

LANDSCAPE TYPE 12: OPEN CLAY VALE



TYPE 12: OPEN CLAY VALES

DESCRIPTION

Location and boundaries

The *Open Clay Vales* Landscape Type contains the open lowland centred on the floodplains of the Rivers Thames and Avon. Area 12A: *Thames Open Clay Vale* is situated at the far north of the county and area 12B: *Avon Open Clay Vale* runs through the north western section of the county. Boundaries are defined by topography and usually follow a physical feature, often a road that runs along the first contour above winter flooding level.

Key characteristics

- Level land form with wide open skies and views to ridges and downs.
- Pastoral land use with some arable.
- Large scale geometric fields with hedgerows or open drainage channels defining boundaries.
- Presence of rivers, tributaries, drainage channels and open water bodies.
- Watercourses lined with riparian vegetation with prominent lines of willows (some pollarded).
- Floristically rich hay meadows.
- Settlement pattern varies from large towns and small scattered villages to sparse farmsteads.
- Buildings in varied materials of brick, render and stone.
- Crossed by major transport corridors, and a network of minor roads linking settlements.
- Historic use for transport evident in canals.

Physical influences

The *Open Clay Vales* have a varied geology with Alluvium and River Terrace Gravels around the watercourses to Oxford and Kellaway Clays in the slightly higher marginal areas and tracts of Sand throughout the vales. Soils vary from loam over gravel to seasonally wet deep clay and land use reflects this in a concentration of arable in the free draining soil over sand and gravel and of pasture on the wet Alluvium and Clay. During the 20th century there was extensive quarrying of Sand, Gravel and some Clay (deriving from the Jurassic Limestone of the Cotswolds Hills) in area 12A: *Thames Open Clay Vale*. These pits flooded and the lime rich waters have formed the Marl lakes of the Cotswold Water Park.

Landform is level or very gently shelving with area *12A: Thames Open Clay Vale* ranging from 70m to 100m AOD and *12B: Avon Open Clay Vale* ranging from 30m to 70m AOD.

Biodiversity

The *Open Clay Vale* landscape type is predominantly intensively farmed pasture and arable however there are some unimproved hay that are nationally significant for their diversity of grassland plants. These include Clattinger Farm SAC, the only lowland farm in Britain known to have received no agricultural chemicals, plus Pike Corner SSSI, Sutton Lane Meadows SSSI, Upper Waterhay Meadow SSSI, Haydon Meadow SSSI, Acres Farm Meadow SSSI and North Meadow SAC, Cricklade SSSI.

Another site of ecological importance is the Cotswold Water Park SSSI, located in area *12A*. Here quarrying has created over a hundred lakes with nationally scarce marl waters caused by the lime rich geology. The series of lakes that form the SSSI include a range of the varied plant communities including open water (including those associated with marl waters), reed beds and surrounding grassland habitats. The area supports a wide range notable species including wintering and breeding birds such as pochard and gadwall, as well as water vole, otter, bittern, freshwater white clawed crayfish, and the lesser bearded stonewort *Chara curta* all of which are targets of the Cotswold Water Park BAP.

County Wildlife Sites include: Swillbrook Lakes Reserve, former gravel pits within the Cotswold Water Park which are rich in bird and dragonfly diversity, including reed warbler, nightingale, hobby and four-spotted chaser and downy emerald dragonflies; and Grove Farm Meadows, high quality unimproved neutral grassland which is mostly cut for hay. Species indicative of old hay meadows present here include betony and pignut.

Historic environment

Although the lowlands do not have the outstanding archaeological sites of the nearby Chalk uplands there is evidence of continuity of settlement on the gravel spreads of the vales from the Iron Age through the Saxon and Roman periods and beyond. Place names of the Saxon period indicate that much of the land had been cleared. Development during the Romano-British period included the major communication route of the Ermine Way built on a raised embankment above the floodplain of the Thames. Other major roads followed, along with canals (the Kennet and Avon Canal is still a prominent feature) and railways. The surviving pattern of scattered nucleated villages is largely medieval.

In the post-medieval period the process and sale of woollen cloth became concentrated along the Avon Valley leading to the growth of towns along the river. These continued to expand in the 20th century and modern developments at the edges of Chippenham, Melksham and Trowbridge making the southern section of area *12B: Avon Open Clay Vale* more settled and urbanised in character.

The long history of water meadows in the *Open Clay Vale* landscape type is shown by the inclusion of grazed meadows at Cricklade in the Domesday Book. Ancient field systems are evident as crop marks on gravel areas. Ridge and furrow is evident for instance at Haydon Meadow SSSI where it has been protected from damage by ploughing. Field patterns vary with the topography and geology with small scale irregular water meadows and pasture on alluvial areas and large regular arable fields on free draining gravels.

Settlement and built character

Throughout the type are small, nucleated villages and 19th century isolated farmsteads, usually sited on slightly elevated gravels to avoid flooding. Area 12A: *Thames Open Clay Vale* is sparsely settled while 12B: *Avon Open Clay Vale* is more settled to the south with the large towns of Chippenham, Melksham and Trowbridge. The widespread use of brick and tile reflects the use of local clay, but there is also render and Oolitic Limestone, a mixture of the latter and the local brick characterising the historic centres of settlements. The expansion of the towns in area 12B during the 20th century has led to large scale developments which are prominent in the level vale landscape. This is combined with major trunk roads throughout the area.

CHARACTER AREAS

12A: Thames Open Clay Vale

Area 12A: *Thames Open Clay Vale* is a low lying area centred on the River Thames and its floodplain. It is a largely tranquil, rural landscape, predominantly level, with vertical elements of lines of willow and other wetland trees. The agricultural use of the area combines arable and wet pasture, with open water ditches as well as hedgerows defining boundaries. Field patterns vary from small and irregular to larger, geometric fields often in arable use on dryer or drained gravel areas. A major feature of the area is the large extent of open water resulting from gravel extraction and afterwards put to leisure use as the Cotswold Water Park. The many water bodies with their varied vegetation are of national significance as scarce marl waters (Cotswold Water Park SSSI). There are also a number of hay meadows of high ecological interest. The presence of water is felt throughout this area in the rivers, tributaries, drainage ditches with frequent lines of willows and other wetland vegetation. Settlement is sparse in the *Thames Open Clay Vale* with a few small settlements such as the village of Ashton Keynes and the town of Cricklade, but mainly scattered isolated farmsteads. Vernacular building materials are brick and stone. Although the Roman Ermine Way, now the busy trunk road of the A419, runs through the area, most of the roads are minor rural routes with small bridges crossing the waterways and ditches.

12B: Avon Open Clay Vale

Area 12B: *Avon Open Clay Vale* is an extended area following the course of the River Avon from Great Somerford in the north to Bradford on Avon in the south. As well as the Avon the area is characterised by the presence of other rivers, tributary streams, lakes, and, to the south, the Kennet and Avon Canal. The *Avon Open Clay Vale* is a level, open area with views to the higher ground of the *Limestone Ridge* to the east. Land is predominantly intensively managed permanent pasture with some arable and small isolated pockets of meadow (such as Sutton Lane Meadow SSSI). Hedgerows, gappy or low flailed in places, enclose fields of varying size. There are sparse hedgerow trees plus willows lines (some pollarded) marking the waterways and poplar shelter belts. Sections of the area remain rural and tranquil despite major routes travelling through (the M4, A350, A342) plus railway lines in cuttings and embankments and the visual influence of modern large scale development on the edges of Chippenham, Trowbridge and Melksham. This urbanising influence is particularly prevalent to the south of the area while the northern section is more akin to area 12A with scattered settlement of small brick and stone built villages and farmsteads.

EVALUATION

Positive landscape features of significance

- Wide open skies and views to ridges and downs.
- Rich variety of rivers, tributaries, drainage channels and open water bodies, including scarce marl water habitats.
- Watercourses lined with riparian vegetation with prominent lines of willows (some pollarded).
- Hay meadows with unimproved grassland of ecological interest.
- Villages and farmsteads with vernacular mix of local stone and brick.
- Visible archaeology in Roman roads, pattern of medieval villages, long established grazing meadows, and the Kennet and Avon Canal corridor.

Forces for change

- Agricultural intensification threatens the remaining small scale field patterns and traditional pastoral landscape.
- Loss of hedgerows boundaries and particularly mature hedgerow trees, plus poor management of remaining hedgerows.
- Elm loss of the 1970s.
- Intensification in farming leading to drainage and improvement of permanent pasture and water meadows on the floodplain and loss of riparian vegetation.
- Pressure for further expansion of settlement and new development threatening the character of the small villages and scattered farmsteads.
- The presence of major transport corridors particularly the trunk roads has brought pressures for development and associated amenity planting and signage.
- Increasing road use which will further diminish the rural tranquillity of the vale landscape.
- Pressure to upgrade roads through additional kerbing and signage to accommodate an increase in traffic volume.

Condition

The *Open Clay Vales* are an intensively managed type with large areas under arable cultivation. Although there are limited areas still managed as unimproved grassland most of the meadows, a substantial part of the hedgerow network and riparian vegetation has been lost. The condition of the *Open Clay Vales* is judged as **moderate**.

Strength of character

There are still some highly rural, tranquil areas within the *Open Clay Vales* which are dominated by the varied waterways with their lush vegetation, with small scattered villages and farmsteads of vernacular materials. However elsewhere in the type the influence of the busy transport corridors and the large urban areas is pervasive making the type as a whole **moderate** in strength of character.

Inherent landscape sensitivities

- Rural tranquillity.
- Hedgerow pattern.
- Water bodies and water ways of varied character and ecological value.
- Streamside willows and other riparian vegetation.
- Remnant hay meadows.
- Wide open views.
- Settlement pattern of nucleated villages with variety of vernacular building materials.

STRATEGY

The strategy for the *Open Clay Vales* Landscape Type is to **conserve** the elements that contribute to the rural, tranquil landscape; the rivers, streams and open water, the meadows and riverside tree lines, the brick and stone villages and farmsteads and to **improve** elements in decline such as the hedgerows and hedgerow trees, and the visual influence of the large settlement edges and major transport corridors.

Broad management objectives

- Retain and manage the hedgerow network and nurture new hedgerow trees.
- Promote appropriate management of arable land including retaining areas of fallow land and maintaining an unploughed margin around fields to encourage wildlife, particularly farmland birds.
- Retain and manage hay meadows.
- Introduce new tree planting along watercourses using typical riparian species such as alder and willow.
- Take opportunities to extend and enhance the varied wetland habitats (reedbeds, wet grassland and wet woodland) of the Cotswold Water Park through appropriate restoration of mineral workings.
- Minimise small scale incremental change such as signage, fencing or improvements to the road network which could change the rural peaceful character of the landscape.

- Consider developing guidance for built development to ensure both future construction and changes to existing buildings are designed to integrate with the existing character and structure of settlements.
- Consider screening views to intrusive urban edges through planting new woodland.

THE LANDSCAPE CHARACTER CONTEXT

The character of the Wiltshire landscape has already been investigated in a number of studies as detailed in Appendices 1 and 2. The *Open Clay Vales* Landscape Type is covered in the Swindon Landscape Character Assessment and the North Wiltshire District Landscape Character Assessment.

Area 12A: Thames Open Clay Vale is partially within *Area 2D: Thames Vale*, within the *Clay Vales* type of the Swindon assessment and also includes areas of the North Wiltshire types *Alluvium River Terrace Farmland (Area 1: Thames Valley Floor)* and *Lowland Clay Farmland (Area 2: Thames Valley Lowland)*.

Area 12B: Avon Open Clay Vale is, apart from its southern end which is outside the district, largely contiguous with the North Wiltshire character area *Avon Valley Lowland* of the *Lowland River Farmland* type.