

Llyn Morwynion Pipeline  
Archaeological Assessment (G1394)

Report No. 206

Gwynedd Archaeological Trust  
Ymddiriedolaeth Archaeologol Gwynedd

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## Archaeological Assessment (G1394)

prepared for Dwr Cymru/Welsh Water

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# **LLYN MORWYNION PIPELINE (G1394)**

## **ARCHAEOLOGICAL ASSESSMENT**

### **1. INTRODUCTION**

Welsh Water are proposing to construct a pipeline east of Llyn Morwynion, which will convey water from the Afon Gam to Llyn Morwynion, all in the civil parish of Ffestiniog in the county of Gwynedd. The pipeline will start at SH75214246 and will finish at SH74194243.

Gwynedd Archaeological Trust (Contracts Section) was commissioned by Welsh Water to carry out this assessment in accordance with a brief prepared by Gwynedd Archaeological Planning Service acting as the Archaeological Curator.

### **2. ASSESSMENT BRIEF**

A report was requested from Gwynedd Archaeological Trust, assessing the likely archaeological impact of the proposed pipeline and suggesting mitigatory measures.

The basic requirement was for a desk-top survey and field search of the proposed area in order to assess the impact of the proposals on the archaeological and heritage features within the area concerned. The importance and condition of known archaeological remains were to be assessed and areas of archaeological potential and new sites to be identified. Measures to mitigate the effects of the proposed pipeline on the archaeological resource were to be suggested.

Gwynedd Archaeological Trust's proposals for fulfilling these requirements were, briefly, as follows:

- a) to identify and record the cultural heritage of the area to be affected by the proposals
- b) to evaluate the importance of what was identified (both as a cultural landscape and as the individual items which make up that landscape); and
- c) to recommend ways in which damage to the cultural heritage can be avoided or minimised.

### **3. METHODS AND TECHNIQUES**

#### **3.1 Desk-top Study**

Consultation of maps, computer records, written records and reference works, which make up the Sites and Monuments Record, was undertaken at Gwynedd Archaeological Trust. Records (including early Ordnance Survey maps and reference works - see bibliography) were consulted in the County archives at Dolgellau. Aerial photographs were inspected at the offices of the Countryside Council for Wales.

#### **3.2 Field Search**

This was undertaken on 14 May 1995 by two members of Trust staff. The whole of the proposed area was walked. Conditions were good for fieldwork, and light and visibility were good.

Sites identified were marked on copies of 1:2500 OS maps as accurately as possible without

surveying. Forms were filled in assessing each site, and detailed notes made of the more important. Photographs were taken of the potential sites identified.

### 3.3 Report

All available information was collated, and transferred onto a map at a scale of 1:2500 for convenience. The sites were then assessed and allocated to the categories listed below. These are intended to give an idea of the importance of the site and the level of response likely to be required; descriptions of the sites and specific recommendations for further evaluation or mitigatory measures, as appropriate, are given in the relevant sections of this report.

In some cases, further investigation may result in sites being moved into different categories. The criteria used for allocating sites to categories are based on those used by the Secretary of State when considering ancient monuments for scheduling; these are set out in Annexe 3 to Planning Policy Guidance 16 (Wales): Archaeology and Planning.

### 3.4 Categories

The following categories were used to define the importance of the archaeological resource.

#### *Category A - Sites of national importance.*

Scheduled Ancient Monuments, Listed Buildings and sites of schedulable or listable quality, *i.e.* those which would meet the requirements for scheduling (ancient monuments) or listing (buildings) or both.

Sites which are scheduled or listed have legal protection, and it is recommended that all Category A sites remain preserved and protected *in situ*.

#### *Category B - Sites of regional or county importance.*

Sites which would not fulfil the criteria for scheduling or listing, but which are nevertheless of particular importance within the region.

Preservation *in situ* is the preferred option for Category B sites, but if damage or destruction cannot be avoided, appropriate detailed recording might be an acceptable alternative.

#### *Category C - Sites of district or local importance.*

Sites which are not of sufficient importance to justify a recommendation for preservation if threatened.

Category C sites nevertheless merit adequate recording in advance of damage or destruction.

#### *Category D - Minor and damaged sites.*

Sites which are of minor importance or so badly damaged that too little remains to justify their inclusion in a higher category.

For Category D sites, rapid recording, either in advance or during destruction, should be sufficient.

#### *Category E - Sites needing further investigation.*

Sites whose importance is as yet undetermined and which will require further work before they can be allocated to categories A - D are temporarily placed in this category, with specific recommendations for further evaluation. By the end of the assessment there should be no sites remaining in this category.

### 3.5 Definition of Impact

The impact is defined as *none, slight, likely or considerable* as follows:

*None:*

There is no construction impact on this particular site.

*Slight:*

This has generally been used where the impact is marginal and would not by the nature of the site cause irreversible damage to the remainder of the feature, *e.g.* part of a trackway or field bank.

*Likely:*

In some instances the site in question would not fall within the area to be directly affected by the proposed pipeline, but would fall within the construction area and therefore may, subject to its nature, be removed or damaged.

*Considerable:*

The total removal of a feature or its partial removal which would effectively destroy the remainder of the site.

## **4. ARCHAEOLOGICAL FINDINGS AND RECOMMENDATIONS**

### **4.1 Introduction**

Archive material consulted during the desk-top study provided dating evidence for known sites and maps of successive dates allowed an appreciation of the development of the landscape. The tithe map coverage of the area was poor but Ordnance Survey coverage was good.

The area of the proposed pipeline lies in the east of the civil parish of Ffestiniog in the county of Gwynedd. The parish of Ffestiniog formerly lay in the commote of Ardudwy and the cantref of Uwch-Artro in the county of Meirionnydd.

### **4.2 The Archaeological Background**

#### *4.2.1 Prehistoric (up to 48AD)*

Above the north-west shore of Llyn Morwynion at SH73704253 are a series of small 3 to 4m square platforms, possibly the site of huts, rebuilt as sheepfolds. Others have been identified at SH73724270 and 73804250 (Crew 1985). At Bryn y Castell (SH728429), a hill-fort occupied into the Roman period, there is abundant evidence of iron-smelting (Crew 1980-1985), but no remains of the period are recorded within the immediate area of the survey.

#### *4.2.2 Roman (48AD - 400AD)*

To the west of the site the present road from Llan Ffestiniog to Manod up Cwm Teigl may follow the Roman road from Bryn y Gefeliau, between Bettws y Coed and Capel Curig, to Tomen y Mur. No Roman sites or finds have been recorded within the immediate area of the survey (RCAHMC).

#### *4.2.3 Medieval and Early Modern (400AD - 1800AD)*

The area features in the medieval Welsh *Mabinogion* tale *Math vab Mathonwy*, where the name Llyn Morwynion (Maidens' Lake) is explained as the place where Blodeuwedd's women were drowned as they fled from Gwydion and his warband (*Mabinogion* 62). No archaeology from this period, however, has previously been recorded within the area of the survey.

#### *4.2.4 Modern and Industrial (1800 - present day)*

The land in the area of the proposed pipeline had belonged to the Crown since the Act of

Union, but as an unenclosed sheepwalk was habitually used by the local landlords, who directed their tenants to graze their sheep there. The tithe map and assessment of 1842 confirms that by this stage the crown had conceded to the landowners (Dolgellau Record Office tithe and schedule, parish of Ffestiniog parcels 99-108).

The road to Ysbyty Ifan and Penmachno from Pont yr Afon Gam was built c. 1808 as a replacement for the ancient route over Bwlch Carreg y Fran and Cwm Teigl (Hyde Hall figs 14 and 15, pp. 136-7). It made possible some small scale quarrying ventures which would otherwise have been defeated by poor transport; Foel Gron quarry (SH744428) was opened by Ellin Williams, who had been prospecting since 1837, and was equipped with a mill at SH747423 and a tramway by 1873 (Richards 149, SQNW 1873 48-50). Groes y Ddwy Afon slate quarry (SH754424) was in production by 1861 and enjoyed a measure of success under the ownership of Messrs Colman, the mustard manufacturers, and then under the management of the colourful Sir Evan Jones, but succumbed in 1953 (Bradley 276, Lewis and Denton 16). Re-opened to provide work for striking quarrymen in 1987, it was then bought by Nationwide Slate Products but has since closed down.

From 1869 Llyn Morwynion was used for domestic supply (Jones 1988 91, 93, 170).

#### *4.2.5 Conclusions*

Much of the area of the proposed assessment is made up of rough grazing at a very high altitude away from any known early lines of communication. Land-use has been very limited at all periods up until the Industrial and Modern.

### **4.3 Existing statutory protection**

No sites or monuments within the area affected have been afforded statutory protection.

### **4.4 Archaeology of the Proposed Development Area.**

#### *4.4.1 Introduction* (Note that the numbers refer to the site numbers in the gazetteer)

The development corridor proposed for the pipelines consists of an area of bleak moorland at approximately 407M above OD.

#### *4.4.2 Gazetteer of Archaeological Sites*

##### **1. Dam SH75214246**

*Category: C    Impact: Considerable*

A dam built to provide hydraulic power to the mill at Groes y Ddwy Afon Quarry, consisting of a stone wall sloped on its outer faced and revetted on its western side. The dam is approximately 2m in cross-section at its base, narrowing to 1m+ across at the top, and is not curved to resist the pressure of the water. A spillway is visible to the west, and fragmentary remains of an iron pipe system immediately to the south of the dam.

The remains of an older dam are apparent 3m upstream, consisting of a stone wall 1.2m high and 1m wide with vertical faces on the west side of the stream only.

On the site of the lake itself, now drained, there are eleven sections of ceramic pipe made by the company of Dennis of Rhuabon, 18" diameter.

*Recommended mitigatory measures: Basic recording consisting of a photographic survey and written description.*



## **2. Platform house SH75084243**

*Category: B Impact: None*

A stone rectangular structure approximately 7m by 4m on a south-facing slope aligned north to south and built up on a stone platform. An entrance is visible on the east side. The wall survives up to three courses high at the south-east corner but otherwise only a single course is visible. At the north end of the east side is a large slab, approximately 1m long and 0.5m high, which appears to have once stood upright, and may have formed the inner face. An area to the east of the structure may have been cultivated.

*Recommended mitigatory measures: The present route of the pipeline makes it unlikely this feature will be affected. The northern fence line for the route corridor should be a minimum of 5m away from the south wall of the hut.*

## **2a. Animal shelter SH75074243**

*Category: B Impact: None*

A small structure, probably related to (2), probably an animal pen. It is constructed of stone walls built into the outcrop, approximately 4m by 2m, aligned north to south, with the east and west drystone walls partly corbelled. The walls survive up to 1m high.

*Recommended mitigatory measures: As for site 2.*

## **3. Water-course SH75084240 to SH74704233**

*Category: D Impact: Considerable.*

A rock-cut water-course approximately 1m wide and 0.75 deep, leading from a take-off point on the Afon Gam at SH75084240 (blocked up with quarry waste) to a holding pond at SH74704233 feeding the Foel Gron quarry mill (4) at SH747423

*Recommended mitigatory measures: Basic recording consisting of a photographic survey and written description.*

## **4. Slate mill SH747423**

*Category: D Impact: None*

The site of a mill for sawing slate from Foel Gron quarry. The building has been removed, but the site is marked by a number of sawn slate blocks.

*Recommended mitigatory measures: None.*

## **5. Roadway SH74654231**

*Category: D Impact: Considerable.*

The course of a roadway running westward from the Ysbytty to Ffestiniog Road is visible at this point. The road was engineered, rather than it being a simple track, but it is difficult to see what purpose it served, unless it was built to help with the construction of Llyn Morwynion.

*Recommended mitigatory measures: Basic recording consisting of a photographic survey and written description.*

## **6. Houses SH74584234**

*Category: C Impact: None.*

The remains of two houses close to the lake, now visible as low walls, approximately 10m by 3m internally. The walls, which were constructed of large stone blocks, survive to a height of 1m to 1.5m. Bricks are visible in the collapse. Aligned east to west, there is a possible

entrance on the western wall.

*Recommended mitigatory measures: None.*

## 5. SUMMARY AND RECOMMENDATIONS

Six sites were noted which either will be affected by the proposed line or are in the immediate vicinity. One site (2 and 2a), a house of medieval or early post-medieval date with a related structure, are considered to be of regional importance, and that the pipeline is constructed to avoid them. The remainder of the sites are of industrial date, of which the dam, the leat and the trackway will be affected by the construction of the pipeline. Basic recording consisting of a photographic record and a written description is recommended for these sites.

Because of the existence of prehistoric and medieval sites as described within the introduction it is recommended that a watching brief is carried out along the length of the route immediately following the top-soil strip.

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