European Community Directive on the Conservation of Natural Habitats and of Wild Fauna and Flora (92/43/EEC)

Fourth Report by the United Kingdom under Article 17

on the implementation of the Directive
from January 2013 to December 2018

Supporting documentation for the
conservation status assessment for the habitat:

H6510 - Lowland hay meadows (*Alopecurus pratensis*, *Sanguisorba officinalis*)

WALES

IMPORTANT NOTE - PLEASE READ

- The information in this document is a country-level contribution to the UK Report on the conservation status of this habitat, submitted to the European Commission as part of the 2019 UK Reporting under Article 17 of the EU Habitats Directive.
- The 2019 Article 17 UK Approach document provides details on how this supporting information was used to produce the UK Report.
- The UK Report on the conservation status of this habitat is provided in a separate document.
- The reporting fields and options used are aligned to those set out in the European Commission guidance.
- Explanatory notes (where provided) by the country are included at the end. These provide an audit trail of relevant supporting information.
- Some of the reporting fields have been left blank because either: (i) there was insufficient information to complete the field; (ii) completion of the field was not obligatory; and/or (iii) the field was only relevant at UK-level (sections 10 Future prospects and 11 Conclusions).
- For technical reasons, the country-level future trends for Range, Area covered by habitat and Structure and functions are only available in a separate spreadsheet that contains all the country-level supporting information.
- The country-level reporting information for all habitats and species is also available in spreadsheet format.

Visit the JNCC website, https://jncc.gov.uk/article17, for further information on UK Article 17 reporting.

Report on the main results of the surveillance under Article 17 for Annex I habitat types (Annex D)

NATIONAL LEVEL

1. General information

1.1 Member State	**UK (Wales information only)**
1.2 Habitat code	**6510 - Lowland hay meadows (Alopecurus pratensis, Sanguisorba officinalis)**

2. Maps

2.1 Year or period	2009-2017
2.3 Distribution map	Yes
2.3 Distribution map Method used	Complete survey or a statistically robust estimate
2.4 Additional maps	No

BIOGEOGRAPHICAL LEVEL

3. Biogeographical and marine regions

3.1 Biogeographical or marine region where the habitat occurs	**Atlantic (ATL)**
3.2 Sources of information	Blackstock, T. H., Howe E. A., Stevens, J. P., Burrows, C. R. & Jones, P. S. 2010. Habitats of Wales. A comprehensive field survey 1979-1997. University of Wales Press, Cardiff. Carey, P.D. 2013. Impacts of Climate Change on Terrestrial Habitats and Vegetation Communities of the UK in the 21st Century. Terrestrial Biodiversity climate change report card technical paper. UK National Ecosystem Assessment, UNEPWCMC, Cambridge. CCW. 2005. Supplementary CCW guidance on performance indicators for monitoring designated sites: lowland grasslands. CCW HQ internal report. Guest, D. 2012 (a). Assessing pressures and threats for article 17 reporting based on information in CCW's Actions Database. CCW HQ internal document. Guest, D. 2012 (b). Assessing N deposition as a pressure for Article 17 reporting on habitats. CCW HQ internal document. JNCC. 2004. Common standards monitoring guidance for lowland grasslands.JNCC. Available from: http://jncc.defra.gov.uk/PDF/CSM_lowland_grassland.pdf [Accessed 22/05/2018] Mitchell, R.J., Morecroft, M.D., Acreman, M. et al. 2007. England Biodiversity Strategy - Towards adaptation to climate change. Final Report to Defra for contract CR0327. Natural England and RSPB, 2014. Climate Change Adaptation Manual. NRW. 2015. Natura 2000 Thematic Action Plan. Air pollution: Nitrogen deposition. LIFE Natura 2000 Programme for Wales. NRW. 2017. Actions Database. NRW internal database. NRW. 2018. Briefing Note. Article 17, 2013-18: Pressures, threats and conservation measures guidance. Internal NRW document. Rodwell, J.S. (ed.). 1992. British plant communities. Volume 3. Grasslands and montane communities. Cambridge University Press, Cambridge. Rothero, E., Lake, S. and Gowing, D. (eds). 2016. Floodplain Meadows - Beauty and Utility. A Technical Handbook. Milton Keynes, Floodplain Meadows Partnership. Stevens, J. & Smith, S. 2012. H6510 Lowland hay meadows (Alopecurus pratensis, Sanguisorba officinalis): Wales GIS inventory. CCW HQ dataset. Stevens, D. P., Smith, S. L. N., Blackstock, T. H., Bosanquet, S. D. S. & Stevens, J. P.

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2010. Grasslands of Wales. A survey of lowland species-rich grasslands, 1987-2004. University of Wales Press, Cardiff.
Sutton, R.T. & Dong, B. 2012. Atlantic Ocean influence on a shift in European climate in the 1990s. Nature Geoscience. Doi: 10.1038/ngeo 1595. Available from: http://www.nature.com/ngeo/journal/vaop/ncurrent/abs/ngeo1595.html [Accessed 25/05/2018].

4. Range

4.1 Surface area (in km²)			
4.2 Short-term trend Period			
4.3 Short-term trend Direction	Stable (0)		
4.4 Short-term trend Magnitude	a) Minimum	b) Maximum	
4.5 Short-term trend Method used			
4.6 Long-term trend Period			
4.7 Long-term trend Direction			
4.8 Long-term trend Magnitude	a) Minimum	b) Maximum	
4.9 Long-term trend Method used			
4.10 Favourable reference range	a) Area (km²) b) Operator c) Unknown No d) Method		
4.11 Change and reason for change in surface area of range	No change The change is mainly due to:		
4.12 Additional information			

5. Area covered by habitat

5.1 Year or period	2004-2012		
5.2 Surface area (in km²)	a) Minimum	b) Maximum	c) Best single value 0.107
5.3 Type of estimate	Best estimate		
5.4 Surface area Method used	Complete survey or a statistically robust estimate		
5.5 Short-term trend Period	2007-2018		
5.6 Short-term trend Direction	Unknown (x)		
5.7 Short-term trend Magnitude	a) Minimum	b) Maximum	c) Confidence interval
5.8 Short-term trend Method used	Insufficient or no data available		
5.9 Long-term trend Period	1989-2018		
5.10 Long-term trend Direction	Decreasing (-)		
5.11 Long-term trend Magnitude	a) Minimum	b) Maximum	c) Confidence interval
5.12 Long-term trend Method used	Based mainly on extrapolation from a limited amount of data		
5.13 Favourable reference area	a) Area (km²) b) Operator c) Unknown No d) Method		
5.14 Change and reason for change in surface area of range	No change The change is mainly due to:		

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5.15 Additional information

6. Structure and functions

6.1 Condition of habitat	a) Area in good condition (km²)	Minimum		Maximum	
	b) Area in not-good condition (km²)	Minimum		Maximum	
	c) Area where condition is not known (km²)	Minimum	0.107	Maximum	0.107
6.2 Condition of habitat Method used	Insufficient or no data available				
6.3 Short-term trend of habitat area in good condition Period	2007-2018				
6.4 Short-term trend of habitat area in good condition Direction	Uncertain (u)				
6.5 Short-term trend of habitat area in good condition Method used	Insufficient or no data available				
6.6 Typical species	Has the list of typical species changed in comparison to the previous reporting period?		No		
6.7 Typical species Method used					
6.8 Additional information					

7. Main pressures and threats

7.1 Characterisation of pressures/threats

Pressure	Ranking
Conversion from one type of agricultural land use to another (excluding drainage and burning) (A02)	H
Mowing or cutting of grasslands (A08)	H
Intensive grazing or overgrazing by livestock (A09)	H
Mixed source air pollution, air-borne pollutants (J03)	H
Application of natural fertilisers on agricultural land (A19)	M
Application of synthetic (mineral) fertilisers on agricultural land (A20)	M
Extensive grazing or undergrazing by livestock (A10)	M
Modification of hydrological flow (K04)	M
Physical alteration of water bodies (K05)	M

Threat	Ranking
Conversion from one type of agricultural land use to another (excluding drainage and burning) (A02)	H
Mowing or cutting of grasslands (A08)	H
Intensive grazing or overgrazing by livestock (A09)	H
Mixed source air pollution, air-borne pollutants (J03)	H
Application of natural fertilisers on agricultural land (A19)	M
Application of synthetic (mineral) fertilisers on agricultural land (A20)	M

Extensive grazing or undergrazing by livestock (A10)	M
Modification of hydrological flow (K04)	M
Physical alteration of water bodies (K05)	M
Increases or changes in precipitation due to climate change (N03)	M

7.2 Sources of information

7.3 Additional information

8. Conservation measures

8.1 Status of measures

a) Are measures needed? Yes

b) Indicate the status of measures Measures identified, but none yet taken

8.2 Main purpose of the measures taken

8.3 Location of the measures taken

8.4 Response to the measures

8.5 List of main conservation measures

- Adapt mowing, grazing and other equivalent agricultural activities (CA05)
- Recreate Annex I agricultural habitats (CA07)
- Manage the use of natural fertilisers and chemicals in agricultural (plant and animal) production (CA09)
- Restore habitats impacted by multi-purpose hydrological changes (CJ03)
- Prevent conversion of natural and semi-natural habitats, and habitats of species into agricultural land (CA01)
- Maintain existing extensive agricultural practices and agricultural landscape features (CA03)
- Reduce impact of mixed source pollution (CJ01)
- Reduce impact of multi-purpose hydrological changes (CJ02)

8.6 Additional information

9. Future prospects

9.1 Future prospects of parameters

a) Range

b) Area

c) Structure and functions

9.2 Additional information

10. Conclusions

10.1. Range

10.2. Area

10.3. Specific structure and functions (incl. typical species)

10.4. Future prospects

10.5 Overall assessment of Conservation Status

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10.6 Overall trend in Conservation Status	
10.7 Change and reasons for change in conservation status and conservation status trend	a) Overall assessment of conservation status No change The change is mainly due to: b) Overall trend in conservation status No change The change is mainly due to:
10.8 Additional information	

11. Natura 2000 (pSCIs, SCIs, SACs) coverage for Annex I habitat types

11.1 Surface area of the habitat type inside the pSCIs, SCIs and SACs network (in km² in biogeographical/ marine region)	a) Minimum b) Maximum c) Best single value 0
11.2 Type of estimate	
11.3 Surface area of the habitat type inside the network Method used	
11.4 Short-term trend of habitat area in good condition within the network Direction	
11.5 Short-term trend of habitat area in good condition within network Method used	
11.6 Additional information	

12. Complementary information

12.1 Justification of % thresholds for trends	
12.2 Other relevant information	

Distribution Map

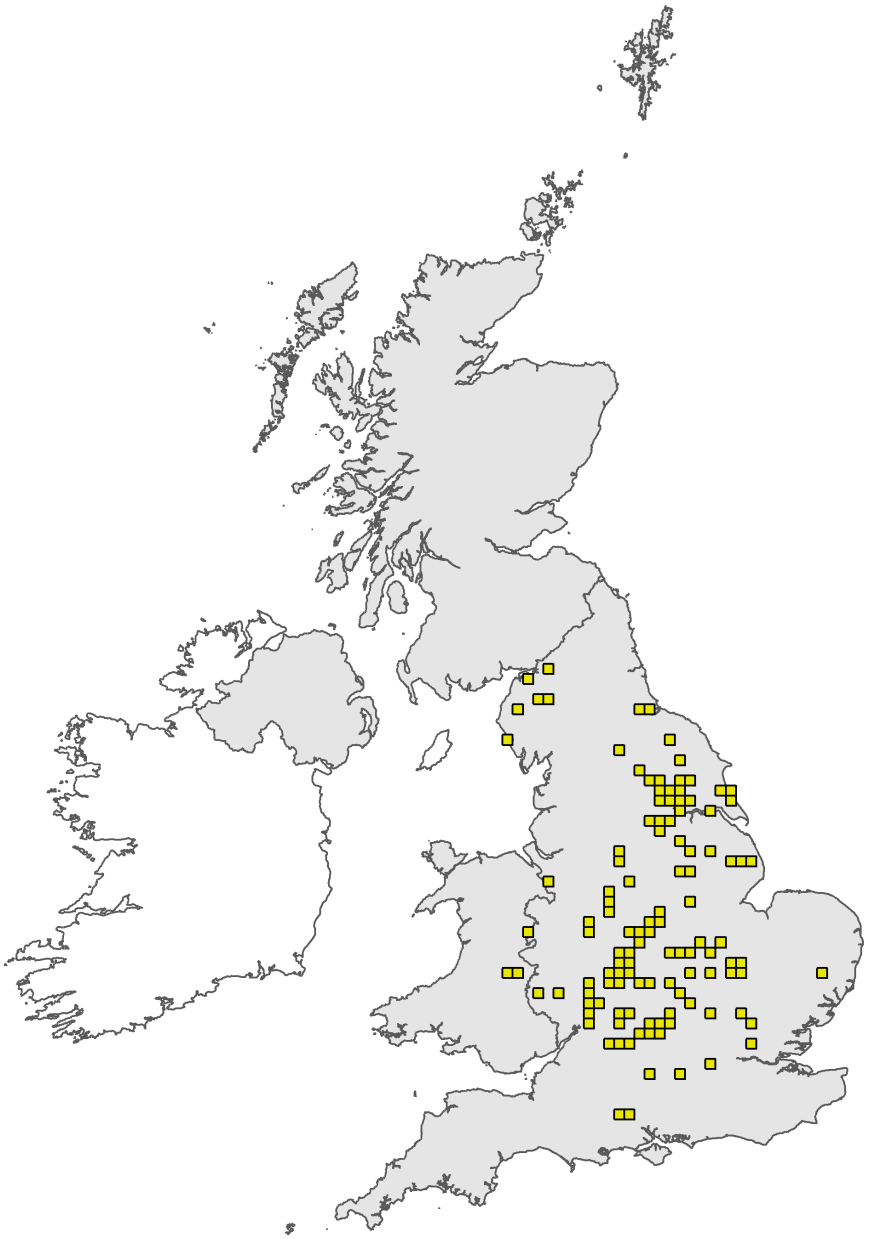

Figure 1: UK distribution map for H6510 - Lowland hay meadows (*Alopecurus pratensis*, *Sanguisorba officinalis*). Coastline boundary derived from the Oil and Gas Authority's OGA and Lloyd's Register SNS Regional Geological Maps (Open Source). Open Government Licence v3 (OGL). Contains data © 2017 Oil and Gas Authority.

The 10km grid square distribution map is based on available habitat records which are considered to be representative of the distribution within the current reporting period. For further details see the 2019 Article17 UK Approach document.

Range Map

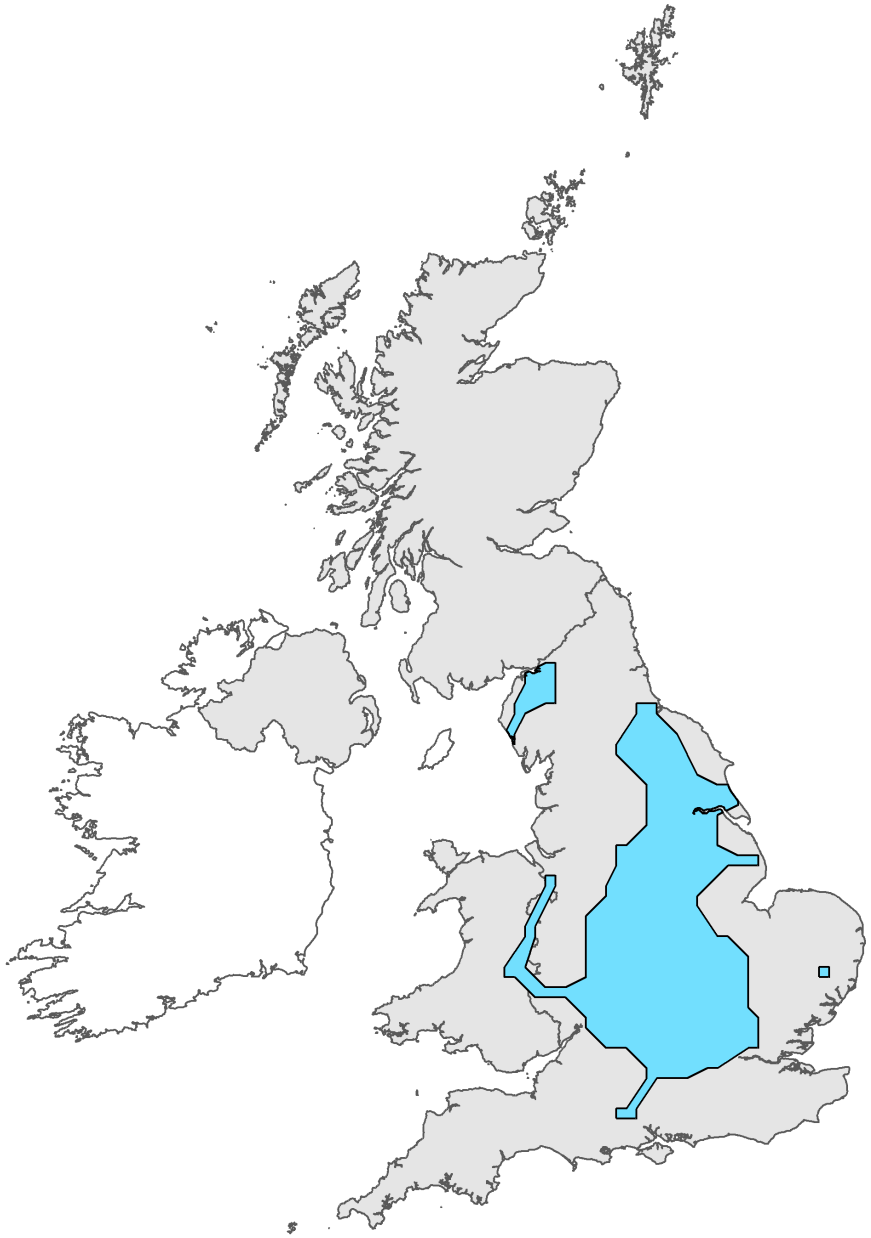

Figure 2: UK range map for H6510 - Lowland hay meadows (*Alopecurus pratensis*, *Sanguisorba officinalis*). Coastline boundary derived from the Oil and Gas Authority's OGA and Lloyd's Register SNS Regional Geological Maps (Open Source). Open Government Licence v3 (OGL). Contains data © 2017 Oil and Gas Authority.

The range map has been produced by applying a bespoke range mapping tool for Article 17 reporting (produced by JNCC) to the 10km grid square distribution map presented in Figure 1. The alpha value for this habitat was 25km. For further details see the 2019 Article 17 UK Approach document.

Explanatory Notes

Habitat code: 6510

Field label	Note
2.3 Distribution map; Method used	The distribution (and extent) of H6510 has been calculated from revisits to sites originally surveyed as part of the Lowland Grassland Survey of Wales 1987-2004 (LGSW; Stevens et al., 2010). The LGSW was a targeted NVC (Rodwell (ed.), 1992) survey focussing on grasslands of high conservation interest in the Welsh lowlands. All LGSW occurrences of NVC MG4, Alopecurus pratensis - Sanguisorba officinalis grassland, were included in the definition of H6510. This source was the basis for the Welsh distribution data in the two previous (2007 & 2013) reporting rounds. Mapped LGSW records for MG4 were incorporated into a polygon-based GIS inventory for the habitat (Stevens & Smith, 2012). The LGSW drew information from the Habitat Survey of Wales (Blackstock et al., 2010), a comprehensive field-by-field survey. The former included any known examples of MG4 which, within a single site, formed at least 0.5 ha, together with smaller stands where they occurred in association with other grasslands of high conservation value. Although the data together are considered to give comprehensive coverage of the region, there are some potential deficiencies (although it is not known if these would affect 10km square distribution), for example: 1. Small isolated stands of the habitat (under 0.5 ha) may not have been specifically targeted for NVC survey. 2. Some examples of H6510 may have been overlooked during Phase 1 survey, for example meadows surveyed after the hay had been cut. 3. A recent re-evaluation of the MG4 community has not been taken into account. This is a slight broadening of the habitat definition, so further examples of the habitat may now fit the definition (Rothero et al., 2016). H6510 is known from just seven survey sites in Wales. These were originally surveyed by the LGSW in the period 1989 to 1999, but all apart from one very small (0.1 ha) example were revisited during the 2009 to 2012 period, confirming the presence of the habitat in the four 10km squares from which it is known in Wales. Three sites have been visited between 2013 and 2017, confirming the continued presence of the habitat in two of the 10km squares during this period. There is therefore a high level of confidence that the distribution map is an accurate representation of actual current distribution, notwithstanding the possible presence of overlooked examples of the habitat and the age of much of the data and information.

Habitat code: 6510 Region code: ATL

Field label	Note
4.3 Short term trend; Direction	The known distribution and linked range of lowland hay meadows H6510 in Wales has remained stable over the last 12 years.
5.1 Year or period	The data used to produce the total area figure are from NVC vegetation maps from the period 2004 to 2012, apart from one site with a tiny area (0.1 ha; less than 1% of the total extent) surveyed in 1995.
5.3 Type of estimate	The current total area is considered to be an accurate reflection of the habitat's presence in the region. The area is based on high quality data from NVC surveys and coverage is comprehensive, although, as described in 1.1.2, some areas of the habitat may have been overlooked or were too small for inclusion in detailed surveys. Although no new sites for the habitat have been detected since 2007 and no sites lost, between 2007 and 2012 the total extent increased due to an actual increase in community area at two sites due to improved habitat management. MG4 is a grassland community of quite specific environmental conditions, and relatively small changes in, for example, hydrology and management can alter vegetation patterning and community spatial distribution within sites. There is no information on change in the habitat extent since 2012.

5.4 Surface area; Method used	The current total area is considered to be an accurate reflection of the habitat's presence in the region. The area is based on high quality data from NVC surveys and coverage is comprehensive, although, as described in 1.1.2, some areas of the habitat may have been overlooked or were too small for inclusion in detailed surveys. Although no new sites for the habitat have been detected since 2007 and no sites lost, between 2007 and 2012 the total extent increased due to an actual increase in community area at two sites due to improved habitat management. MG4 is a grassland community of quite specific environmental conditions, and relatively small changes in, for example, hydrology and management can alter vegetation patterning and community spatial distribution within sites. There is no information on change in the habitat extent since 2012.
5.6 Short term trend; Direction	There is no information on short-term trend during this period.
5.8 Short term trend; Method used	There is no information on short-term trend during this period.
5.12 Long term trend; Method used	The assessment of long-term trend is based on revisits to sites over the 1989 to 2012 period: six out of seven sites have had one or more visit in that period since the baseline survey (only one very small site - 0.1 ha - not revisited). A notable decline in area was recorded at one H6510 site in the period. Although this site partially recovered between 2007 and 2012, overall this has meant a small decrease in total extent of the habitat over the 1989-2012 period. However, there has been no new information since 2012.
5.14 Change and reason for change in surface area	No information/data for 2012-2018.
6.1 Condition of habitat	This is given as unknown as monitoring data is only available for two sites in the 2007-12 period and no sites in the 2012-18 period, and bearing in mind the dynamic nature of this habitat.
6.2 Condition of habitat; Method used	Assessment of structure and function within designated sites (SAC and SSSI) is mainly based on the results of Common Standards Monitoring (CSM; JNCC, 2004; CCW, 2005) visits. However, no monitoring of H6510 has taken place in the 2013-18 period. Two of the six SSSI supporting the habitat in Wales were monitored between 2007 and 2012. The habitat at both sites was considered as unfavourable, due to a paucity of positive indicator species and the presence of negative indicators. However, five of the six SSSI were considered to be under suitable management in 2012 (see 2013 report) and may be now either in favourable condition or recovering.
6.3 Short term trend of habitat area in good condition; Period	Monitoring of the sites with the habitat has only been undertaken as a one-off, so definite trends in condition cannot be given.
6.5 Short term trend of habitat area in good condition; Method used	Two of the six SSSI supporting the habitat in Wales were monitored between 2007 and 2012, but there was no monitoring between 2013-18 and no repeat monitoring has been undertaken. See 6.2

7.1 Characterisation of pressures/ threats

Pressures and threats have been evaluated using the information provided in the previous reporting round (2013) and expert judgement. Data on the habitat were available from NRW's Special Sites Actions Database in 2013, but no updated information from this source was utilized in this reporting round. The Actions Database provides information on 'issues' affecting habitats and species within the protected sites series in Wales and were used to provide a basis for quantifying pressures/threats relating to the habitat, following procedures outlined in NRW, 2018. The protected sites (SSSI) hold 100% of the H6510 Wales resource by area. Pressures: A09 Intensive or overgrazing (HIGH). Grazing was highlighted as an issue in 43% of management units on sites with the habitat as a key feature; grazing type/timing and overgrazing are implicated. K04 - Modification of hydrological flow (MEDIUM) & K05 - Physical alteration of water bodies (Medium). Drainage issues were highlighted for 29% of units. Two of the key (largest) sites for the habitat in Wales have wetted up somewhat in recent years, which could lead to a reduction in the H6510 habitat. There is currently a shortage of understanding regarding the hydrology of individual sites. A08 - Mowing and cutting (HIGH). Insufficient cutting was highlighted for 29% of units. Two of the key sites are affected. J03- Mixed source air pollution, air-borne pollutants (HIGH). On a GIS system, the area of the habitat was overlaid onto Nitrogen deposition data at 5 km resolution (2013-15 data): exceedance of the Critical Load (at 20kg N/ha/yr) was then calculated as being across 58% of the habitat. A02 - Conversion of agricultural habitat into another type of agricultural habitat (HIGH). A02 has been added on the basis of expert judgment, to reflect the longstanding losses of this habitat to agricultural improvement. These losses have left only isolated remnant fragments of the habitat with extremely limited ecological connectivity. A19 - Application of natural fertilisers on agricultural land fertilisation & A20 - Application of synthetic (mineral) fertilisers (both MEDIUM). Fertiliser was highlighted as an issue for 14% units and is the suspected cause of the loss of habitat at one site in the long-term period. A10 - Extensive grazing or undergrazing by livestock. Under grazing including the absence of aftermath grazing following the hay cut in meadows has been an issue on some sites. N02 - Droughts and decreases in precipitation due to climate change (LOW). Climate change predictions for the UK indicate a trend for hotter drier summers (and the linked increase in water usage) and altered rainfall patterns (Natural England & RSPB, 2014). These changes may lead to shifts in botanical composition favouring species characteristic of drier conditions and potentially leading to shifts in community from MG4 to MG8 (Carey, 2013). Some of these changes to the UK's climate are already being seen and are likely to be putting stress on the habitat and its typical species, but in the absence of clear evidence of current impacts it is assessed as only a LOW pressure. N03 - Increases or changes in precipitation due to climate change (LOW). Climate change is also expected to lead to wetter winters and more frequent extreme events such as flooding. Extended flooding particularly where it occurs outside the autumn/winter period has the potential to drive changes in species composition favouring swamp and inundation communities over H6510. More frequent flooding also risks increased deposition of nitrogen and phosphorus and a higher risk of pollution (Natural England & RSPB, 2014). Some of these changes to the UK's climate are already being seen and are likely to be putting stress on the habitat and its typical species, but in the absence of clear evidence of current impacts it is assessed as only a LOW pressure I04 - Problematic native species (LOW). Although not highlighted in the 'Actions Database', spread of Filipendula ulmaria and Carex acutiformis is a local issue, largely related to insufficient cutting and drainage issues. Threats: Threats were mostly assessed in a similar way to pressures, again based on the analysis of outputs from NRW' Actions Database undertaken for the 2013 Article 17 report. However, issues in the Actions Database which had been 'completed' or were 'underway' were not included in the assessment of threats. All of the pressures identified above were considered (on the basis of expert judgment) to be ongoing and the majority were given the same ranking as threats on the basis of the analysis. The following threats

were given additional consideration: J03 - Mixed source air pollution, air-borne pollutants. Despite modest projected reductions in the overall deposition rates for atmospheric nitrogen in Wales, air pollution (J03) is expected to remain a High pressure (threat) to the habitat. N02 - Droughts and decreases in precipitation due to climate change; N03 - Increases or changes in precipitation due to climate change Climate change impacts, N02 and N03, are expected to become more marked over the medium to long-term and the threat level for both these categories is considered to be MEDIUM. A06 - Abandonment of grassland management; B01 - Afforestation; and F01 - Conversion from other land uses to housing, settlement or recreational areas: A06, A14, B01 and F01 were identified as low but not insignificant threats to the habitat on the basis of expert judgement. In the absence of a management agreement statutory protection does not guarantee positive grassland management and abandonment of the few remaining sites (A06) remains a risk. Afforestation (B01) and development (F01) do not represent a significant risk to current areas of habitat, but either if inappropriately sited may limit the opportunities for the wider restoration that will be required if this habitat is to be restored to Favourable Conservation Status.

8.5 List of main conservation measures	The majority of the most important measures required to mitigate ongoing threats to the habitat and to restore it to Favourable Conservation Status in Wales have been identified but not yet taken. Statutory protection of existing areas of habitat is good, with all known examples held within the SSSI series. The majority (5 out of 6) of these sites were considered to be under suitable management in 2012 (NRW, 2013), with data from NRWs Actions Database indicating that 'appropriate conservation management' was in place on 57% of SSSI management units containing the habitat. However, given the limited extent and highly fragmented nature of the remaining sites there is a need to expand the habitat to sites outside the SSSI network to improve the resilience of the habitat to the various ongoing pressures and threats affecting it. The habitat is specifically identified in Glastir agri-environment prescriptions, but a lack of focussed restoration work was highlighted in the 2013 Article 17 report (NRW, 2013). CA01 Prevent conversion of natural and semi-natural habitats into agricultural land; CA09 Manage the use of natural fertilisers and chemicals in agricultural production: Statutory site protection has been shown to act as an effective mechanism in preventing conversion into agricultural land (CA01) and preventing or limiting fertiliser and chemical usage (CA09) (e.g. Stevens et al., 2010; Ridding et al. 2017). CA05 Adapt mowing, grazing and other equivalent agricultural activities; CI05 Management of problematic native species; and CJ02 Reduce impact of multi-purpose hydrological changes: Management agreements on protected sites also provide control of grazing and mowing (CA05) and provide a mechanism for preventing the spread of problematic native species (CI05) and dealing with local drainage issues (CJ02). CJ01 Reduce impact of mixed source pollution: Emissions of atmospheric pollutants (CJ01), notably reactive nitrogen are controlled by a range of national regulations and local controls, most notably the revised National Emission Ceilings Directive (NECD) and linked actions under agri-environment measures, Site Nitrogen Action Plans (SNAPs) and planning controls. The emission reductions required to meet the revised NECD, and other national measures, will reduce total nitrogen deposition and therefore the magnitude and area of critical load exceedance. However, widespread exceedance is expected to continue over the next 12 years and additional measures to further reduce deposition rates and mitigate the impacts of both past (cumulative) and ongoing exceedance of critical loads will be required. CA07 Recreate Annex I agricultural habitats; and CJ03 Restore habitats impacted by multi-purpose hydrological changes: Restoring the habitat to Favourable Conservation Status in Wales will also require the restoration of sites (CA07) outside the protected sites series, in order to mitigate the impacts of past losses and to build the resilience of the habitat as a whole. The Glastir agri-environment scheme, provides a mechanism for habitat restoration/recreation, but more extensive restoration is likely to also require the re-instatement of more traditional/natural hydrological regimes within welsh floodplains (CJ03) and much more work is required in this area.

9.1 Future prospects of parameters	9.1a Future prospects of -range. Future trend: overall stable Given the statutory protection and largely suitable management of the remaining stands of this habitat (see narrative under section 8.5) there is unlikely to be any change in the range for this habitat over the next 12 years, although the small size and patchy distribution of remaining stands does make the habitat vulnerable to range changes if local losses occur. 9.1b Future prospects of -area The overall trend in the extent of H6510 over the next 12 years is difficult to predict with any confidence. All known examples in Wales are protected within the SSSI series and the bulk of the area is considered to be under suitable management, suggesting a degree of stability. However, the habitat is known to be highly susceptible to changes in hydrology (notably the extent, duration and timing of flooding) and both positive and negative fluctuations in the extent of the habitat within the SSSI series are known to have occurred in recent years. 9.1c Future prospects of -structure and function There is limited information available on the current condition and recent trends in the structure and functions of this habitat at its remaining Welsh stations. Despite the inclusion of 100% of the resource in the SSSI series and generally positive conservation management, several ongoing pressures and threats to the habitat remain and are not fully mitigated by existing or planned conservation measures.
11.1 Surface area of the habitat type inside the pSCIs, SCIs and SACs network	H6510 is not a recognised feature on any Welsh SAC and no known stands are present within the N2K series.