Landscape Sub-Types	1a Intertidal Flats 1b Coastal Marsh
	10 Coastal Marsh

#### **Key Characteristics** Sensitivity **Landscape Character:** Scale and Enclosure Moderate (3) Within estuaries medium to large scale suggests scope for group Large scale landscape of wide beaches and mudflats along exposed outer coastline and around estuaries mouths. Flat sized development. However may appear incongruous against landform provides distant horizons, panoramic views and big small scale intricacies and inner estuaries are highly sensitive due skies. Enclosure behind beaches by low cliffs, sand dunes, raised to their intimate scale and narrowed zones of visibility. Expansive beaches. Scale reducing in the sheltered inner estuaries and scale and exposure of broader outer estuaries suggests scope for marshes (1b) with protecting enclosure of land and fells. Estuarine a larger development evoking a rational, functional image. vistas featuring Lakeland or Scottish peaks. Enclosure behind marshes (1b) by sea dykes, railway embankments, gorse scrub and hedges. Small details such as the winding creeks reduce the sense of scale overall. **Complexity and Order** High (5) Unique attraction of this landscape centres on its dynamic nature Vertical turbine structures would provide a strong contrast with the with shifting patterns of texture, colour and play of light. simple flatness of this landscape. However its intrinsic character Shimmering water gives way to golden sands or shining silt. Wide lies largely in the fascinating and dynamic patterns either reflected beaches are strewn with patches of boulders (scaurs) and have or etched across its surface. Turbine development likely to relate upper foreshores of shingle. Estuarine mudflats are etched by a poorly to irregular and intricate detail of these natural patterns. maze of minor channels. Salt marshes (1b) comprise closely Turbine development out in the broader estuary mouths may grazed turf with an intricate pattern of creeks, gorse scrub and avoid such difficulties and create a simple focal point. remnant hedges on higher marshes. Prolific birdlife is integral to character offering feeding and roosting ground for waders (1a) and wildfowl (1b). Manmade Influence High (5) Essentially natural landscapes spoilt only by minor or distant The semi-natural land cover and associated birdlife creates a eyesores. Marine litter and old industrial waste can spread along strong sense of 'wildness', which may be perceived as being the beaches. A few isolated large structures are visible around compromised by turbine development. There are few margins including power stations, terminals, sea rigs, and opportunities to relate to existing man-made features and forms. transmission masts. Fishing on the mudflats for cockles etc and However a distant and isolated turbine grouping could form a grazing marshes by sheep and cattle. Historical drove routes of point of focus comparable to other large structures around the 'waths' across inner estuaries but very few modern road and rail margins of this landscape. crossings. **Skyline** Moderate/High (4) Coastal skyline uninterrupted and smooth –giving way to wide Isolated turbine grouping could form a point of focus and clear open skies with only a few distant isolated large structures around contrast with simple and subdued coastal skylines. However likely the margins. Inner southern estuaries dramatically enclosed by to mar or compete with skylines defined by picturesque fells or Lakeland fells and limestone escarpments. distinctive limestone escarpments. **Connections and Adjacent Landscapes** Estuaries stretch well inland and strongly interact with other Picturesque compositions and vistas vulnerable to turbine landscapes to form picturesque compositions. Southern estuaries development. Open prospects from neighbouring fells and dunes have strong links with neighbouring high ground including coastal also sensitive. limestone (3), the Lakeland fells and their foothills (11a) and moorland extensions (9d). These create significant backdrops to Type 1 as well as prospects of it. Slight elevation of neighbouring dunes (2a) also provides extensive vantage over this landscape. Remoteness and Tranquillity High (5) Essentially remote with disturbance limited to tourism and Noise and movement of turbines likely to compromise sense of recreation pressures around the edges. Writers emphasise the peace, isolation and remoteness.

Essentially remote with disturbance limited to tourism and recreation pressures around the edges. Writers emphasise the stillness and tranquillity of the estuaries as an essential quality. Sense of remoteness attributable to absence of manmade features and open majestic scale makes viewer feel small and vulnerable and evokes a sense of freedom. Wild peaceful character of marshes reinforced by birdlife and grazing stock.

#### Visual:

# **Visual Interruption**

Exposed landscape with no interrupting features. Landward edge of the marshes generally defined by dykes, beaches and estuary mouths by sand dunes, low cliffs or raised beaches.

## High (5)

Turbine development likely to be widely visible. Potential for visual confusion around low enclosure features due to partial visibility.

#### Settlement and Key Views

Notably absent although development of coastal towns, villages and camp sites around the fringes has responded to vistas across the estuaries. Hadrian's Wall Trail, Cumbria Coastal Way and Cycle Way also offer extensive vantage over this landscape.

#### Moderate (3)

Localised potential for over dominance and intrusion.

# Overall Sensitivity Moderate/High

Value	
Landscape Designations and Planning Policies	Scale it Matters and Why
Frontiers of the Roman Empire: Hadrian's Wall World Heritage Site and Setting 1b and fringes of 1a in inner Solway Estuary (setting)	International: Protection of core archaeological features of the Roman wall and coastal defences as well as their landscape setting or buffer zone
Solway Coast AONB Majority of 1b in Solway Estuary	National: Conservation and enhancement of natural beauty attributable to: wild and remote qualities due to absence of large scale industrialisation, main roads and railways; rich presence of birdlife and expansive area of saltmarshes; distinctive contrasting sequence of coastal margins/ farmland and mossland; open and attractive views to Scottish coast and Lakeland fells; small distinctive villages.
Arnside and Silverdale AONB Part of 1a and 1b at head of Kent Estuary in Morecambe Bay	National: Conservation and enhancement of natural beauty attributable to its: scenic qualities including the distinctiveness of its Carboniferous limestone; mosaic of contrasting landscape types; dramatic views over Morecambe Bay; wildlife resources; cultural, archaeological and historic heritage; intimate scale and tranquillity.
Landscape of County Importance Remainder of 1a and 1b beyond AONBs apart from sections of 1a along outer West Cumbrian coast	County: Protection of distinctive character attributable to: dramatic unobstructed views; fascinating patterns across sands or water and channels etched in marshes; absence of detractors; unique and sublime compositions with adjacent fells and simplicity creating a strong positive response.
Rarity	Area of County
1a Intertidal Flats 1b Coastal Marsh	7.5%: common 1.0%: rare
Conservation Interests and Associations	Description
Geology and Geomorphology Dynamic processes of coastal erosion and deposition Small RIGGS near St Bees	Mudflats have greatly increased over centuries following progressive siltation. Sediments derive mainly from Irish Sea. River channels are constantly shifting and thereby affecting extent of salt marshes. Long shore drift operates on open coast. Features of marsh include dendritic creeks and erosion cliffs on seaward edge, terraces related to isostatic uplift and creek migrations and isolated water known as pans or floshes.
Extensive habitats and internationally important for bird life  Extensive designation of 1a and 1b in main estuaries as SPA's, SACs and SSSIs No designations on beaches of outer coastline except SAC/SSSI at Drigg	Mudflats of Cumbria some of most important habitats in UK supporting huge numbers of invertebrates such as cockles and providing main feeding grounds for internationally important numbers of wintering and passage waders and wildfowl eg shelduck, dunlin and redshank. Boulder scaurs support mussel beds providing feeding grounds for eider duck, turnstone etc. Marshes also of international importance as feeding grounds for wildfowl and roosts for waders eg pink-footed geese, Bewick swans, curlew and golden plover. Peregrine falcon and merlin hunt over marshes in winter. Other birds breed there eg redshank. Marshes also support uncommon and rare invertebrates and natterjack toads and great-crested newts.
Historic Environment Some localised interest	Number of wrecks in Morecambe Bay. Throughout evidence of historical rights of way or waths, various cultural artefacts relating to shipping and trade. Good survival of organic artefacts eg prehistoric forests; fish traps due to waterlogged conditions. On marshes remains include settlements lost to sea, former quays and salt pans.
<b>Cultural</b> Scenic qualities and historic routes have inspired poets, painters and writers. Solway associated with historical characters and events.	Routes across estuaries described by numerous writers eg Elizabeth Gaskell in "Sextons Hero". Estuaries also well documented through work of artists and poets eg Wordsworth, JNW Turner, David Cox, Norman Nicholson, Paul Nash and Thomas Sutherland. Invasion of Scotland via Solway anticipated by Edward 1 <sup>st</sup> in 1307 and Mary Queen of Scots fled rebellion in Scotland by boat down Solway Firth in 1568.

### LANDSCAPE TYPE 1: ESTUARY AND MARSH

# **Capacity Statement**

Overall the Estuary and Marsh landscape is judged to have **low** capacity to accommodate turbine development. Potential is limited by the high sensitivity of many of its inherent and unique characteristics, moderate/high to high landscape value recognised by LoCl and AONB designations\*, and strong ecological interest and cultural associations.

Any type of turbine development would have the potential to impinge on the natural character and strong sense of remoteness, tranquillity and wildness for which this landscape is valued. Its flat openness affords panoramic views which would be compromised, particularly where the estuaries combine with neighbouring dunes, mossland, farmed coastal plain and fells to create unique and picturesque estuarine compositions. Turbine development would also detract from the dynamic spectacle of shifting patterns of texture colour and play of light across sea, sand, marsh and sky.

There appears to be limited potential in the broad estuary mouths for isolated turbine development to create a focal point, comparable to other isolated structures around the margins of this landscape and in simple contrast with flat or subdued coastal skylines. The expansive scale and exposure here suggests that development up to wind farm size might be accommodated and benefit from a strong sense of purpose and rationality in such a location. However existing permissions for nearby off-shore developments suggests these areas are at or near capacity.

Particular sensitivities in relation to the setting of international and national designations include:

- contribution of open sea, foreshore and salt-marshes to a sense of wildness, the sequence of contrasting landscapes and uninterrupted views across to Scotland in the Solway Coast AONB
- open sequential views from recreation and tourist routes along the coastal edge of the Solway Coast AONB and Frontiers of the Roman Empire: Hadrian's Wallacross the Solway Firth to Scottish mountains and across the coastal plain towards the Lakeland fells most notably from Cumbria Coastal Way, the B5300, National Cycle Route 72, Hadrian's Wall Trail and from viewpoints at coastal forts associated with the Wall
- contribution to tranquil and picturesque compositions with fells in the Lake District NP and limestone hills of the Arnside and Silverdale AONB around the southern estuaries
- key views to and from the Furness Fells within the Lake District NP most notably sequential views from the trunk road and tourist route skirting the edge of the Park, Cumbria Way and National Cycle Route 72

<sup>\*</sup> For those areas that fall within the Solway Coast or Arnside and Silverdale Area of Outstanding Natural Beauty Policy R45 in the Cumbria and Lake District Joint Structure Plan 2001 – 2016 applies

# **LANDSCAPE TYPE 2: COASTAL MARGINS**

**Overall Sensitivity** 

Landscape Sub-Types	2a Dunes and Beaches 2c Coastal Plain 2b Coastal Mosses	
Key Characteristics	Sensitivity	
Landscape Character:		
Scale and Enclosure Variable largely flat open large scale landscapes with big skies, long views and large rectangular fields where vertical features stand out. Hummocky dunes (2a) offer shelter and small scale interest. On glacial till farmland/mosses (2b/2c) can be undulating, more enclosed and intimate with smaller irregular fields. Some localised enclosure and scale indicators include dunes, sea dykes, rail embankments, plantations, moss woodland, gorse and willow scrub, hedges and copses (increasingly scarce and wind shaped towards coast).	Moderate (3) Large group would not intimidate broader scale of flat open farmland, whilst in more contained undulating terrain a small group would be more appropriate. In close range large turbines may appear incongruous against small scale landforms and land cover features of dunes, mosses and more marginal undulating areas. Exposed coastal margins of Solway Plain and Walney fringes evoke a strong design rationale.	
Complexity and Order Soft organic forms and textured detail of dunes and beaches (2a) contrasts with simple flatness and rectilinear patterns of coastal plain (2c). Large square fields of improved pasture with some arable cropping are divided by hedges or fences and bordered by ditches and straight roads. Blocks of conifers common at head of estuaries. Varies to more irregular patterns and richer variety of textures and colours in undulating areas and mosses (2b) with mosaics of heath, willow/birch scrub and rough pasture with rushes/ gorse and into smaller narrow fields	Moderate (3) Opportunities for ordered grouping of turbines to mirror geometric regular field patterns and form a simple contrast with the horizontal plane. Sensitivity increases where landscape varies to more irregular forms and complex mosaics with natural vegetation.	
Manmade Influence Mix of farmland and semi-natural areas with isolated farmsteads and small villages. Strong local vernacular of cobblestone or clay built buildings, walls and banks. Heritage of Roman wall and forts and dismantled railways. Occasional modern structures include hard sea defences, drainage channels, pylons, masts, industrial buildings and hangars near urban fringe, farm sheds and silos. Tourism development on outer coast eg caravan parks, golf courses. Land management eg intensive farming, forestry and large scale peat cutting.	Moderate/High (4) Limited scope to relate to similar man-made structures. Some potential to relate to 'working' character of intensively farmed areas with engineered aspects and integration with larger scale geometric manmade land cover patterns. However likely to appear incongruous against heritage and vernacular features.	
Skyline Landform generally has horizontal emphasis producing open views, strong coastal horizons and big skies. Smooth towards coast rougher inland with woodland cover and backdrops of higher ground. Attractive Distinctive backdrop of fells to inner margins of southern estuaries. Occasionally villages, farmsteads, copses or masts stand out as prominent features.	Moderate (3) Opportunity for isolated turbine grouping to form a predictable and simple contrast with horizontal plane. However there are issues related to maintenance of clear simple horizons and conflict with more complex skylines around southern estuaries.	
Connections and Adjacent Landscapes Quite complex due to configuration. Margins of southern estuaries benefit from picturesque backdrop of Lakeland fells, limestone escarpments, foothills and moorland (3, 11a, 9d). Contrast with Solway plain intertwined with low farmland ridges (5a) which interrupt views but also offer occasional prospects. Dunes (2a) offer prospects of estuaries (1) and coastal plain (2c). Elsewhere coastal plain tends to bleed into coastal urban fringe (2d).	Moderate/High (4) Contribution to picturesque compositions, fine vistas and setting of LDNP around southern estuaries and sequence of Solway AONB landscapes both vulnerable. Open prospects from neighbouring higher ground of ridges fells and dunes also sensitive. However visual interruption created by neighbouring ridges around Solway coastal plain may assist turbine development depending on height.	
Remoteness and Tranquillity Dunes and beaches (2a) enjoy a sense of peace and remoteness apart from fringes disturbed by tourism. The mosses and coastal plain (2b and 2c) are generally peaceful backwaters relatively untouched by modern development.	Moderate/High (4) Noise and movement of turbines could detract from peaceful backwater characteristics.	
Visual:		
Visual Interruption Largely open, flat or undulating farmland or mosses. Some containment features increasing inland including tall windbreak hedges, engineered railway and flood defence embankments, buildings, scrub woodland and plantations.	Moderate/High (4) Turbine development on exposed outer margins with greatest wind resource likely to stand out. Some localised screening but also potential for visual confusion around low enclosure features due to partial visibility.	
Settlement and Key Views Dispersed pattern of small villages and isolated farmsteads connected by network of minor roads across 2c and outer Solway part of 2a. Tend to be nucleated in form although becoming more linear due to recent ribbon development especially along coast. Tightly knit with stone walls for shelter on outer coasts. Can occupy higher ground: tops of hills; raised beaches and sites along Frontiers of the Roman Empire: Hadrian's Wall or lower lying around fringes of the mosses. Caravan sites and tourist routes around outer coast. Hadrian's Wall Trail, Cumbria Coastal Way and Cycle Way, NCR 72 and B5300 also offer extensive vantage.	High (5) Limited scope to site development away from settled areas or tourism facilities. Size of development constrained by small scale nature of existing settlements with potential for over dominance.	

Moderate/High

# **LANDSCAPE TYPE 2: COASTAL MARGINS**

Value		
Landscape Designations and Planning Policies	Scale it Matters and Why	
Frontiers of the Roman Empire: Hadrian's Wall World Heritage Site and Setting Around inner Solway fringes of 2c (site and setting) and along outer Solway 2b and fringes of 2c (setting)	International: Protection of core archaeological features of the Roman wall and coastal defences as well as their landscape setting	
Solway Coast AONB Dunes (2a) and seaward edges of Solway Plain (2c and 2b)	National: Conservation and enhancement of natural beauty attributable to: wild and remote qualities due to absence of large scale industrialisation, main roads and railways; rich presence of birdlife and expansive area of saltmarshes; distinctive contrasting sequence of coastal margins/ farmland and mossland; open and attractive views to Scottish coast and Lakeland fells; small distinctive villages.	
Landscape of County Importance Most of 2a and b. 2c on Walney Island and around Duddon and Leven Estuaries (Solway and South Lakeland parts excluded)	County: Protection of distinctive character attributable to unusual landforms of dunes and plain with rocky outcrops; rich variety of natural textures and colours; absence of detractors; impressive views with backdrop of Lakeland fells; vernacular features eg cobble banks, early field enclosure patterns and quietness creating a strong positive response.	
Registered Historic Parks and Gardens Holker Hall	National: Protection of special historic interest of parks and gardens and their settings	
Ancient Woodland Generally absent some blocks around Leven Estuary	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes	
Rarity	Area of County	
2a Dunes and Beaches 2b Coastal Mosses 2c Coastal Plain	0.2%: rare 0.9%: rare 3.8%: ordinary	
Conservation Interests and Associations	Description	
Historic Environment Diverse interest with concentration along internationally important Hadrian's Wall, on the mosses and in villages.  Conservation Areas: Several villages across Solway coastal plain (2c) and Biggar on Walney Island	Volatile environment in dunes (2a) remodelled by wave and wind action, erodes have revealed evidence of prehistoric settlement. Mosses (2b) contain evidence of reclamation associated with abbeys, evidence of peat rooms in long narrow enclosures, traditional field patterns of small irregular enclosure and later larg more regular enclosure. Also important for 20 <sup>th</sup> century military sit Highly nucleated settlement pattern on coastal plain (2c) with evidence of late enclosure outfields.17 <sup>th</sup> and 18 <sup>th</sup> century vernacu buildings of local red sandstone in north and clay buildings on Solway Plain. Most significant archaeological feature is Frontiers the Roman Empire: Hadrian's Wall and associated forts. Some villages occupy sites of former forts eg Burgh-by-Sands.	
Dunes and mosses important habitats extensively designated for international or national importance, localised interest across coastal plain  Most of 2a dunes designated as SSSIs sometimes as SACs and around Walney Island as SPAs. Extensive designation of 2b mosses around Solway as SACs, SSSIs and NNRs, but around Duddon only partial coverage. 2c mostly undesignated occasional small sites including outlying mosses, moss and saltmarsh fringes and LPOs on east side of Leven Estuary.	Dunes and slacks (2a) support natterjack toads, plus breeding colonies of great crested –newts eider duck, terns and gulls. Also important for rare plants eg coralroot orchid. Wetter areas of lowland raised bogs or mires that dominate mosses (2b) support sphagnum moss and cotton grass whist drier areas support heather, birch and Scots Pine and drained margins can support large areas of rush and purple moor grass pasture. Wildlife interest on mosses includes rare butterflies, lizards, dragonflies, reed bunting, skylark and redshank. Most of coastal plain (2c) agriculturally improved with interest confined to wooded remnant mires important for red squirrel, wintering wildfowl and farmland birds eg corn bunting in fields and otter, Atlantic salmon and sand martins along rivers.	

### LANDSCAPE TYPE 2: COASTAL MARGINS

# **Capacity Statement**

Overall the Coastal Margins landscape is judged to have **low/moderate** capacity to accommodate a small turbine group and exceptionally a large group. Potential is limited by the overall moderate/high sensitivity of its variable landscape character, moderate/high to high landscape value of parts recognised by LoCl and Solway Coast AONB designation\*, rarity of dunes and mosses and strong ecological and historical interests.

The Solway Coast is distinguished by a remarkable sense of wildness and remoteness, due to the presence of extensive wildlife habitats, lack of large scale industrialisation and absence of main roads and railways. Overall scenic quality is based on a diverse sequence of open sea, foreshore, salt-marshes, dunes and heath contrasting with inland landscapes of farmed coastal plain and mossland. These are both essential qualities of the AONB and are likely to be compromised by any scale of wind energy development.

Elsewhere much of the coastal plain landscape is large scale and open with simple rectilinear field patterns that would aid the integration of a small – large group of turbines in a geometric layout. The 'engineered' character of the drained coastal plain and mosses would provide an appropriate context for turbine development. However there are some characteristics of the landscape that are more sensitive to turbine development and which substantially reduce capacity in the landscape as a whole.

A primary constraint is the limited extent of flat coastal plain and configuration into narrow strips. In the south around the Duddon and Leven it combines with neighbouring fells and intertidal flats to form picturesque estuarine landscapes vulnerable to the intrusion of turbine development. Around the Solway it is fragmented by patches of more contained undulating terrain and irregular mosaics of semi-natural vegetation found on undulating boulder clay and remnant mosses where turbines could be over dominant and less readily integrated.

The flat coastal horizons, big skies offer opportunities for simple contrast and the outer exposed coasts to evoke a strong sense of purpose and rationality. However the protection of the open and largely undeveloped skyline, peaceful backwater character, powerful contrasts with soft organic forms and rich textures of fringing dunes are major restrictions to turbine development. Further limiting factors are the heavy but dispersed patterns of visible vernacular and heritage features and small rural settlements which would make it difficult to site development sufficiently distant so as not to compromise their scale and character. Settlement size and pattern suggest that up to a small group of turbines would generally be appropriate.

Particular sensitivities in relation to the setting of international and national designations include:

- contribution to tranquil and picturesque compositions with fells in the Lake District NP and fine distinctive vistas to and from them around the southern estuaries
- contribution to a sense of remoteness and the sequence of contrasting landscapes in the Solway Coast AONB (as mentioned above)
- open sequential views from recreation and tourist routes along the coastal edge of the Solway Coast AONB and Frontiers of the Roman Empire: Hadrian's Wall across the coastal plain towards the Lakeland fells most notably from Cumbria Coastal Way, the B5300, National Cycle Route 72, Hadrian's Wall Trail and from viewpoints at coastal forts associated with the Wall
- open prospects across the coastal plain from the eastern side of the Arnside and Silverdale AONB, from Farleton Fell back to the AONB and the Limestone Link recreation route between them

<sup>\*</sup> For those areas that fall within the Solway Coast Area of Outstanding Natural Beauty Policy R45 in the Cumbria and Lake District Joint Structure Plan 2001 – 2016 applies

# LANDSCAPE TYPE 4: COASTAL SANDSTONE

Landscape Sub-Types	4a Coastal Sandstone	
Key Characteristics	Sensitivity	
Landscape Character:		
Scale and Enclosure Large scale rolling coastal hills culminating in exposed high cliffs of St Bees Head but progressively lower and undulating towards the south. Generally open character with wide views featuring focal points such as cliffs, lighthouse, caravan sites, and Sellafield complex. Occasionally intimate and enclosed along incised valleys. Large bare pasture fields predominate; limited features include low hedges (sparse and poor on exposed coastal tops, prominent hedge banks to south), buildings and occasional woods on valley sides.	Low/Moderate (2) Large group would not intimidate large scale of broader hilltops where exposure suggests a strong design rationale. On smaller hills and lower undulating terrain a single/twin or small group development would be more appropriate. Incised valleys highly sensitive due to more intimate scale and potential for over dominance in narrow zone of visibility.	
Complexity and Order Strong grain of north-south ridges in higher northern part. Drama of natural sandstone cliff faces, cliff top heath and species rich grassland contrasts with settled pastoral farmland. Generally simple improved pastureland with occasional arable fields divided by low hedges provides a managed ordered landscape. Frayed around urban edges and coastal developments. Occasional natural accents of woodland and wetland habitats. Strong linearity along southern shoreline reinforced by railway and coast road.	Moderate/High (4) Opportunities for organic cluster to relate to strong ridgelines or simple line of turbines behind southern shoreline. Turbines likely to sit less comfortably on irregular undulating terrain. Rugged natural cliff scenery of St Bees Head highly sensitive.	
Manmade Influence Generally farmland with remnants of monastic landscape around St Bees created by the 12 <sup>th</sup> century priory there and medieval strip fields around other villages. Vertical and engineered elements include transmission masts, pylons, and railway. Northern fringe with Whitehaven affected by encroaching industry and southern shoreline by some tourism developments eg camp sites and caravan parks, golf courses.	Moderate/High (4) Some potential to relate to 'working' character of improved farmland areas and engineered aspects such as the railway or industrial fringes. However likely to appear incongruous against vernacular and heritage features in and around villages and distinctive natural forms/character of St Bees headland and rural coastline to south.	
Skyline Open coastal hills create smooth sometimes layered horizons with intermediate ridges and incised valleys. Occasional vertical structures standout such as hilltop transmission masts and lighthouse. Sheer cliffs of St Bees Head create a dramatic landmark.	Moderate/High (4) Isolated turbine grouping could form a focal point in contrast with a strong ridge top or coastal horizon. However there are major issues related to potential dilution of the St Bees Head landmark, maintenance of clear uncluttered horizons, vulnerability of valley rims to disturbing effects of partial views and blade flash and setting of historic town of St Bees.	
Connections and Adjacent Landscapes Strong connections with the sea. Important backdrop to open beaches (1a). Sellafield complex and industrial areas of Whitehaven (U- urban areas) are dominant features at ends of this type. Weaker connections inland tending to bleed into low farmland (5b) and urban fringes of Whitehaven (5d).	Low/Moderate (2)  Near to coast large scale context of seascape likely to assist in absorption of turbine development. Potential for some assimilation against large scale industrial backdrops at northern and southern ends. There are issues related to intrusion on open prospects from popular beaches and extending visual clutter of urban fringe.	
Remoteness and Tranquillity St Bees headland enjoys a sense of remoteness, freedom and wildness attributable to the absence of development, drama of the cliffs and sea, natural windswept habitats and seabird colony. Remaining area is a mix of peaceful backwaters and busier parts on the fringes of Whitehaven and around the coastal resort of St Bees.	Moderate/High (4) Noise and movement of wind turbines likely to compromise essential qualities of St Bees headland but could relate to busier parts.	
Visual:		
Visual Interruption Relief of rolling or undulating coastal hills offers some localised screening. However the land cover is predominantly open with only occasional vegetative or built visual containment features.	Moderate/High (4) Turbine development likely to stand out and be widely visible.	
Settlement and Key Views Beyond St Bees Head dispersed pattern of villages and hamlets connected by network of minor roads. In north these have tended to spread out along sheltered incised valleys and are now affected by urban expansion. Along undulating coastal strip tend to be more nucleated. Also scattered houses and farmsteads, some on hilltops. Many buildings are in local vernacular and built of sandstone. Views from caravan parks/camp sites along the coast and recreation routes eg Cumbria Coastal Way and C2C cycle route near Whitehaven.	High (5) Limited scope to site development away from settled areas or tourism facilities. Size of development constrained by small scale nature of existing settlements with potential for over dominance.	

**Overall Sensitivity** 

Moderate/High

# **LANDSCAPE TYPE 4: COASTAL SANDSTONE**

Value		
Landscape Designations and Planning Policies	Scale it Matters and Why	
Heritage Coast St Bees Head	National: Protection of natural beauty of special coastlines and appropriate enhancement of public enjoyment. Special qualities: red sandstone headland, fissured cliffs, breeding seabirds and gem strewn beach, most conspicuous natural feature on entire west coast between N Wales and Scotland, cliff edge path part of Cumbria Coastal Way and Wainwright's Coast to Coast walk.	
Landscape of County Importance Remaining area beyond St Bees Head	County: Protection of distinctive character attributable to dramatic sandstone cliffs, hills and Pow Beck valley and absence of detractors (north); natural /built features; cultural features (south); wide views and overall 'attractive' impression	
Ancient Woodland Linethwaite Woods near Whitehaven Small valley woods around St Bees	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes	
Rarity	Area of County	
4a Coastal Sandstone	0.7%: rare	
Conservation Interests and Associations	Description	
Historic Environment Varied interest Conservation Areas: St Bees village	Remnants of monastic landscape around St Bees created by 12 <sup>th</sup> century priory. Nucleated settlements surrounded by fossilised strips of former medieval field systems. Many buildings in local vernacular tradition and built of sandstone. St Bees Head lighthouse built in 1867.	
Ecology Pockets of interest some outstanding Cliff edges of St Bees Head SSSI and small RIGGS. To south small site of Silver and Harney Moss SSSI and RIGGS.	Outstanding geological exposures and seabird colony of St Bees Head cliffs. Provide only breeding site on Cumbrian coast for a variety of seabirds including razorbill, guillemot, puffin and kittiwake. Cliffs here and to south also support coastal heath and species rich grassland. Inland landscape largely agricultural apart from wetland habitats associated with glacial deposits in south and valleys in north which also hold some small oak woodlands.	
Cultural	Thomas Carlyle described the cliffs at St Bees Head as 'that sappyre promontary'.	

#### LANDSCAPE TYPE 4: COASTAL SANDSTONE

# **Capacity Statement**

The Coastal Sandstone landscape is judged to have **low/moderate** capacity to accommodate turbine development. Potential is limited by moderate/high sensitivity overall, the high value and nationally recognised landscape of St Bees Head and moderate/high landscape value recognised by LoCl designation elsewhere, rarity value of this landscape type within Cumbria as well as moderately strong ecological, geological and historical interest.

At St Bees Head sheer cliffs create a dramatic landmark punctuating the otherwise subdued Cumbrian coast and together with the cliff tops offering a rare sense of remoteness, wildness and unspoilt scenic quality. These essential qualities, reflected in Heritage Coast and SSSI designations, are likely to be compromised by any scale of turbine development.

Beyond this headland there may be scope to accommodate a single turbine to small group sized development relating to the rounded coastal hills and undulations or straighter southern shoreline with engineered features. Such development should not over dominate the wide views available in this open landscape and could create a simple focal point in contrast to a strong ridge top or coastal horizon. Along the immediate coast absorption would be further assisted in the context of vast open sea backdrops and sense of exposure that would evoke a strong sense of purpose and rationality. Whilst broader ridge tops in north seem to offer potential for a larger group of turbines there are other overriding constraints on development of this size.

The dispersed pattern of small traditional settlements surrounded by remnant monastic or medieval landscapes would make it difficult to site developments sufficiently distant so as not to adversely affect their sense of scale and character. Villages in the incised valleys to the north of this type are particularly vulnerable to over dominance in a restricted zone visibility and disturbing effects of partial views over valley rims. Other issues include erosion of unspoilt rural coastline and uncluttered horizons, vulnerability of the open setting to St Bees Head and conflicts with the scale and character of natural and cultural accents such as wetland habitats, coastal heath and hedge banks.

Particular sensitivities in relation to the setting of national designations include:

 open prospects between Whitehaven and the St Bees Heritage Coast and integrity of the dramatic sandstone cliff scenery that extends beyond the boundary of this designation as viewed from the northern approaches via Cumbria Coastal Way

Landscape Sub-Types	5a Ridge and Valley 5b Low Farmland	5c Rolling Lowland 5e Drained Mosses
	0.0 = 0.11 1 0.1111.0.110.	00 21000

Key Characteristics	Sensitivity	
Landscape Character:	-	
Scale and Enclosure Medium to large scale landform varying from undulating to rolling to ridge and valley terrain. Enclosure and interruption increasing with degree of relief but long wide views from summits. Field units generally medium to large. Some vegetative enclosure and local scale indicators through presence of occasional valley woodlands, small plantations or shelterbelts, hedges and hedgerow trees but becoming sparser in higher areas and towards coast.	Low/Moderate (2) Small group would not intimidate this rolling landscape and exceptionally a large group might be absorbed on a broader ridge or open flatter area. Undulating fringes and occasional narrow valleys highly sensitive due to intimate scale and potential over dominance in narrow zones of visibility.	
Complexity and Order Fairly simple agricultural patterns dominated by improved pasture with limited features, variation related to grain of topography and exposure. Flatter areas and broad ridge tops - regular pattern of oblong or squarish fields often perpendicular to prevailing wind enclosed by hedges, straight roads, linear settlements along ridge tops, punctuated by farmsteads with associated tree clumps and shelterbelts. Rolling terrain and sheltered valleys – irregular fields, river/streamside woodland and trees, winding roads, more nucleated settlements and remnant mossland (5e, 5b).	Low/Moderate (2) Opportunities for turbine development to relate to strong ridgelines or mirror regular field patterns and create new focal points in sparser areas with strong siting rationale due to abundance of wind. More irregular patterns present fewer opportunities to link or connect turbine development.	
Manmade Influence Intensively managed and heavily settled 'working' countryside. Associated development and land cover patterns generally traditional and rural in character. Some larger modern development features including existing turbines, pylons, masts, major roads and railway, farm sheds and mineral workings and on urban edges industrial buildings, housing estates and golf courses. In West Cumbria legacy of immature and uniform landscapes from open cast coal mining (5a).	Moderate (3) Some potential for positive association with 'working' character and integration with regular manmade field patterns. However likely to appear incongruous against traditional rural development features. Could be less conspicuous near urban edges or where related to key manmade features sharing similar characteristics. May be perceived as further despoliation on restored areas that already have a negative image.	
Skyline Landform generally has horizontal emphasis but relief creates multiple horizons and intermediate ridges frequently broken by trees and woodland. Dissected by numerous valleys. Relatively few vertical structures, pylons sometimes locally dominant but otherwise occasional silos, existing turbines, chimneys or industrial buildings on urban edges, and transmission masts on neighbouring coast or high ground.	Moderate/High (4) Variable and unpredictable relationship with skyline and partial visibility likely to result in confused image. Valleys rims vulnerable to disturbing effects of partial views and blade flash. Limited opportunity to correspond to other vertical structures. Scope for confusion of form and function in proximity to pylons.	
Connections and Adjacent Landscapes Strong relationships with neighbouring high ground especially where the transition is sudden eg North Pennines (13), Sandale, High Park escarpments (12). These create a large scale context and significant backdrop in terms of views out of type 5 as well as prospects of it. Neighbouring coastal landscapes have similar although more localised effects. Type 5 also contributes to the setting of important valleys eg Eden and Derwent, towns within them eg Workington, Solway Coast AONB (2) and LDNP.	Moderate/High (4) Whilst large scale contexts of adjacent landscapes may assist in absorption of turbine development potential for intrusion in open prospects from high ground and coast, often of national importance, are increased. Also potential for localised intrusion on townscape settings and valley rims.	
Remoteness and Tranquillity Busy well populated working countryside especially around main settlements and transport corridors radiating out from Carlisle. However much quieter hinterland perceived as a rural backwater and pockets of remoteness/tranquillity around relic mosslands.	Moderate (3) Noise and movement of turbines could relate to busier areas but would be less suited to more peaceful parts.	
Visual:		
Visual Interruption Generally interrupted by relief, woodlands, hedges and buildings.	Low/Moderate (2) Turbine development likely to be more easily absorbed in wider landscape due to presence of interruptions resulting in glimpsed or intermittent views.	
Settlement and Key Views Heavily settled lowland crossed by major transport corridors into West Cumbria notably the A66, A69 A595. Numerous small market towns, villages, hamlets and isolated properties in a dispersed pattern right across type 5, linked by minor roads and lanes. Also crossed by Hadrian's Wall Trail, NCR 72 and C2C cycle route.	High (5) Limited scope to site development away from settled areas. Size of development constrained by small scale nature of existing settlements, with potential for over dominance.	

Overall Sensitivity	Moderate
---------------------	----------

Value	
Landscape Designations and Planning Policies	Scale it Matters and Why
Frontiers of the Roman Empire: Hadrian's Wall World Heritage Site and Setting Carlisle to Newtown nr Brampton S part of 5b (site and setting) and seaward parts of 5a/b between Maryport and Silloth (setting)	International: Protection of core archaeological features of the Roman wall and coastal defences as well as their landscape setting
Solway Coast AONB Covers small parts of 5b	National: Conservation and enhancement of natural beauty attributable to: wild and remote qualities due to absence of large scale industrialisation, main roads and railways; rich presence of birdlife and expansive area of salt-marshes; distinctive contrasting sequence of coastal margins/ farmland and mossland; open and attractive views to Scottish coast and Lakeland fells; small distinctive villages.
Registered Historic Parks and Gardens Workington Hall (5a)	National: Protection of special historic interest of parks and gardens and their settings
Ancient Woodland Sparse concentrations alongside the Rivers Lyne (5b) and Petteril (5b) nr Carlisle, gill woodlands in Allerdale below Sandale escarpment and sides of Broughton Moor (5a) and Greenscoe Valley Barrow (5c)	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes
Rarity	Area of County
5a Ridge and Valley 5b Low Farmland 5c Rolling Lowland 5e Drained Mosses	6.8%: common 9.3%: common 2.1%: unusual 0.4%: rare
Conservation Interests and Associations	Description
Historic Environment Varied interest Conservation Areas: Numerous small towns and villages across Solway Basin (5a/b), Settle Carlisle Railway and handful of small towns/villages E of Carlisle around Eden Valley (5b/c). Elsewhere only occasional villages including Greysouthen and Beckermet W Cumbria (5b/c), Longtown in Borders (5b) and Lindal–in-Furness (5c).	Evidence of Roman occupation prolific in places. Traditional field systems round settlements/fossilised strips of medieval origin (5a, 5c). Remains of former industries-iron/coal workings, quarrying (5a). Land improvement and mineral exploitation by Cistercian monks (5b). To north medieval fortified sites associated with Anglo-Scottish border (5b). Ancient hedgerows, red sandstone buildings, some stately homes and parks (5c). North of Carlisle regular field patterns characteristic of late enclosure (5b).
Ecology Largely an agricultural landscape with isolated areas of seminatural vegetation Occasional small SSSIs, RIGGS and NNRs	Upland oak woodland (5a, 5b) Lowland raised bog (5b,5e) Rush pasture /purple moor-grass (5a, 5b, 5e) Rivers and streams (5a, 5b,5c) Species rich hedgerows and basin mire (5c)
Cultural Limited interest	Charles Dickens/Wilkie Collins 'The Lazy Tour of Idle Apprentices' (journey from Carrode Fell to Allonby) Wigton area settings for novels by Melvyn Bragg

### **LANDSCAPE TYPE 5: LOWLAND**

# **Capacity Statement**

Overall the Lowland landscape type is judged to have **moderate** capacity to accommodate turbine development. This reflects moderate sensitivity overall and moderate value as a largely undesignated landscape. A significant exception is the small area of lowland that falls within the Solway Coast AONB designation\*. Here high value and sensitivity attributable to a sense of remoteness, lack of large scale development and contribution as a backdrop and contrast to wilder coastal edge landscapes indicate that any scale of wind energy development is likely to be inappropriate. Whilst this type has moderately strong historical interest this is attributable to the presence of conservation areas, Roman remains, medieval field patterns, historic parks etc. It is considered that wind energy development could be accommodated provided it does not impinge on the site or setting of these valued features and therefore this value should not reduce capacity in the landscape as a whole. Elsewhere some notable localised geographical variations in the sense of enclosure created by the undulating and rolling topography and regularity of land cover patterns affect appropriateness.

Greatest potential occurs in the open flatter areas and broad ridge tops where small or, in exceptional circumstances, large turbine groups could relate to the medium to large scale landform without dominating wide views and integrate with regular field patterns. The sense of exposure in these areas would also evoke a sense of purpose and rationality. In the more sheltered and enclosed valleys or undulating fringes turbine development would feel over dominant and conflict with more irregular land cover patterns.

Whilst significant interruption by relief and vegetation would assist absorption in the wider landscape these same features are likely to result in unpredictable relationships between turbines and a variable skyline with intensifying or disturbing effects such framing or blade flash over valley rims. A key characteristic limiting capacity is the dispersed pattern of numerous small rural settlements making it difficult to site developments sufficiently distant so as not to adversely affect their sense of scale and character. Settlement size and pattern suggest that up to a small group of turbines would generally be appropriate. Other more localised sensitivities include potential erosion of peaceful rural backwater qualities and impact on valued views from neighbouring high ground or coast, important valleys and towns such as Workington within them.

Particular sensitivities in relation to the setting of international and national designations include:

- contribution of the quieter hinterlands to a sense of remoteness and the sequence of contrasting landscapes in the Solway Coast AONB
- open sequential views from recreation and tourist routes along the coastal edge of the AONB and along Frontiers of the Roman Empire: Hadrian's Wall across the lowland ridges towards Lakeland fells most notably from Cumbria Coastal Way, the B5300, National Cycle Route 72, Hadrian's Wall Trail and from viewpoints at forts and milecastles associated with the Wall
- distinctive vistas to and from the northern and western fells of the Lake District NP and open estuarine views from the Ravenglass and Eskdale 'gateway'
- vistas of the north-western tip of the North Pennines AONB

54

<sup>\*</sup> For those areas that fall within the Solway Coast Area of Outstanding Natural Beauty Policy R45 in the Cumbria and Lake District Joint Structure Plan 2001 – 2016 applies

# LANDSCAPE TYPE 9ii: MOORLAND HILLS AND LOW PLATEAUS

Landscape Sub-Types	9a Open Moorlands (West Cumbria) 9b Rolling Farmland and Heath (Eden, South Lakeland)
	9d Ridges (West Cumbria)

Key Characteristics	Sensitivity
Landscape Character:	
Scale and Enclosure Medium to large scale rolling hills (9b Eden, d) or low plateaus (9a,b S. Lakeland). String of long hills or 'riggs' combine to form distinct High Park ridge (9d) in W. Cumbria. Medium to large sized fields. Generally open can be enclosed by small-medium sized plantations, within valleys between hills or hummocky relief (9b S. Lakeland). Scale indicators include small woods, gill features, tarns and rocky outcrops (9b S. Lakeland), walls, isolated buildings, hamlets, villages, pylons and trees.	Low/Moderate (2) Scale of topography, land cover and settlement and degree of enclosure generally suggest scope for up to a small group development. In close range turbines may appear out of scale against detailed features of relief and land cover.
Complexity and Order Distinctive topographic grain to ridges or hills. Generally simple and balanced combination of elements often transitional land cover large rectangular fields of rough pasture giving way to of improved pasture on lower slopes sometimes in smaller narrower fields (9d W. Cumbria). Conifer or mixed plantation blocks and remnant broadleaved woodland often in gills feature quite strongly in all parts. Patterns can be more diverse, patchy cover of marshy hollows, heath, rocky outcrops, tarns (9b S. Lakeland higher parts) and recently restored opencast areas (9a). Power lines or motorway can cut across topographic grain (9a, 9b S. Lakeland).	Low/Moderate (2) Opportunities for organic configurations in response to particular grain of hills or ridges. In lower managed areas more ordered arrangement might relate to regular field patterns and compare visually with plantation blocks. Varied land cover patterns offer less scope for visual linkage. Potential for turbine arrangements to exacerbate discordant linear utility or infrastructure features.
Manmade Influence Higher parts have rough untamed texture as mainly rough moorland. Improved parts and plantation blocks convey a more functional character. Localised presence of manmade elements eg motorway, masts, small reservoirs in 9b S. Lakeland, pylons in 9b S. Lakeland and 9a W. Cumbria and opencast coal mining in W. Cumbria. Narrow wooded gill/valley features in all parts, variety of natural features such as marshy hollows, rocky outcrops, tarn etc in 9b S. Lakeland and historic mining villages present in 9a.	Moderate (3)  Turbine development has potential to erode integrity of untamed and featureless character of rough moorland areas. However a well designed isolated group could be perceived as a complementary contrast. Potential to correspond to other manmade elements and positive association with working character of improved farmland or plantation blocks. However also potential to appear incongruous in context of natural features eg wooded valleys/gills or historic mining villages.
Skyline Mostly smooth with multiple summits sometimes broken by plantations. More reposeful plateau skylines in 9a and 9b S. Lakeland. Latter hummocky in outline at northern end. Skyline often featureless although isolated buildings and woods (9a,d W. Cumbria), or masts and pylons (9a, 9b s. Lakeland) can stand out.	Low/Moderate (2) Opportunity for isolated turbine groupings to create a new focal point in clear visual contrast to simple moorland skylines although maintenance of a predominantly uncluttered skyline is an issue. Other issues relate to potential for localised confusion of form and function with other manmade verticals and competition with natural or historic punctuations.
Connections and Adjacent Landscapes Sharp elevational contrasts create strong visual connections with heavily settled coastal strip (5,2) for 9a,d W. Cumbria and broad valleys (8b) for 9b both containing some important towns and recreation routes. Views often restricted by steep ridge or plateau sides. Inter-visibility with nearby fells most of which are nationally valued which can create dramatic backdrops (9b and d).	Moderate/High (4) Potential for intrusion on sensitive coastal strip and valleys, setting of important towns, recreation routes and prospects from and to adjacent fells of high sensitivity. Plateaus (9a, 9b S. Lakeland) offer some scope to site turbines away from sensitive edges. Large scale backdrop and visual containment of High Park ridge to 9a may assist absorption of turbines.
Remoteness and Tranquillity Generally lightly settled areas that retain a peaceful backwater character. Occasional noise and movement eg M6 on edge of 9b S. Lakeland, Settle/Carlisle railway (9b Eden), local commuter/recreation routes, off road activity parks.	Moderate/High (4) Noise and movement of turbines likely to compromise peaceful backwater character.
Visual:	
Visual Interruption Visibility interrupted by rolling or hummocky terrain, shoulders of scarp slopes and plantations. More limited containment on open High Park ridge (9d) and plateau edges.	Moderate (3) Degree of containment likely to assist absorption. Turbine development on plateau edges and ridge (9d) likely to be more widely visible. Higher degree of visual containment towards centre of plateaus and where plantations present.
Settlement and Key Views Lightly settled with dispersed pattern of isolated farmsteads, houses and occasional hamlets/small villages. Views in Eden across 9b near Appleby from Eden Valley Cycle Route and Settle/Carlisle Railway, in S. Lakeland M6 Killington viewpoint, in W. Cumbria panoramas of coast and Lakeland Fells from local roads and open access area (9d)	Low/Moderate (2) Dispersed settlement and key views present some limitations on siting and size of development.

# LANDSCAPE TYPE 9ii: MOORLAND HILLS AND LOW PLATEAUS

Va	llue
Landscape Designations and Planning Policies	Scale it Matters and Why
Landscape of County Importance 9b South Lakeland and 9d West Cumbria	County: Protection of distinctive character attributable to 9b: varied land cover, natural and built features eg patches of heather and rush pasture on ridge tops, marshy hollows, tarns streams, stone walls, rocky outcrops, hamlets and views of surrounding fell tops and into adjacent valleys creating a strong positive response.  9d: distinct land form of ridge, natural moorland land cover, striking views of adjacent fells, coast or estuary, absence of detractors and woodland and stone wall features of interest creating a strong positive response.
Ancient Woodland Generally sparse: 9a: few around Gilgarran in W. Cumbria largely re-planted 9b: Hoff Lunn Eden and Lune Valley fringes S. Lakeland 9d: block at Branthwaite in W. Cumbria	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes
Rarity	Area of County
9a Open Moorlands 9b Rolling Farmland and Heath 9d Ridges	1.8%: unusual 2.3%: unusual 1.1%: unusual
Conservation Interests and Associations	Description
Historic Environment Localised interest  Conservation Areas: Settle/Carlisle Railway in Eden (9b)	In W Cumbria (9a,d) settlement pattern dispersed some clusters of 19 <sup>th</sup> century industrial workers housing (9a). Earthworks including prehistoric settlements and burial cairns and medieval shielings. Fields often large and formed by late moorland enclosure. Lower down on ridge (9d) at Weddicar Rigg long narrow fields defined by stone walls. In South Lakeland dispersed settlement pattern with limestone built farmsteads. In general buildings date from 17 <sup>th</sup> century onwards. The field system is late and often originated in the 19 <sup>th</sup> century. In Eden the settlement pattern is based on nucleated villages with a field pattern of early enclosures often containing fossilised strips. Settlement is sparse, in lower areas nucleated, higher areas dispersed and later in origin. Lower down fields are irregular often small but on higher land generally regular and product of late enclosure. Prehistoric settlements and burial cairn remains.
Ecology Interest across rough moorland, locally strong  9b: In Eden SSSIs along Hoff Beck and Helm Beck and 2 small pockets, in S. Lakeland SSSIs limited to isolated wetland pocket	Moorland of rough and improved pasture containing areas of rush pasture and purple moor-grass, upland heathland and acid grassland.  In South Lakeland of note south of Killington presence of a series of small raised bogs characterised by sphagnum moss whilst coniferous plantations support long-eared owl. In Eden species rich roadside verges occur south of Appleby.  In W. Cumbria rush pasture and purple moor grass dominant on High Park ridge (9d). Lower slopes support rush pasture and swamp, together with improved grassland. Steeply incised valleys support small upland oak woodlands.  Moorland important for a variety of butterflies, moths and breeding birds such as skylark, lapwing, curlew, short eared owl and grouse. Rush pasture in West Cumbria supports internationally important numbers of hen harrier (9a,d).
Geology Isolated pockets of interest:  9a W. Cumbria: 2 no. RIGGS 9b Eden: 2no. small RIGGS 9b S. Lakeland: 2no. small RIGGS 9d W. Cumbria: 2no. small RIGGS	Significant exposures of Permian rocks in Eden including Penrith Brockram.

# LANDSCAPE TYPE 9ii: MOORLAND HILLS AND LOW PLATEAUS

## **Capacity Statement**

Overall the Moorland Hills and Low Plateaus landscape is judged to have a **moderate** capacity to accommodate turbine development. This reflects moderate sensitivity overall. Whilst the South Lakeland (9b) and West Cumbria (9d) areas have moderate/high landscape value as LoCls on balance the attributes recognised are considered unlikely to be significantly compromised by wind energy development. Their distinctive character is mainly attributable to simple moorland forms and land cover indicating lower sensitivity as discussed below. Natural and cultural features and striking views in both areas are also recognised under this designation but for the most part are localised and should influence siting and design rather than reduce capacity in the landscape as a whole.

Whilst mixed or transitional in character these areas retain a moorland character typified by elevated, windswept and largely empty land covered by rough grass and heather. These core moorland characteristics suggest scope to accommodate turbine development. If isolated and well designed in response to the scale and shape of landform such a development could create a symbolic focal point in clear visual contrast to the simple moorland vegetation canvas and smooth skylines. The medium to large scale of this landscape suggests scope for up to small groups of turbines either in organic configurations in response to the form of individual hills or ridges and their overall grain or more ordered arrangements related to regular field patterns or plantation blocks. Turbine development would sit less comfortably where land cover patterns become patchier and varied in character as they offer less scope for visual linkage. In South Lakeland (9b) this problem tends to be exacerbated by the hummocky nature of the rolling farmland and heath near Kendal.

A key constraint is the potential for turbine development to erode a peaceful backwater character. Another is the potential for intrusion on adjacent major valleys and coastal strip and the setting of important towns and popular recreation routes within them as well as prospects to and from nearby fells of national value. Other issues include protection of largely uncluttered pristine skylines (9b Eden and 9d West Cumbria), potential for localised visual confusion with the form and function of masts and pylons (9a West Cumbria and 9b South Lakeland) and competition with natural or historic punctuations.

Whilst there is potential for positive association with the 'working' character of improved farmland or plantations there is also localised potential for turbines to appear incongruous and out of scale in the context of natural and historic features such as wooded gills, tarns, smaller historic field patterns and historic mining villages.

Particular sensitivities in relation to the setting of international and national designations include:

- in West Cumbria contribution of the High Park ridges and moors to vistas and coastal panoramas from the C2C Cycle Route (NCR 71), the Ennerdale and Loweswater Fells and 'gateways' to the Lake District NP off the A5086
- views from the western Howgill Fells in the Yorkshire Dales NP and Sedbergh 'gateway' towards the rolling farmland and heath near Kendal and back towards the Park from the A684, M6 and Killington Reservoir viewpoint
- contribution of the rolling farmland and heath near Appleby to panoramic views of the Vale of Eden and Lakeland fells beyond from the western scarp of the North Pennines AONB, most notably from the Pennine Way as it descends from High Cup Nick, and views back towards the imposing scarp from National Cycle Routes 68 and 71 and the Pennine Bridleway.

Landscape Sub-Types	11a Foothills 11b Low Fells
	I IID LOW FEIIS

# **Key Characteristics** Sensitivity Landscape Character: Scale and Enclosure Moderate (3) Varies with altitude from medium scale enclosed rolling or hilly Small group would not intimidate low fells and plateau farmland. Exceptionally a large group might relate to broad sweep of fell farmland to larger scale plateau farmland, open fell bottoms or side or moorland. Lower more pronounced hilly terrain highly

moorland and outlying low fells (11b). Land cover also varies from improved pasture fields to open moorland. Field size reflects local relief, small in hilly parts but large on flatter plateaus. Variety of scale indicators in lower parts including walls, hedges, conifer plantations, deciduous trees and small woods, rocky outcrops and minor valleys but higher areas tend to be featureless.

## **Complexity and Order**

Transitional but generally balanced and calm. Simple open moorland of rough pasture with colourful patches of heather and extensive conifer plantations in parts gives way to lower farmland dominated by improved pasture. Farmland can be simple with a pattern of large square fields and small plantations with poor hedges, fences and walls or diverse in hillier parts with smaller fields and a variety of features such as streams and wooded minor valleys, wooded steep slopes, tarns and marshy hollows, rocky outcrops, boundary trees and tree clumps round farms. Low fells (11b) have NE/SW grain.

Opportunities for organic configurations related to form of individual low fells and larger hills or sweep of lower fell sides. Simple moorland canvas offers potential for dramatic contrast. On lower flatter farmland plateau rectilinear group might mirror regular filed pattern and plantation blocks. More diverse hilly terrain highly sensitive due to potential confusion of variable heights and limited scope for visual linkage.

sensitive due to intimate scale and potential for over dominance in

and land cover. Most likely to appear rational on windswept hill/fell

restricted zones of visibility. In close range turbines may appear

incongruous and out of scale against detailed features of relief

tops of southern and western upland fringes.

# Manmade Influence

Trend towards reduced variety due to agricultural intensification and afforestation in 20<sup>th</sup> century. Symptoms include neglect or removal of walls, hedges, deciduous woodland and loss moorland to improved pasture or conifer plantations. Largely unspoilt but harmony sometimes locally weakened by large modern quarries, pylons, conifer blocks, masts, M6 or farm sheds.

#### Moderate/High (4)

Moderate (3)

Potential for positive association with working character of intensively farmed or afforested areas and large scale engineered aspects such as quarries or roads. However may be perceived as exacerbating deterioration of rough untamed qualities and compromising unspoilt character.

Complex skyline of interwoven hills with intermediate horizons interrupted by trees and woods gives way to emptier smooth fells or moorland. Frequently backed by higher uplands. Few points of vertical focus except occasional pylons, masts, and existing turbines. Pronounced hills can create immediate and dominant skylines relative to valleys and frame vistas.

## Moderate/High (4)

Potential for confusing and unpredictable relationship with complex skyline of lower foothills. In higher parts limited scope for isolated turbine grouping to form a predictable and clear visual contrast with barer fell and moorland skylines but may appear illogical in context of higher upland skylines. Potential for localised over dominance and visual confusion with pylons, masts and existing turbines.

## **Connections and Adjacent Landscapes**

Generally part of a wider hierarchical and uplifting scene with adjacent uplands (13) including N. Pennines escarpment, Lakeland Fells and Howgills. Often contrasting textures and colours serve as a foil. Also contribute to setting of main valleys (8b), towns such as Kendal, Ulverston and Cleator Moor and Hadrian's Wall. Furness foothills important to open and scenic estuarine views. Intervisibility with surrounding fell tops some of which nationally valued.

# Moderate/High (4)

Whilst large scale backdrops of uplands likely to assist absorption in terms of scale turbines have potential to clutter and detract fr jar against foreground of wider restful and well composed scenery. Also potential for intrusion on sensitive valley rims, setting of important towns and Frontiers of the Roman Empire: Hadrian's Wall as well as prospects from adjacent fells. discordant

#### Remoteness and Tranquillity

Rapid transition from remote open uplands to more settled farmland generally perceived as peaceful rural backwaters. Only major disturbance is the M6 motorway which carves through the low fells (11b) and to lesser extent other through routes such as A595, A6, A685, A684 and A69.

### Moderate/High (4)

Noise and movement of turbines maybe appropriate adjacent to through routes but elsewhere likely to compromise sense of remoteness in higher parts and peaceful backwater character of settled parts.

## Visual:

## Visual Interruption

Varies from prominent sweeps of open fell side/moorland to lower rolling foothills where visibility is significantly interrupted by the relief, individual and clumps of trees, plantations, hedges and buildings. Low fells (11b) open but broken configuration into individual summits tends to shorten views.

#### Moderate (3)

Turbine development assisted by rolling topography and frequent interruptions resulting in glimpsed or intermittent views. However likely to stand out on fell sides and moorland.

### Settlement and Key Views

Absent or only isolated farmsteads across higher parts but frequent scattered farmsteads, hamlets and small villages served by minor roads evenly spread across lower foothills. Concentration of villages evident along foot of North Pennine scarp and elsewhere along main through routes. Views of southern part of N Pennines from Pennine Bridleway, C2C Cycle Route (also Copeland), Eden Valley Cycle Route and W2W Cycle Route (also S Lakeland). Fox's Pulpit view (11b).

# Moderate (3)

Higher parts offer scope to site development well away from settlements whilst dispersed settlement in lower foothills presents greater limitations on siting and size of development.

# **LANDSCAPE TYPE 11: UPLAND FRINGES**

Value		
Landscape Designations and Planning Policies	Scale it Matters and Why	
Frontiers of the Roman Empire: Hadrian's Wall World Heritage Site and Setting Northern fringe of 11a N Pennines (setting)	International: Protection of core archaeological features of the Roman wall and coastal defences as well as their landscape setting	
North Pennines AONB Eastern fringes of 11a North Pennines strip	National: Conservation and enhancement of natural beauty derived from the special qualities of: a unique landscape unit with a distinctive geology and unusually large extent of high, exposed semi-natural moorland which has outstanding wilderness qualities; scenic contrasts and unfolding sequence of simple moorland, sheltered dales and dramatic scarp as well as spectacular individual features; moorland landscapes valued for their long views and western scarp affords panoramic views; special interests of historic mining landscape, unique flora and fauna, unusual range of geological and geomorphological features and wealth of archaeological and historical remains which contribute to landscape character.	
Landscape of County Importance All areas beyond AONB	County: Protection of distinctive character attributable to natural/built features, absence of detractors, views, and sometimes landform or land cover creating a strong positive response.	
Registered Historic Parks and Gardens E part of Holker Hall	National: Protection of special historic interest of parks and gardens and their settings	
Ancient Woodland Concentrations along River Gelt in N Pennines, Ellerside and Millom Park in Furness and Great Wood in West Cumbria	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes	
Rarity	Area of County	
11a Foothills 11b Low Fells	8.5%: common 0.5%: rare	
Conservation Interests and Associations	Description	
Historic Environment Widespread archaeological remains  Conservation Areas: Cumrew and Dufton in N Pennines Cartmel and Newland in Furness	Settlement pattern dispersed in foothills (11a) and few isolated farmsteads in low fells (11b). Field system product of late enclosure. Some farms originated as late as 16 <sup>th</sup> century. Ring garths and intakes identifiable. Widespread upstanding remains include prehistoric stone circles and cairns, medieval shielings and droveways, remnants of late medieval deer parks and prolific industrial remains eg quarrying and lead mining. Some areas especially rich eg Warcop Common.	
Ecology Many small pockets of interest  Limited in N. Pennines and S Lakeland to SSSIs and sometimes SACs or SPAs over main rivers and becks or moorland extensions. Also Limestone Pavements Orders east of Kirkby Stephen. Designations absent in Furness except for RIGGS near Millom. In W Cumbria small RIGGS, SSSI/SAC on R Ehen and few small sites.	Low fells (11b) and N/E areas (11a) support areas of upland heath and acid grassland. Rush pasture frequent on poorly drained ground throughout and species rich hedgerows in lower parts. Many small valleys often support upland oak woods and habitat for otters and dippers. Occasional outcrops of limestone support limestone grassland and upland ash woodland. Purple moor grass, gorse scrub and small stands of wet woodland in damp hollows also found in low fells (11b).	

### **LANDSCAPE TYPE 11: UPLAND FRINGES**

# **Capacity Statement**

Overall the Upland Fringes landscape is judged to have **low/moderate** capacity to accommodate turbine development. This reflects moderate sensitivity overall, moderate/high to high landscape value recognised by LoCl and AONB designation\* and moderately strong historical and ecological interest. Rapid transitions in character occur with changes in altitude which affect acceptability.

Within the North Pennines gently rolling or terraced upland fringe landscapes along the northern edge and the south west end around Stainmore Gap have a particular sensitivity because of their contribution to the contrasting sequence of landscapes valued under the AONB designation. In between foothills on the edge of the Vale of Eden run up to join the dramatic western scarp and together these form one of the most distinctive parts of the AONB. Here dramatic and varied landforms, panoramic views and a string of historic scarp foot sandstone villages are qualities likely to be compromised by any scale of wind energy development.

Key constraints within this type include the potential for wind turbines to compromise the unspoilt character and sense of remoteness or peace found in these rural backwaters; general absence of comparable man-made structures; visual context against higher uplands in which turbines may appear illogical if placed below the main skyline and clutter the foreground of wider and uplifting landscape compositions.

Higher parts offer some aspects favourable to turbine development. The larger scale outlying low fells, moorlands, fell bottoms and high plateau farmland suggest scope for small group development and possibly a large group on broader topographic sweeps. This could create a focal point in clear visual contrast to a simple moorland canvas of rough pasture and heathland or relate to the regular large scale pattern of fields and plantations and associate with large scale engineered aspects such as main roads and large quarries.

The restricted views and intimacy of the lower foothills are likely to be intimidated by turbine development. A dispersed pattern of small settlements would make it difficult to avoid over dominance and a complex skyline of interwoven hills and diverse farmland exhibiting a variety of natural and historic features suggests potential for visual confusion.

Particular sensitivities in relation to the setting of national and international designations include:

- sequential views towards the AONB from Hadrian's Wall Trail and Cycle Route (part of NCR 72) and from viewpoints at the forts, milecastles and camps between Lanercost and Birdoswald
- sequential views towards Frontiers of the Roman Empire: Hadrian's Wall from the Tindale Fells in the AONB (NCR 72), Pennine Way as it descends into the Irthing Valley and A69
- panoramic views from the upland edges of the AONB over the Vale of Eden towards the Lakeland fells most notably from the Pennine Bridleway around Croglin Fell and Knock Gill, the A686 pass, Hartside Cross viewpoint, the Maiden Way and the C2C Cycle Route (NCR 7), the Pennine Way around High Cup and from the Stainmore Gap A66, Coast to Coast footpath and W2W Cycle Route 'gateway'
- views from below where the scarp forms an imposing wall above the Vale of Eden most notably from the A66, A686, Settle Carlisle Railway, Pennine Bridleway and C2C and EV Cycle Routes (NCR 7/ 68)
- views from the Shap Fells and Potter Fell on the south-eastern fringe of the Lake District NP and seguential views in from the W2W Cycle Route (NCR 68), Dales Way and A6
- contribution to tranquil and picturesque compositions with fells in the Lake District NP around the Duddon and Leven estuaries and views from the trunk road skirting edge of Park and 'gateways' off it, National Cycle Route 72, Furness Fells and Black Combe
- in West Cumbria views from the C2C Cycle Route (NCR 71) and views out from the Ennerdale and Loweswater Fells and 'gateways' off the A5086 to the Lake District NP
- views from the western Howgill Fells in the Yorkshire Dales NP over the low fells and back towards them from the A684 and M6

-

<sup>\*</sup> For those areas that fall within the North Pennines Area of Outstanding Natural Beauty Policy R45 in the Cumbria and Lake District Joint Structure Plan 2001 – 2016 applies

LANDOOAI E III E 12. IIIONEK EI	IN EO I OIVE	
Landscape Sub-Types	12a Limestone Farmland 12b Rolling Fringe	12c Limestone Foothills 12d Moorland & Commons
Key Characteristics	Sensitivity	
Landscape Character:		

# Scale and Enclosure

Mostly large scale rolling or undulating hills and fells with occasional steep slopes and scars. Generally open and bare with wide views sometimes exposed (12d) or more enclosed in valleys. Medium/small scale fields in settled farmland (12a) and foothills (12c south). Otherwise broad scale land cover fabric of open commons (12d), large allotments of rough pasture and remnant heath or conifer plantations sometimes extensive (12b, 12c north). Scale indicators scarce increasing in settled farmland (12a) include: walls, hedges, occasional tree clumps, relict broadleaved woods, and rock outcrops.

## Low/Moderate (2)

Scale and wide horizons generally suggest scope for a small to large scale group development. Lower improved farmland and valleys highly sensitive due to intimate scale, potential for over dominance in restricted zone of visibility and context of more frequent natural and built scale indicators.

# **Complexity and Order**

Generally balanced. Core areas include simple moorland forms covered by rough grassland/heather mosaics with extensive limestone pavements/scars and isolated trees (12d) and rolling farmland with improved pasture divided by stone walls into a strong pattern of small fields around ancient villages softened by trees (12a). Transitional fringe areas of mixed pasture are sometimes fairly simple divided into large rectangular fields with isolated plantations and occasional tree clumps with signs of neglect (12b) or more distinctive estate land with extensive plantations, parkland and some ancient woodland (12c).

#### Moderate/High (4)

Turbines likely to disrupt scenic harmony of core limestone areas of rolling farmland with distinctive historic patterns and simple craggy moorland with mosaics of natural grassland and heather. Simpler fringe areas less sensitive with potential for ordered turbine groupings to mirror large regular fields or plantation blocks.

#### **Manmade Influence**

Strong sense of history in core areas (12a,d) with evidence of settlement as early as Neolithic. Rich legacy of visible archaeological remains including medieval field patterns. Trend towards reduced variety due to agricultural intensification and afforestation in 20<sup>th</sup> century. Symptoms include neglect or removal of walls, woods, boundary trees loss of species rich grassland/heather moorland and large farm sheds. Localised presence of large quarries, masts, pylons and roads with concentration by M6.

#### Moderate/High (4)

Turbines likely to appear incongruous in context of historic field patterns and visible remains. Limited potential for positive association with afforestation and large scale engineered aspects such as quarries or roads. However may be perceived as exacerbating deterioration of rough untamed qualities and compromising unspoilt character.

#### Skyline

Simple flowing horizons sometimes stepped in profile with (12a,d) or more rounded (12b,c). Generally bare and smooth occasionally textured by trees. Can form landmark skylines eq Hilltop/Sandale escarpment (12b) or eye catching scars (12d). Skyline complicated by trees scrub and interweaving ridges in lower areas. Pylons and masts conspicuous in parts.

## Moderate (3)

Some scope for isolated turbine grouping to form a predictable and clear visual contrast with barer fell and moorland skylines but visual clutter is an issue. Distinctive landmark skylines likely to be compromised. Potential for unpredictable relationship with complex skyline of lower farmland and visual confusion with pylons and masts.

#### **Connections and Adjacent Landscapes**

Strongly connected by inter-visibility with nearby fells (13) some of which nationally valued including Lakeland Fells, North Pennines and Howgills. In Allerdale (12b north) defines the edge of the Solway Basin. Can contribute to setting of important valleys, settlements and viewpoints eg upper Lune valley and Kirkby Stephen, Caldbeck valley and Faulds Brow.

### Moderate/High (4)

Whilst large scale backdrops of uplands may sometimes assist in absorption of turbines they may clutter and jar against distinctive sometimes dramatic views of adjacent fells. Also potential for intrusion on sensitive valley rims, settlement settings and prospects from adjacent fells.

## Remoteness and Tranquillity

Only major disturbance is the M6 motorway and to lesser extent other through routes such as A66, A685, A595 and A5086. Population tends to be concentrated in historic villages with surrounding agricultural areas generally perceived as quiet and calm. Higher unsettled parts remote and tranquil.

# Moderate/High (4)

Noise and movement of turbines maybe appropriate adjacent to through routes but elsewhere likely to compromise sense of remoteness found in higher parts and quietness elsewhere.

#### Visual:

# Visual Interruption

Generally open ranging from bare grazing land and limestone pavements to settled farmland with trees concentrated around villages and farms or in valleys. Low incidence of interruption although localised containment by relief and plantations.

# Moderate/High (4)

Turbine development likely to stand out and be widely visible.

#### **Settlement and Key Views**

Largely absent across 12d and other higher parts. On lower farmland population concentrated in historic villages or isolated farmsteads. Villages often linear located in minor valleys or more nucleated next to springs on edge of moors, with strong limestone built character, greens and farm buildings within them. Views from national recreation routes: Pennine Bridleway; Coast to Coast footpath; W2W and C2C Cycle Routes.

#### Moderate/High (4)

Higher parts offer some scope to site development well away from settlements but can be constrained tourism facilities. Lower settled farmland presents greater limitations on siting and size of development constrained by small scale nature of historic villages with potential for over dominance.

Overall Sensitivity	Moderate/High
o voi aii oononiivity	inouorato/ringii

# **LANDSCAPE TYPE 12: HIGHER LIMESTONE**

Value		
Landscape Designations and Planning Policies	Scale it Matters and Why	
Landscape of County Importance 12a, c, d and parts of 12b.	County: Protection of distinctive character attributable to landform (except 12b,c Eden) natural/built features (except 12b Allerdale), absence of detractors, views, and sometimes cultural features (a, d) or land cover (b, c, d) creating a strong positive response.	
Registered Historic Parks and Gardens N tip of Lowther Castle and Image Garden Reagill (12b)	National: Protection of special historic interest of parks and gardens and their settings	
Ancient Woodland A few notably Crosby Gill and Scandal Beck (12a), gill woods on edge of Solway Basin (12b), Hoff Lunn Eden (12a/b) and around Greystoke Park (12c)	National/Regional: Conservation of ancient semi-natural woodlands as irreplaceable nature conservation assets with associated interests including characteristic landscapes	
Rarity	Area of County	
12a Limestone Farmland 12b Rolling Fringe 12c Limestone Foothills 12d Moorland & Commons	2.7%: ordinary 2.3%: unusual 1.3%: unusual 2.0%: unusual	
Conservation Interests and Associations	Description	
Historic Environment Rich concentration of visible remains particularly in 12a and 12d.  Conservation Areas: Settle/Carlisle railway (12a/d) and several villages across 12a	In Eden nucleated villages often with greens and traditional farm buildings within them surrounded by mix of late and early enclosures with fossilised strips (12a, b Eden c) sometimes linked to commons by droveways or outgangs. In 12d little settlement, commons unenclosed and what enclosure exists is late. Features include earthworks eg prehistoric boundary walls, stone circles and cairns (12a,d), Viking remains (12b Allerdale),Roman roads (12d,c), early medieval settlement remains and evidence of medieval deer parks (12a, c), ridge and furrow and lynchets (12a,b), abandoned quarries and limekilns (12a,b,d), and isolated barns(12a).	
Rich interest especially in 12d and 12a. Limited interest in 12b.  Core areas of 12d covered by SACs/SSSIs/ large Limestone Pavement Orders and a NNR. Some of these spill over into fringes of 12a which also has patchy designation of SSSIs along rivers and grassland plus RIGGS near Nateby.  Designations virtually absent across 12b except a few SSSIs along main rivers, a few RIGGS. Also very limited across 12c except small Limestone Pavement Orderss near Greystoke, RIGGS and SSSI	Internationally important limestone pavements, upland heathland and acid grassland predominate in 12d. Limestone grassland present where limestone outcrops (12a,c,d, 12b occasional) species rich springs and flushes(12a,c,d). Parts notable for species rich hay meadows and broad roadside verges (12a,c). Stands of upland ash woodland often along gills and river valleys (12a, 12b occasional, 12c) many small rivers and becks support otter and crayfish. Some interest in disused quarries eg great crested newts (12b). Wood pasture and veteran trees in Greystoke Park (12c).	
Geology and Geomorphology Important exposures of carboniferous limestone.  LPOs and RIGGS as described above	Till and fluvio-glacial deposits exposed along Scandal Beck provide key evidence in Quaternary stratigraphy. Glacial erratic boulders of pink Shap Granite east of Shap (12d).	

### LANDSCAPE TYPE 12: HIGHER LIMESTONE

# **Capacity Statement**

Overall the Higher Limestone landscape is judged to have **low/moderate** capacity to accommodate turbine development. This reflects moderate/high sensitivity overall, moderate/high landscape value recognised by LoCl designation in most areas and strong geological, ecological and historical interests. Acceptability is affected by localised geographical variations in the degree to which limestone characteristics are exhibited and wealth of historic features.

A key limiting factor is the open character of this type whereby any development is likely to be widely visible with only localised containment by relief or trees. This is liable to exacerbate potential problems of over dominance and intrusion relative to historic villages, and prospects from tourist routes and viewpoints both within this type and from the nearby fells of national landscape importance. Whilst there is some localised intrusion from modern developments, especially around the M6 corridor, this landscape type is largely unspoilt. Therefore protection of uncluttered and distinctive landmark skylines and a sense of remoteness or quietness are also major issues. Most parts are also rich in visible historic remains which are vulnerable in terms of both their scale and character.

Core areas that exhibit distinctive limestone features such as limestone pavements, scars and historic field patterns and others with parkland and ancient woodland are vulnerable because of their scenic richness and harmony. However there are some blander fringes, with fewer limestone features, that would not be intimidated by a small or possibly large sized group development especially if visually linked to large scale field patterns or forestry blocks. There is also some potential for positive association with large scale engineered components such as quarries and roads.

Particular sensitivities in relation to the setting of national designations include:

- contribution of the rolling fringe around Ullock to coastal panoramas from the Loweswater Fells and C2C Cycle Route in the Lake District NP
- contribution of the rolling fringe on the edge of the Solway Basin to coastal panoramas from the northern fells of the Lake District NP including outliers such as Binsey, Green How and Faulds Brow, the Uldale and Caldbeck Fells and the Skiddaw massif, framed views out of valley 'gateways' off the A595 and sequential views from the Allerdale Ramble, Cumbria Way and Regional Cycle Route 10
- contribution of the lightly settled limestone foothills, which extend into the LDNP, to the quieter north-eastern fells
- panoramic views across the limestone foothills around Greystoke towards the Vale of Eden from the Carrock/ Bowscale fells and Blencathra massif in the Lake District NP and views back to the imposing steep eastern faces of these fells most notably from the C2C Cycle Route
- views from the Pooley Bridge 'gateway' to the Lake District NP and M6, A592, A66 approaches
- close affinity between limestone commons and farmland around Shap and the Haweswater Lake District NP 'gateway' landscape, with geological, historic and cultural connections
- key views out from the popular High Street range and back towards the Park from the M6, A6, Coast to Coast footpath and W2W Cycle Route (NCR 68)
- contribution to Vale of Eden panoramas from the Stainmore Gap North Pennines AONB 'gateway' most notably from the A66 and W2W Cycle Route (NCR 71) and towards the AONB from the same cycle route (NCR 68), the Settle Carlisle Railway, Pennine Bridleway and A685