Quantified Tree Risk Assessment
A Non-technical Summary

Tree safety management is about limiting the risk of harm from tree failure while maintaining the benefits conferred by trees. Although it may seem counter-intuitive, the condition of trees should not necessarily be the first consideration. Instead, tree managers should first take account of the usage of the land on and around which the trees stand, and this in turn will inform the process of assessing the trees.

The Quantified Tree Risk Assessment (QTRA) method applies established and accepted risk management principles to tree safety management. Firstly, the targets (people and property) onto which trees could fail are assessed and quantified, thus enabling tree managers to determine whether they need to assess trees and to what degree of rigour an assessment or inspection of the trees is required. Where necessary, a tree or branch is then considered in terms of both its size (potential impact) and probability of failure. Values derived from the assessment of these three components (target, size and probability of failure) are combined to calculate a risk of harm within the coming year. The year is simply a convenient time-frame over which to measure the risk and does not in itself infer that the risk should be re-assessed annually; rather the frequency of re-assessment should be informed by the level of risk and the characteristics of the tree population and land-use.

The quantification of risk is not the only consideration when managing tree safety. The financial cost of reducing the risk and the potential loss of the many benefits from trees should be accounted for when making risk management decisions. By quantifying the risks we can more readily assess this balance.

The method moves the management of tree safety away from labelling trees as either 'safe' or 'unsafe' and requiring definitive statements of tree safety from either tree surveyors or tree managers. Instead, QTRA quantifies the risk of harm from tree failure in a way that enables tree managers to account for the various costs and benefits of risk reduction and operate to pre-determined risk thresholds. Using a traffic light system of colour coding the risk from trees, we have simplified the decision making process for tree owners and tree managers. For more information on the QTRA method and the decision making process, download the QTRA Practice Note, which is available in eight languages and seventeen country-specific versions.

Green	**Broadly Acceptable**	Do nothing.
Yellow	**Tolerable**	Do nothing, unless you expect the risk to increase significantly before the next assessment. The benefits conferred by the tree will usually outweigh the risk.
Amber	**Tolerable**	Reduce the risk unless there is broad stakeholder agreement to retain it.
Red	**Unacceptable**	Reduce the risk.

Quantified Tree Risk Assessment Ltd.
9 Lowe Street
Macclesfield
Cheshire
SK11 7NJ
United Kingdom

www.qtra.co.uk