure the realisation of these better days for Coate. In this connection it must not be overlooked that the Government (Eapworthy) ultimatum expires finally in 1948 - this being the third since 1933 - so that there is not too much time for planning adequately the future of Coate Water where municipal democracy is again to be on trial.

I take the present opportunity of offering my warmest thanks to all those who have given me encouragement. Out of so many there was but one voice to speak words of disapproval and those not severe. - Yours etc.

J. D. JONES