Irish Vegetation Classification (IVC)

www.biodiversityireland.ie/ivc

Community Synopsis

Scientific name	*Agrostis stolonifera – Festuca rubra – Carex arenaria* duneland
Common name	Creeping Bent – Red Fescue – Sand Sedge duneland
Community code	DU3C

Vegetation

In this rather species-poor dune grassland community, *Agrostis stolonifera* and *Festuca rubra* are the top constant species, but typically neither dominates. Alongside them can usually be found *Trifolium repens*, *Taraxacum officinale* agg., *Poa pratensis/humilis* and *Carex arenaria*. *Juncus articulatus* and *Plantago lanceolata* are frequent, as is *Plantago coronopus*, an indicator of trampled open habitats.

Ecology

This community represents a transition between the drier *Festuca rubra* dune grasslands and the more humid communities with *Agrostis stolonifera* found in dune slacks, some machair and coastal fens. The community probably occurs on sandy mor-soils with some inundation.

Sub-communities

No sub-communities are described.

Similar communities

Agrostis stolonifera is a scarce species in the dunelands of group DU2 in which *Festuca rubra* is so prominent, but is a constant here. This community lacks the *Salix repens* of community DU3A and the hydrophilic species of DU3B. It is close to the DU3D *Festuca rubra – Bellis perennis* duneland, but in that assemblage, *Bellis perennis*, *Carex flacca* and *Prunella vulgaris* are much more frequent.

Records and distribution

Number of records (all)

Clearly assigned:	62
Transitional:	33
Total:	95

Number of records (mapped)

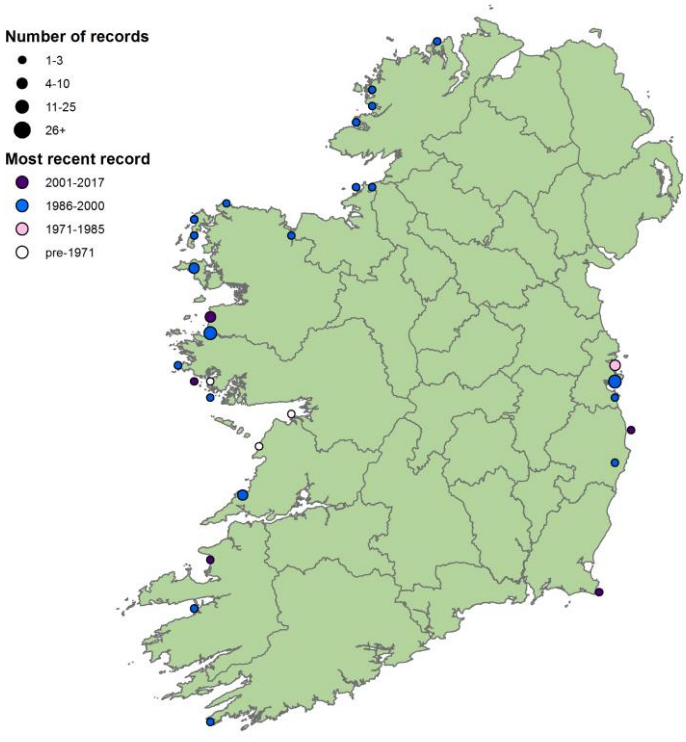
2001-2017:	6
1986-2000:	46
1971-1985:	40
Pre-1971:	3
Total:	95

Number of hectads (most recent records)

2001-2017:	5
1986-2000:	20
1971-1985	2
Pre-1971:	3
Total:	30

Number of hectads (all mapped records)

2001-2017:	5
1986-2000:	20
1971-1985	5
Pre-1971:	3



Synoptic table (*n* = 55)

Species	Frequency (from I-V)	Cover min (med) max	Species	Frequency (from I-V)	Cover min (med) max
Agrostis stolonifera	V	1-(4)-8	*Linum catharticum*	I	2-(3)-7
Festuca rubra	V	2-(3)-6	*Rhytidiadelphus squarrosus*	I	2-(3)-7
Trifolium repens	IV	2-(3)-8	*Cirsium vulgare*	I	1-(2)-3
Taraxacum officinale agg.	IV	+-(2)-3	*Hypochaeris radicata*	I	+-(2)-5
Poa pratensis/humilis	IV	2-(3)-7	*Homalothecium lutescens*	I	1-(3)-7
Carex arenaria	IV	2-(3)-9	*Senecio jacobaea*	I	2-(2)-3
Juncus articulatus	III	2-(3)-7	*Ranunculus repens*	I	2-(3)-4
Plantago lanceolata	III	1-(2)-5	*Poa annua*	I	2-(2)-5
Plantago coronopus	III	2-(3)-7	*Ammophila arenaria*	I	2-(2)-2
Leontodon saxatilis	II	+-(2)-5	*Brachythecium albicans*	I	2-(3)-3
Potentilla anserina	II	+-(3)-8	*Calliergonella cuspidata*	I	2-(4)-7
Bellis perennis	II	1-(3)-5	*Carex flacca*	I	2-(5)-7
Lotus corniculatus	II	1-(3)-5	*Catapodium marinum*	I	2-(3)-3
Cerastium diffusum	II	+-(2)-3	*Galium verum*	I	+-(2)-5
Sagina nodosa	II	2-(3)-7	*Lolium perenne*	I	2-(4)-8
Cerastium fontanum	II	2-(2)-3	*Pteridium aquilinum*	I	7-(8)-10
Glaux maritima	II	2-(3)-5	*Syntrichia ruraliformis*	I	2-(3)-3
Elytrigia juncea	I	2-(3)-4	*Trifolium arvense*	I	2-(2)-5
Rumex crispus	I	1-(2)-3	*Trifolium dubium*	I	2-(2)-3
Brachythecium rutabulum	I	+-(2)-4	*Urtica dioica*	I	+-(2)-4

Affinities

GHI: CD5 Dune slacks / CD6 Machair

ZM: CM Molinio-Arrhenatheretea (72.2%)

EUNIS: B1.83 Dune-slack fens / B1.9 Machair

NVC: SD8a *Festuca rubra – Galium verum* fixed dune community typical sub-community (52.7%), but also MG11c *Festuca rubra – Agrostis stolonifera – Potentilla anserina* grassland *Honckenya peploides* sub-community (52.2%)

Annex I: 2190 Dune slacks / *21A0 Machair

Proxy environmental data

Light: 7.6 Reaction: 6.2 Wetness: 5.5 Fertility: 4.6 Salinity: 1.1

Conservation value

Most examples of this vegetation probably correspond to the EU HD Annex I habitat 2190 Dune slacks or (on the northwest coast) the priority habitat *21A0 Machair.

Management

This dune grassland is often grazed by livestock and rabbits, and overgrazing or undergrazing can be a problem, as can disturbance due to recreational activities in popular coastal areas.

Key references

Beckers, A., Brock, T., Klerkx, J. (1976) A vegetation study of some parts of Dooaghtry, Co. Mayo, Republic of Ireland. (unpublished). National Parks and Wildlife Service, Dublin.

Gaynor, K. (2007) Flora and vegetation of Irish sand dune systems. (Ph.D. thesis). University College Dublin.

Crawford, I., Bleasdale, A., Conaghan, J. (1996) Biomar survey of Irish machair sites 1996. Volume 2: Plant communities. (unpublished). National Parks and Wildlife Service, Dublin.

Synopsis version: V1.0 **Synopsis date:** November 2019 **Synopsis author(s):** P.M. Perrin