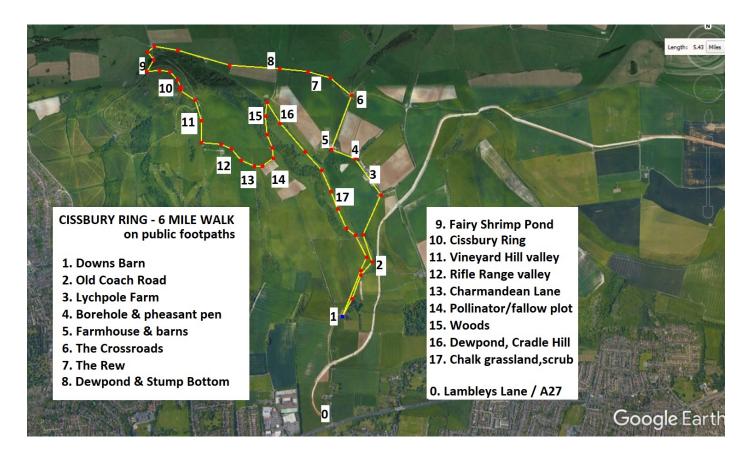
A SIX MILE WALK FROM SOMPTING DOWNS BARN TO CISSBURY



1) Downs Barn

Start here! The Downs Barn was originally called Coombe Barn, because it is in a coombe. Who knows what a coombe is? A sheltered hollow at the head of a dry valley. The barn was built here about 200 years ago as a threshing barnyard: pictures of how it used to be are on the wall inside. Sheaves of corn would have been gathered in to the main barn by wagon from the fields all round, and someone would have worked here keeping themselves warm through the winter knocking the grains of corn off their stalks by beating them with sticks called flails. The straw and chaff was thrown out into the farmyard where cattle would feed on it through the winter months. In the spring the mixed manure and straw would be spread on the fields to fertilise the next season's crops.

The track past here was the main road from Worthing to London used when the transport was horse and coaches – until the A24 was built through muddy Findon Valley in 1800. The barn at the top was called Stable Cross Barn: as the horses will have climbed a steep hill to get up there from Worthing, coaches may have stopped there to swap their horses for one that had had a rest and eaten.

2) The Old Coach Road farm track

In the hedgerow here, dormice were found nesting in a 2015 survey. They like eating blackberries as much as we do, so while we control the brambles so as to have more growing space for the special chalk grassland flowers on this slope, we leave some for the dormice and birds.

How did this slope form in the chalk downs, though? It was once the water-washed

side of a big lake that formed at the end of the ice age. The lake emptied out when it burst through the big chalk bank that went from the Mountain (aka Titch Hill) across to Mickey Mouse Town.

3) Lychpole Farm

This farm is called Lychpole or sometimes Leechpool, some people say that the name comes from a pool filled with leeches which were used for medicine. Others say that it comes from Saxon litch meaning corpse, and pole, so a gibbet pole may have been put up here on the downs where a highwayman was executed, to deter highway robbers.

4) Borehole and pheasant pen

This new borehole was built on Lychpole Farm in 2014, to provide local water for the farm animals on the downs – birds and badgers drink from the water troughs too. Rainwater goes down through cracks in the chalk to form underground reservoirs, then the borehole brings it back up again.

Southern Water also has a borehole here to pump out water for homes between Brighton and Worthing. It is important to keep this water clean.

In the area with trees behind the borehole, pheasant chicks are given protection from predators like foxes until they are old enough to let go, and then they live in the wild until a fox catches them after all, or, the farmers and their friends shoot some for their dinner.

5) Lychpole Farmhouse and Barns

The farmhouse and barns were built by the family that still owns them, in 1800. They used flints from the fields; oaks and elms from the surrounding downland copses and hedgerows; and lime mortar made by burning chalk in a field kiln. The chalk was taken out of the chalkpit across the field to the west, where a tawny owl roosts in the overhanging ivy. Clay tiles are of course made from the clay of the Weald, and the barns with slate roofs were all originally thatched using straw from the wheatfields. So these buildings, unlike the modern barns next to them, have almost grown naturally out of the landscape they sit on.

Barn owls nest in the biggest old barn that remains, which was built as a stable for four pairs of heavy working horses, and then when tractors replaced the horses it was converted to a dairy milking parlour for cows. A lady used to take the milk down to Sompting Village in a pram, to sell it. The old barn with tiled roof and steps up to it was the granary, where precious sacks of grain would be stored before being sold, or used to make bread. It was tiled to protect against fire. The farmyard also had hogstyes and poultry sheds, and a vegetable garden with a cellar for winter storage. Everything that was needed for life. A number of farmworkers lived in the farmhouse with the farmer, that's why the house is so big.

Look into the open-fronted cart shed and you will see a red & blue wagon which was made in Lewis in 1911, this is an original traditional Sussex Hay wagon – the others are also traditional but not from this part of the country.

If you buy Lamb or Beef from Waitrose or Marks & Spencer it may have come from Lychpole Farm. Downland creatures like brown hares, and ground-nesting birds like grey partridges, skylarks and corn buntings, peewits and stone curlews, benefit from the big

open grassland spaces which the sheep and cows maintain.

6) The crossroads

The ghost of Leechpool Manor is a highwayman who was hanged by the side of the old Downland coach-road, running between Lancing and Steyning. When he walked to the gallows he vowed that he would never sleep in his grave. He was lowered into his grave and the earth piled on top, but on the next morning his body had lifted the soil away and his head had sprung up like a dreadful jack-in-the-box. Several times was the body replaced, with the same result. He then haunted this Downland trackway. Tales were told by farmers who passed over the haunted road at nightfall; they declared that their wagons bumped over something in the road, and when they looked to see what it was there was nothing to be seen at all. A driver of a coach near the spot was held up by what he imagined to be a real highwayman, and, making up his mind to 'run the fellow down', he whipped up his horses to a full gallop, with the result that horses and coach passed clean through the intruder.

7) The Rew (an old Sussex name for a thin strip of woodland)

Look into the trees here along the old sunken track here – you might see a roosting long eared owl, but their camouflage is so good that it's almost impossible to spot them. This track is the old Findon-Lancing track. It was here in Roman times, and earlier. From long ago until the 20th century, sheep from all around were driven along this track to market at Cissbury or in the Findon Sheep Fair. In the bank on the north side of the track here, is a bank where a Roman cremation jar was found buried. When people died, they burned their body on a bonfire and put the ashes in a jar, and buried them in the bank just out of their village. This was so they could pay their respects easily when travelling in & out of their village going about their daily life. They could walk along this track to a Roman temple on Lancing Clump.

8) Site of the 4th-century Romano-British village (on north side of track)

In iron age bronze age and new stone age times there were little farmsteads and dwellings further up the hill. Here at the foot of the slope is where the remaining small settlement was in the 4th century. It was not that different to how we live today as they had glass in the windows of their rectangular houses; and tiles on the roofs and locks on the doors. This last little settlement of the Sompting Downs was burnt down, possibly by early Saxon invaders; after that almost nobody lived up here until Lychpole Farmhouse was built in 1800.

The dewpond here may have first been dug by the romano-british people living here over 1600 years ago.

If the romano-british people didn't fancy going to the temple on the Lancing Clump to the east, they could walk up this track to the north, crossing what are now the Monarchs Way and the South Downs Way, to the roman temple in the ring at Chanctonbury. Where, of course, they must not walk backwards three times round the ring at midnight, unless they carried a long spoon: people who did that would be met by Old Nick with a bowl of soup. In the field opposite the dewpond you might see the concrete cap on an old well:

that's not the Sompting Treacle Mine, it's the well an old threshing barn on the site used for water.

9) Cissbury Dry Dewpond

This is an old dew pond, once handy for sheep flocks being driven by their shepherds (and their sheepdogs) to and from the Findon market, before sheep could be transported by lorry. The pond was formed with clay and lined with a layer of flint to stop the clay drying out and cracking when water levels were low. It failed – so why has it not been restored, as the dewponds on Sompting Estate have been?

The answer is that ponds which dry out can be valuable in their own right. This one has fairy shrimp in it.

- Fairy shrimp are related to the brine shrimp which people call 'sea-monkeys'. They
 only survive in ponds that dry out. Their eggs can survive for years when dry, then
 hatch out when the pond gathers water in a long rainy period. But in a permanent
 pond, fish and amphibians would eat them. So, leaving this pond to dry out regularly
 means the shrimp continue to survive.
- Fairy shrimp are NOT related to the fairy folk, in old Sussex dialect called 'Pharisees', or pixies or pucks or pooks, who liked to dance on Cissbury Ring and other downland hilltops, leaving 'fairy rings' of white mushrooms. If somebody disturbed these creatures they might lead them a merry dance across the downs till they were thoroughly lost, and when they finally got home they were often confused and dazed: this was called being 'pixie-led' or 'pixillated'.

10) Cissbury Ring

Five or six thousand years ago, in the period when Stone Henge was built, people also first began to use this hilltop. This was the 'Neolithic period', which means the New Stone Age: people had learned to grow crops, so they no longer needed to continually rove around hunting and gathering food. They could settle in one place, farm animals and spin, weave and make pottery so life became more comfortable. One of the most important things in their lives was flint for making tools — knives, axes, hammers, scrapers, arrow-heads were all made by chipping flints into shapes. This is called 'knapping'. The best flints to chip, were ones dug up from under ground which had not previously been exposed to the air. The Neolithic people dug deep mine shafts into the top of the hill to extract flints, lived here shaping them into tools and exported them far and wide including across the channel to Europe. (There was no divisive nationalism separating little Britain from Europe in those days.)

Another thing that was traded was metals such as tin and copper. Three or four thousand years ago, in what's called the Bronze Age, the people who lived here began to smelt these together to make bronze, which were then sometimes used instead of flint for weapons, arrowheads and personal ornaments such as armlets, neck rings and finger rings. They also buried their dead by covering them with huge heaps of chalk, or earth and stones, called barrows; there were several of these on top of Cissbury Ring which when they were fresh chalk could have been seen from many miles away.

Then came the Iron Age, which lasted in Sussex from 2700 years ago until the Roman invasion in 43 AD. Iron made much stronger tools and weapons than bronze. The iron age people built the 'Ring' on top of the hill by raising up a huge chalk bank to enclose an area which, though it's known as a 'hill-fort', seems not to have been used in fighting but for tribal assemblies and trading. In the middle of the Iron Age hill fort at Chanctonbury Ring, which you can see from here, the Romans built a temple.

Fast forward to 1000 years ago and there was still trading and a mint for making coins at Cissbury. During the last century it did actually begin to look like a fort for fighting, as tank tracks were driven all around it for driving practice, Canadian troops practised their artillery here, and the Battle of Britain aircraft fought in the skies above, some falling to earth in this area.

11) Vineyard Hill valley

Here the Romans had vineyards nearly 2000 years ago. How was this steep headed valley formed? Once the Downs were mighty mountains. All we have left now are the southern foothills making the South Downs, and the northern foothills making the North Downs. The central heights in between, to the north of here, were all eroded away many millennia ago. In the warmer periods either side of the ice ages, streams of melting icewater flowed down from the higher hills and washed out these valleys which now stand high and dry. Global warming changing our climate is a terrible thing for the planet, but one more welcome effect of it is that vineyards are being planted in these downs again.

12) Rifle range valley

In this area during World war 1 new recruits to the army would practise shooting. Rifle bullets can go a very long way and fast. Shooting at targets set up in the head of the valley meant that if any bullets missed the target, they would just bury themselves safely in the soft chalk slope rather than flying on to injure someone, or ricocheting off a harder rock.

13) Charmandean Lane

This ancient track comes up from east Worthing, crossing the A27 just west of the Lyons Farm retail park.

14) Pollinator plot and Fallow plot

The government pays the farmers to sow plots with wildflowers to feed pollinating insects such as bees, and to leave fallow plots for ground-nesting birds such as skylarks, lapwings and partridges. Here you can see one of each.

Why does the government do this? Farmers are obviously paid by their customers, such as the supermarkets, to grow crops such as wheat, or animals to produce beef and lamb. But those customers compete to sell us the food cheaper than the other – food costs much less as a fraction of income than it ever did. Governments don't want to put a tax on food wants us to have cheap food, market doesn't want to pay farmers for the other things we all want to see in the countryside. We also need places where we can experience ourselves as part of nature. We need farmers to be paid to manage the land in ways which support wild creatures such as butterflies bees and birds. Without pollinating insects, our orchards would set no fruit.

15) Downland Woods

West of the River Arun, the South Downs have large areas of forest. East of the River Adur, the South Downs are mostly open, treeless countryside. Here in the middle ground between the two rivers, it's a beautiful mixture, something of everything. The commonest native tree here is the Ash, which has many uses from firewood to furniture to walking sticks. It's perfect for firewood because it will burn green where many other English trees will only burn when seasoned, which means when they have dried out after cutting. Ash trees used to be widely coppiced: when they are cut down, lots of young shoots sprout up from the base and grow into good straight poles that are easy to cut. When they are coppiced, more light comes in to the forest floor and more wild flowers grow.

Sadly a new disease is gradually killing a lot of the ash trees, but experts think that about 5% (one in 20) of ash trees will have natural resistance and so the ash forest should eventually recover. In the meantime, woods like this on steep slopes that are difficult to access for harvesting timber commercially, will have much more wildlife because more light will come in to the woodland floor.

16) Dewpond on Cradle Hill

Because water sinks down quickly into the soft chalk, all the downs makes an underground reservoir from which Southern Water boreholes pump water to taps as far away as Worthing and Brighton. But for the same reason, there are no natural ponds or streams for wildlife to drink from up here on the downs. For centuries, people have made dew ponds on the downs for grazing sheep. They are lined with waterproof clay so that when it rains they fill with water and keep it on the surface, so animals miles from water can drink. As well as sheep, these ponds are visited by foxes, badgers, birds, breeding newts frogs and toads, dragonflies, water beetles and more. This pond would have been used by flocks of sheep going up around the north end of Cissbury Hill to be sold at the Findon Sheep Fair.

17) Chalk grassland and scrub on Lychpole Side Hill

Lychpole Side Hill is an open access area. This means you can come here any time, and wander up the slopes. It is also a Site of Special Scientific Interest, for its chalk grassland flowers and the bushy scrub which is important bird nesting habitat.

It is also farmland, producing beef and lamb. The animals are taken off the land in the early summer so that the special flowers can bloom and set seed.

When the cattle are here, very unusually you can watch their natural herd behaviour as the family of bull, cows and calves roam around happily together. They are safe company for walkers as long as they are treated with respect.

A big safety rule is, never get between a cow and its calf. The mother will do anything to protect its child. Probably also a good idea to not get between a bull and its cow!

Another big safety rule is, never approach cattle with a dog, because they are programmed by evolutionary history to see a dog as a threat, as if it was a wolf. If they do chase your dog, let it off the lead so it can run away, otherwise a cow weighing several tons could run down and trample over both the dog and you.

What's the special scientific interest of the chalk grassland? Here you can find over a hundred different species of pretty, tiny, jewel-like flowering plants, which host pretty, tiny, jewel-like butterflies such as the chalkhill blue. To survive, they need to be on thin soil over chalk: if they were on fertile deep soil, bigger beefier plants would overwhelm them and they would die out. Even on thin soil, this would happen if the bigger plants were not grazed down by sheep and cattle. So if the farmer was not able to sell pasture-fed lamb and beef, as farmers have done from these hills for thousands of years, then these flowers and butterflies would eventually go extinct.

What's special about the scrub? When there was more scrub here and less trees, fifty to a hundred years ago, you could hear nightingales singing here. They nest low down in bushy scrub. In the past, wood was cut regularly from these slopes so there were very few tall trees, and even the scrub was cut for burning on the fields below to fertilise them with the ash. After World War Two, the national priority was to produce grain, and this farm did not have enough animals left to graze the land as it had traditionally been done. So the scrub spread its seedlings across most of this field, and the chalk grassland flowers were shaded out, but their seeds were still alive in the soil. From the 1980s onwards the Sompting Estate cleared back the edges of the scrub and restored the grazing; this was in time to rescue the chalk grassland flowers, which have recovered well. But, meanwhile, a lot of tall trees, mostly ash, had grown up amongst the older scrub and shaded out the scrub, so there was no longer enough for the nightingales. So the next phase of work by Sompting Estate has been to thin out the trees, allowing more light down to the forest floor, so that scrub and woodland flowers can recover. Come back next June, and see if you can hear a nightingale. The males fly in across the channel from Africa, find themselves a territory, and start singing. Then the females fly over and if they like a male's song, they will come down and nest with him.

