



TREE CONDITION REPORT

Land adjacent to 27A Bryn Catwg, Neath

Abstract

Tree condition survey carried out on behalf of Mr & Mrs L. Greaves, prepared by Christopher
Matts of Cadno Contracting & Consultancy

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Instruction: To carry out a tree condition survey of all trees located alongside the property known as 27A Bryn Catwg, Neath which are adjacent to public rights of way and/or neighbouring properties and services making necessary recommendations for subsequent work and priority timescale.

The target area identified for the tree condition survey has been set as the neighbouring properties adjoining the land holding of 27A Bryn Catwg including the associated Public Right of Way which transects the woodland and property boundary for its entirety (app. 2.1)

Site Description

Area of semi natural ancient woodland (approx. 2.7 acres or thereabouts) located to the south west of the property known as 27A Bryn Catwg with observations recorded on trees in close proximity to neighbouring houses to the south and south east.

The woodland is predominantly an Oak/Birch composition with occasional Cherry, Ash and Beech with understorey of Holly and coarse vegetation including bramble and bracken. The site is located on the edge of a semi-rural/urban setting on rocky and in places shallow soils with moderate to steep inclines in places, which also show signs of historic activity including coal mining and construction. The woodland boundary with Bryn Catwg neighbouring properties is predominantly wire fencing with evidence of garden waste heaped for the majority of the boundary. The majority of the trees observed are mature status and are protected by a Tree preservation order under the Town and Country Planning Act 1971 and subsequent Forestry Act 1967. This protection covers the woodland to the north of 16 and 29 Bryn Catwg and protects the standing trees and their future regeneration. Trees which are deemed dead dangerous or dying are exempt from this scheduling, but tree work deemed unnecessary or extended beyond 'making safe' should be retained or application for removal or change must be made to the relevant local planning authority. All other areas of the woodland are covered as part of the Forestry Act 1967 regulations and limitations.

Methodology: Trees surveyed according to tree inspector's professional duty as outlined in the LANTRA accredited Professional Tree Inspection. All trees surveyed have been done so to record only those trees which show signs of defect or poor condition known as 'negative recording' to woodland environment in which the survey has taken place. Trees have been surveyed during winter months at client's instruction with observations of structural condition taken and signs of decay aided with assistance of sounding hammer and probe.

The visual tree inspection has been carried out upon each tree deemed within the target area and carried out in three stages¹:

1. Visual Inspection of the Tree looking for signs of vitality and/or defects. If no defects recorded and vitality signs are good, the inspection for that tree is concluded.
2. If signs of defect are suspected and symptoms are present, the defect is then either confirmed present or absent through thorough examination.
3. If a defect is confirmed and cause for concern, the defect will be measured and remaining strength of the tree assessed.

Summary: The site is located on the edge of a semi-rural/urban setting on rocky and in places shallow soils with moderate to steep inclines in places. Evidence of mining activity can be found to the south eastern location on site. Much of the woodland is dominated by one or two species with a dominance of Turkey Oak in places, which signify material change and composition during the woodlands past history.

Some remedial work, as outlined in the tree condition survey, should be undertaken during the timescales outlined in the report. Much of this work would include removing trees with signs of defect along the immediate property boundary along with removal of hazards which are likely to occur during 5 year re-inspection period.

Impacts upon the woodland are varied and include compaction through regular passing of pedestrians along the PROW and damage to root plates during construction phases over the last 30 to 40 years or so. Additional impacts upon the woodland are from planted conifer species in the immediate area around 27A Bryn Catwg which are currently being removed. This will allow the native broadleaf and planted broadleaf species to develop in a more structured way without increased risk of collapse if removed at a later date.

Household and garden debris can be found along the property boundary with the adjacent housing estate. This garden debris can introduce fungal diseases including Honey fungus to the woodland and also makes assessment of the trees root plate condition difficult due to volumes of materials placed at the base of trees on site. In addition, historical pruning along the property boundary over subsequent years has impacted upon the tree form meaning the dynamic structure of the tree has adapted to compensate for branch removal through cutting.

Findings:

Please review Appendix 'Tree Report – 27A Bryn Catwg'. Here the individual tree condition survey has been assessed and described with a series of recommendations listed for any appropriately trained and qualified arboriculturalist to work to. All tree works should be carried out in accordance with British Standard BS3998: 2010 'Tree Work Recommendations'

All necessary works should be risk assessed before the activity takes place and be appropriately insured.

References:

C.Matteck, 1994 – *Body Language of trees* p.196

David Lonsdale, 1999 - *Principles of Tree Hazard Assessment & Management*

BS 3998 Recommendations for Tree Work, 1989

RG Stouts & TG Winter, 1994 – *Diagnosis of ill health in trees*

Glossary of Terms

Compartmentalisation: The confinement of disease, decay or other dysfunction within an anatomically discrete region of plant tissue, due to passive and/or active defences operating at the boundaries of the affected region.

Compression strength: The ability of a material or structure to resist failure when subjected to compressive loading; measurable in trees with special drilling devices.

Compressive loading: Mechanical loading which exerts a positive pressure; the opposite to tensile loading.

Condition: An indication of the physiological vitality of the tree. Where the term 'condition' is used in a report, it should not be taken as an indication of the stability of the tree.

Crown/Canopy: The main foliage bearing section of the tree, these terms are interchangeable.

Crown lifting: removal of limbs and small branches to a specified height above ground level.

Dbh – Diameter at breast height: This is a measure of the Trees diameter of the main stem taken at 1.5 or 'breast height', enabling the measurement of the trees volume to be obtained.

Deadwood: Branch or stem wood bearing no live tissues. Retention of deadwood provides valuable habitat for a wide range of species and seldom represents a threat to the health of the tree. Removal of deadwood can result in the ingress of decay to otherwise sound tissues and climbing operations to access deadwood can cause significant damage to a tree. Removal of deadwood is generally recommended only where it represents an unacceptable level of hazard.

Hazard: Something with the potential to cause harm, for example a tree with a recognised defect

Primary branch: A major branch, generally having a basal diameter greater than 0.25 x stem diameter.

Root protection area (RPA): An area of ground surrounding a tree that contains sufficient rooting volume to ensure the tree's survival. Calculated with reference to BS5837 (2005).

Risk: The probability that harm will actually be caused to persons or property by the trees with defect

Secondary branch: A branch, generally having a basal diameter of less than 0.25 x stem diameter.

Stem: The main arterial trunk joining the root system to the canopy structure

Targets: In tree risk assessment (with slight misuse of normal meaning) persons or property or other things of value which might be harmed by mechanical failure of the tree or by objects falling from it. Where no property exists or people cannot go, there can be no target.

Understorey: A layer of vegetation beneath the main canopy of woodland or forest or plants forming this.

Wind throw: The blowing over of a tree at its roots.

Priority for Works

Immediate / immediate	These works should be carried out immediately. The surveyor should contact the Council and inform them of the concerns so that the Council can arrange for the works to be carried out without delay. Works in this category relate to trees that are imminently about to fail and that the failure of the tree / part is more likely than not to cause significant harm or damage.
High / 3 months	These works should be carried out within 3 months from the identification of the works. The surveyor should contact the Council and inform them of the concerns so that the Council can arrange for the works to be carried out within the month. Works in this category relate to trees that are likely to fail and that the failure of the tree / part is likely to cause significant harm or damage.
Medium / 6 months	These works should be carried out within 6 months from the identification of the works. There is no need to contact the Council in relation to these works other than through the normal downloading of the data collected. Works in this category should include works that are necessary for the safe use of the site or adjacent properties and land, for instance crown lifting to clear for access. These works may also relate to good arboricultural practice, for instance formative pruning or clearance of a property.
Low / 1 year	These works should be carried out within 1 year from the identification of the works. There is no need to contact the Council in relation to these works other than through the normal downloading of the data collected. Works in this category should include works that are necessary for the safe use of the site or adjacent properties and land, for instance where it is anticipated that the tree growth will become an issue before the next cyclic of inspections. These works may also relate to good arboricultural practice, for instance formative pruning or preventative clearance of a property. It is anticipated that these works may not always be possible to complete within the year.

Tree Report - 27a Bryn Catwg

Date: 1 23/04/2020

Tree No.	Species	Height (m)	Dbh	Age Class	N	E	S	W	Condition	Recommendations	Specification	Work Priority	Identification
T1.	Turkey Oak (Quercus cerris)	23	2000mm+	Mature	4	6	6	5	Poor - Tree contains approximately 25% deadwood within crown area and major deadwood limb on south eastern corner from fork at 2m which includes extensive decay. Tree's position is within close proximity to former rock hole to on south west corner with base of the tree deformed from previous wounding and/or historical damage.	Due to nature of species recommendation includes a crown reduction: Dismantle the tree to 10 metres/main fork of main stem and retain as standing dead, include veteranising cuts as outlined in section 4.6.2 of 'Ancient and other veteran trees: further guidance on management' ISBN 978-0-904853-09-4 to create coronet feature and allow controlled fracture cutting.	BS 3998 clause 7.7	3	Orange Paint on stem
T2	Downy Birch (betula pubescens)	18	300mm	Mature	0	2	3	0	Fair - Tree has strong vitality with good leaf coverage and less than 25% deadwood within crown but has a barned wire inclusion from a former boundary fence at 1m above ground level. Main stem extends over party boundary with lean towards no 18 Bryn Catwg and is alongside other D.Birch which have been removed due to poor condition and safety risk in 2019. Evidence of ground movement can be observed but would require geological surveyer to conclude extent and impact.	Dismantle to ground due to risk of main stem snapping across party boundary in strong winds and physical lean towards neighbouring properties.	BS 3998 clause 12.2	3	Orange Paint on stem
T3	Turkey Oak (Quercus cerris)	18	380mm	Middle Aged	1	2	0	0	Very Poor - Semi mature Turkey Oak which has extensive deadwood within crown area and observed 50% leaf coverage loss. Tree is within falling distance of neighbouring property boundaries and Public Right of way on western side of stem.	Dismantle to 10m or fell into woodland behind and stack arisings in windrow not more than 1m high with logs over brash. Care must be used to avoid damage to other trees within the proximity including young Beech tree establishing within target area on south side of main stem. Main stem can be 'veteranised'	BS 3998 clause 12.2 and App. C.4 extreme crown reduction and topping	2	Orange Paint on stem

Work Priority Score		
1	Immediate	Works that require immediate attention to make safe
2	High	Works required within 30 days. Tree shows signs of defect which are likely to cause harm to persons or property.
3	Moderate	Works required within 6 months. Tree work can be carried out anytime within this period but are a lower priority than those at 30 days.
4	Low	Works required within 12 months. Tree has defects which require attention to aid retention beyond 5 year period.
5	None	

Appendix 1.0 Key to Tree Survey Report

No.	Tree Number		
Species	Species of the Tree observed.		
Height	Measured in metres		
Stem ϕ (Dbh)	Stem diameter at 1.5m or 'diameter at breast height' following normal forestry conventions or immediately above the root flare for multiple stemmed species.		
Height of crown	Height in metres of clearance of tree above nearest ground level.		
Branch spread	Branch spread in metres at four cardinal points to derive accurate representation of the crown		
Age Class	Y	Young	i.e. a tree in its first third of lifespan
	MA	Middle Aged	i.e. a tree in its second third of lifespan
	M	Mature	i.e. a tree in its final third of its lifespan
	VM	Very Mature	i.e. a tree in its final third of its lifespan and showing signs of decline including hollow stem
Condition	Good		Full healthy canopy but could be showing some signs of suppressed branches or physical damage. A tree which is anticipated to require little or no tree works within a 10 year period.
	Fair		Slightly reduced canopy and/or leaf cover. Signs of minor deadwood or isolated major deadwood. A tree that requires work to remove defects to retain form so that it may be anticipated that the tree will be retained for over 5 year period.
	Poor		Overall sparse leaf coverage and extensive deadwood. Tree has significant proportion of defects and requires significant works to aid its retention and/or where the retention of the tree is not anticipated beyond 5 years.
	Very Poor		The tree has large areas of defects including decay and/or requires extensive work to aid its retention over 5 years.

Appendix 1.0 -
Annotated
Photo of
Trees to be
removed to
rear of No. 18
Bryn Catwg

T1: Mature Turkey Oak
with deadwood branch
on eastern corner of
main stem at 2m

T2: Semi Mature Downy
Birch with Barbed wire
inclusion at 1m

T3: Turkey Oak - Extensive
deadwood within crown.



Appendix 2.1 - Photo of
Downy Birch (T2) leaning
across property
boundary towards no.
18 Bryn Catwg



Appendix 3.0 Tree Location Map -Trees at 27a Bryn Catwg to be removed

