Walsall Council

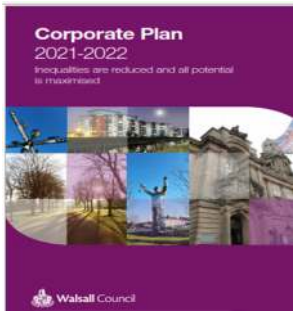
HIGHWAY MAINTENANCE MANAGEMENT PLAN

Contents:

1 – Introduction.

The highway and its associated infrastructure is by far the most valuable asset managed and maintained by the Council, with an estimated 'As New' replacement value of approximately £1.5 Billion. Walsall manages a highway network of approx 845km, the adoption of asset management principles provides an effective way to manage its assets. Asset management planning is promoted by the Department for Transport (DfT) and is encouraged within the UK Roads Liaison Group 'Well-Managed Highway Infrastructure: A Code of Practice' (The Code). The Code sets out 36 Recommendations as key drivers for effective Highway Maintenance Management Planning.

This Highway Maintenance Management Plan is one of three core documents that form an integrated approach for delivering planned, routine and reactive maintenance services across Walsall's highway infrastructure assets. It aligns with the Council's Highway Asset Management Policy, sets out the Council's objectives for infrastructure management to describe how these compliment the Corporate Plan, visions, objectives and priorities. It is designed to be read in conjunction with the Council's Highways Asset Management Strategy, which details the approach taken by the Council for developing and delivering asset and highway maintenance management planning practices:



Highway Asset Management Policy

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Highway Asset Management Strategy

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Highway Maintenance Management Plan

Together, this suite of documents outline how the Council will fulfil its statutory and regulatory duties as Highway Authority by developing management practices that aim to maximise Network Safety, Serviceability and Sustainability, within a customer services framework. It provides a structure for the Council's Financial Management processes for delivering highway infrastructure maintenance activities. In developing this approach the Council has captured long standing institutional knowledge and combined this with guidance and support from leading private sector asset management planning consultants and good practice from neighbouring authorities.

"This Highway Maintenance Management Plan provides a reference point for those seeking information on aspects of maintenance policies and procedures, as well as being a resource for officers involved in procurement, provision or administration of the highway maintenance service. It highlights the areas where new initiatives have been introduced; revisions to policy or service provision within a risk based environment."

'Councillor Adrian Andrew – Deputy Leader & Portfolio Holder, Regeneration'.

Walsall's most significant Highway Assets comprise approximately of:

Carriageways	845km
Footways	1,300km
Public Rights of Way	98km
Street Lights	26,000
Road Gulley's	37,500
Traffic Signal Junctions	90
Bridges	120

Key Legislative and Good Practice drivers include:

- Highways Act 1980
- Railways and Transport Safety Act 2003
- Traffic Management Act 2004 & Permit Scheme (England) Regulations 2007
- New Roads and Street Works Act 1991
- Countryside and Rights of Way Act 2000
- Transport Act 2000
- Road Traffic Regulations Act 1988
- Road Traffic Reduction Act 1997
- Flood and Water Management Act 2012
- Traffic Signs Regulations and General Directions 2016
- Railways and Transport Safety Act 2003
- Countryside and Rights of Way Act 2000
- Environmental Protection Act 1990
- Clean Neighbourhoods Act 2005
- Wildlife and Countryside Act 1981
- Health and Safety at Work Act 1974
- Management of Health and Safety at Work Regulations 1999
- Construction Design and Management Regulations (CDM) 2015
- Local Government Act 2003
- Disability Discriminations Act 2005
- Equalities Act 2010
- Criminal Justice and Public Order Act 1994
- Human Rights Act 1998
- Civil Contingencies Act 2004
- Well-Managed Highway Infrastructure: A Code of Practice 2016
- CIPFA Code of Practice on Transport Infrastructure Assets 2013
- HMEP Infrastructure Asset Management Guidance

Walsall's Key Documents that Support Highway Maintenance Management Planning Include:

View the 'Walsall Council Corporate Plan'

View the 'Highway Asset Management Policy'

View the 'Highway Asset Management Strategy'

Highway Services during National Emergencies:

Walsall Council's highway network plays a vital role in supporting front line services to ensure that key workers travel to and from work safely, and deliveries of essential items operate effectively.

It is a necessity that our roads, footpaths and their associated infrastructure remain serviceable and safe for use at all times, especially during periods of crisis or difficulty. There is recognition nationally that Highway Authorities cannot afford to allow their highway infrastructure to deteriorate or cause backlogs of maintenance work to develop into the future.

It is essential that everyone contributing to the maintenance of Walsall's highway asset, works systematically and consistently. For the foreseeable future, Walsall Council will give elevated priority for activities such as:

- Essential road maintenance including pothole repairs and drainage cleansing
- Safety improvements
- Essential planned works including resurfacing and surface dressing which need to be completed during the drier months
- Critical junction improvements which will increase capacity.

The approach taken and the document suite developed in support of the delivery of Highway Infrastructure Asset and Maintenance Management Practices, are designed to meet the Code of Practice in the following ways:

Recommendation 1	**Use Of The Code**
The Code, in conjunction with the UKRLG Highway Infrastructure Asset Management Guidance, should be used as the starting point against which to develop, review and formally approve highway infrastructure maintenance policy and to identify and formally approve the nature and extent of any variations.	

Recommendation 2	**Asset Management Framework**
An Asset Management Framework should be developed and endorsed by senior decision makers. All activities outlined in the Framework should be documented.	

Recommendation 3	**Asset Management Policy And Strategy**
An Asset Management Policy and Strategy should be developed and published. These should align with the Corporate Vision and demonstrate the contribution Asset Management makes towards achieving this vision.	

2. Asset Inventory and Network Hierarchies.

Within our Information Governance Policy the core objectives of highway infrastructure maintenance management revolve around Network Safety, Network Serviceability and Customer Service. To serve these objectives the compilation of asset knowledge comprising mainly of inventory, safety and serviceability data is essential.

Highway Authorities have a legal duty to keep a register of streets that are maintainable at public expense and a requirement to maintain information for the purposes of:

- Identifying streets described as traffic sensitive, where work should be avoided at certain times of the day.
- Identifying structures and other features described as special engineering difficulty, requiring consideration when work is planned.
- Identifying reinstatement categories used by statutory undertakers in the reinstatement of their street works.

To support effective asset management planning the Council supplements its register of highways assets with other detailed inventory data defining the scale, nature and use of its assets, this data helps the Council to:

- Monitor and report condition
- Assess the expected life cycles of individual asset groups
- Produce performance data
- Model future maintenance options
- Identify future funding needs and establish works programmes
- Investigate and manage risk
- Report asset valuation
- Optimise cross boundary service provision
- Support industry research and innovation
- Respond to customer enquiries/complaints

Data can be an expensive commodity to collate, maintain and update such that it can be relied upon to support performance reporting and decision making. The Council adopts a pragmatic approach to data management to ensure where practical it can be used for multiple tasks and that its level of sophistication meets needs.

Hierarchy is a significant attribute for most network data, it is defined by function and it forms the foundation of risk based strategies, it is crucial for establishing levels of service for the Council's statutory network management role and fulfilling its co-ordination and regulatory duties.

There is a need to define hierarchies for resilience planning and winter service operations, hierarchy provides a starting point that can be modified to accommodate local operational factors, including across our boundaries with neighbouring authorities, so that reasonable continuity of levels of service can be expected.

Across all asset groups, many hierarchies descend from historically-established or nationally derived forms of classification. Where practical network hierarchies are dynamic and regularly reviewed to cater for changes in network characteristics and functionality. This is to ensure maintenance strategies reflect current use rather than when hierarchies were originally developed and defined.

Table 1 of the Code of Practice identifies a reference point from which to develop local carriageway hierarchies:

Cat	Category	Type/General Description
2	Strategic Route	Trunk & some Principal 'A' class road between primary destinations
3a	Main Distributor	Major Urban Network & Inter Primary Links. Short – medium distance traffic
3b	Secondary Distributor	B & C class roads and some unclassified urban routes carrying bus, HGV & local traffic with frontage access & frequent junctions
4a	Link Road	Roads linking between the Main & Secondary Distributor Network with frontage access & frequent junctions
4b	Local Access	Roads serving very limited number of properties

Table 2 of the Code of Practice identifies a reference point from which to develop local footway hierarchies:

Cat	Category	Type/General Description
1a	Prestige Walking Zones	Very busy areas of towns and cities with high public space and street scene contribution
1	Primary Walking Routes	Busy urban shopping areas and main pedestrian routes
2	Secondary Walking Routes	Medium usage routes through local areas feeding into primary routes, local shopping centres, etc.
3	Link Footways	Linking local access footways through urban areas and busy rural footways
4	Local Access Footways	Footways associated with low usage, short estate roads to the main routes and cul-de-sacs
*	Minor Footways	Little used rural footways serving very limited numbers of properties

The Council's carriageway and footway hierarchies align with the Code reference points, but make no distinction between Local Access Footways and Minor Footways. In addition during all carriageway and footway safety inspections an 'on-site' reality check is carried out by Highway Safety Inspectors to confirm that classification reflects current usage:- variations are applied where risk based judgements confirm the need.

The Council annually invests in data collection for many of its key inventories/systems/processes:

System	Inventories/Asset Coverage
NSG	Register of highways assets
GIS Spatial Mapping	Highway extents; road classification; works history; road signs; high friction surfaces; structures; flood risk zones; PRoW's; cycleways; street lighting/illuminated signs inventory
UKPMS	Carriageway & Footway: SCANNER; CVI; DVI; FNS; Griptester surveys
Mayrise/Alloy	Highway safety inspections; works orders; CRM customer contacts; street works co-ordination
Asset Management eXpert	Highway structures and bridge inspections
Kaarbontech	Road gully inventory and maintenance
Ezytreev	Trees inventory

The Councils accompanying Highways Asset Management Strategy outlines the inventories held by the Council for its significant infrastructure assets along with their associated confidence levels. The Council collects asset inventories to quantify the extent, scope, scale, and nature of highway assets and uses this data to supplement other Highway Asset Management Strategy modules to share data both internally and externally. This includes hierarchy consistency, reporting asset performance and informing risk investment models.

All highway inventory data held by the council is managed in accordance with appropriate data protection protocols, licensing and data sharing/processing agreements, and a corporate data management competency training package is also set in place.

Typical highways Inventory data includes:
*(Based on most recent asset inventory data available – Includes Dual Carriageways).

Asset Group	Asset Type	Length	Area
Carriageways	A Roads	98km	984,000 m^2
	B Roads	41km	334,000m^2
	C Roads	11 km	105,000m^2
	U Roads	694km	4,300,000m^2

Asset Group	Asset Type	Length	Area
Footways	Prestige/Primary Zones	19km	61,000m^2
	Secondary Zones	211km	535,000m^2
	Link/Access Zones	1,075km	2,264,000m^2

Asset Group	Asset Type	Number	Area
Bridges	Concrete, Single Span	27	3,564m^2
	Brick Arch, Single Span	8	1,092m^2
	Steel Deck, Single Span	25	3,750m^2
	Concrete, Medium Span	16	4,896m^2
	Concrete, Large/Extra Large Span	5	1,920m^2
	Pedestrian/Cycle, Single Span	36	1,440m^2

Asset Group	Asset Type	Number
Street Lighting	Columns	25,897
	High Mast Columns	4
	Wall Mounted Units	124
	Feeder Pillars	186
	Illuminated Bollards	733
	Externally Illuminated Signs	2,628
	Beacon Poles	159

Asset Group	Asset Type	Number
Urban Traffic Control	Puffin Crossing	108
	Pelican Crossing	9
	Toucan Crossing	20
	Wig Wags	3
	VMS	15
	CCTV	20
	Traffic Signals with Pedestrian Facilities	60
	Traffic Signals without Pedestrian Facilities	27

The approach developed for the collection and management of 'Highway Asset Inventory and Network Hierarchies' is designed to meet the Code in the following ways:

Recommendation 5	Consistency With Other Authorities
To ensure that users' reasonable expectations for consistency are taken into account, the approach of other local and strategic highway and transport authorities, especially those with integrated or adjoining networks, should be considered when developing highway infrastructure maintenance policies.	

Recommendation 9	Network Inventory
A detailed inventory or register of highways assets, together with information on their scale, nature and use, should be maintained. The nature and extent of inventory collected should be fit for purpose and meet business needs. Where data or information held is considered sensitive, this should be managed in a security-minded way.	

Recommendation 10	Asset Data Management
The quality, currency, appropriateness and completeness of all data supporting asset management should be regularly reviewed. An asset register should be maintained that stores, manages and reports all relevant asset data.	

Recommendation 11	Asset Management Systems
Asset management systems should be sustainable and able to support the information required to enable asset management. Systems should be accessible to relevant staff and, where appropriate, support the provision of information for stakeholders.	

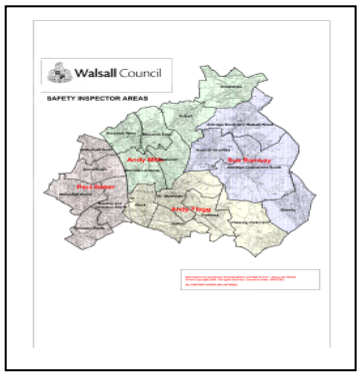
Recommendation 12	Network Hierarchy
A network hierarchy, or a series of related hierarchies, should be defined which include all elements of the highway network, including carriageways, footways, cycle routes, structures, lighting and rights of way. The hierarchy should take into account current and expected use, resilience, and local economic and social factors such as industry, schools, hospitals and similar, as well as the desirability of continuity and of a consistent approach for walking and cycling.	

3. Asset Inspections/Condition Standards.

The Council as highway authority has a duty under the Highways Act 1980 to maintain public highways to an adequate standard of repair. So it is important that inspection and assessment regimes are aligned to the authorities risk management policies to maximise safety for road users and strengthen our ability to repudiate claims and fulfil our requirements with regard to Network Safety, Serviceability and Sustainability.

The following inspections are undertaken to meet the Authority's statutory obligations and mitigate risk:

Highway Safety Inspections.
Highway Safety Inspections are carried out by a team of Highway Safety Inspectors employed by the Council. Their purpose is to identify defects that are likely to create danger or serious inconvenience to users of the network. Inspections are visual & include: carriageways and footways running/walking/cycling surfaces; kerbs; verges; street furniture; signs and road markings; drainage, gullies/ironwork; bollards, guard rails and safety fencing.



Borough & District Centre Inspection Zones

Highway safety inspections are programmed across four geographical zones, these are supplemented with additional frequencies for District Centres: Aldridge; Bloxwich; Brownhills; Darlaston; Walsall and Willenhall. Inspections are normally walked, but driven inspections may also be carried out by two persons where network conditions dictate needs.

Frequencies for inspections are derived from hierarchy established from a network classification review undertaken back in 2014, flexibility to raise/lower frequencies in response to risk based need assessments is built in as required. Where practical carriageways and footways are inspected at the same time. When hierarchies for carriageways and footways conflict, the frequency of inspection will meet the highest frequency required. Hierarchies are subject to an 'on-site' reality check during the course of inspections being undertaken with any necessary amendments/variations applied.

The Highway Safety Inspection manual is published on line, and outlines in detail Walsall's approach to dealing with highway defects and the timescales for response.

'View the 'Highway Safety Inspection Manual'

Walsall's Regime for Carriageway Safety Inspection is:

Feature	Category	Frequency
Roads	Strategic Route	1 Month
	Main Distributor	1 Month
	Secondary Distributor	1 Month
	Link Road	3 Months
	Local Access	1 Year

Walsall's Regime for Footway Safety Inspection is:

Feature	Category	Frequency
Footways	Prestige Area	1 Month
	Primary Walking Route	1 Month
	Secondary Walking Route	3 Months
	Link Footway	6 Months
	Local Access Footway	1 Year

Defects meeting investigatory levels are risk assessed by inspectors using a risk matrix approach (*Inspection frequencies/defect repair times may vary during times of national emergency*):

Risk Matrix				
Probability ⇩ Impact ⇨	**Negligible (1)**	**Low (2)**	**Medium (3)**	**High (4)**
Negligible (1)	**1**	**2**	**3**	**4**
Low (2)	**2**	**4**	**6**	**8**
Medium (3)	**3**	**6**	**9**	**12**
High (4)	**4**	**8**	**12**	**16**

Responses				
Cat 2 Low Risk	**Cat 2 Moderate Risk**	**Cat 2 Medium Risk**	**Cat 1 High Risk Imminent**	**Cat 1 High Risk Immediate**
1 - 3 (6 Months)	3 – 4 (28 days)	4 – 7 (5 days)	8 - 12 (24hrs)	13 – 16 (1hr)

When applying this approach highway safety inspectors will exercise their judgement, discretion and training in deciding whether to record individual defects and in which category to place them. This process adopted triggers the following defect response times:

Defect Risk Category	Description	*Response Time
Cat 1 (High Risk Immediate)	Immediate risk to highway safety - urgent repair is required	1 hour
Cat 1 (High Risk Imminent)	Imminent risk to highway safety - temporary/permanent repair required	24 hours
Cat 2 (Medium Risk)	Defect meets safety inspection manual investigatory level & is likely to become critical in less than 28 days	5 days
Cat 2 (Moderate Risk)	Defect meets safety inspection manual investigatory level & is likely to become safety critical before the next safety inspection or in less than 6 months	28 days
Cat 2 (Low Risk)	Defect meets safety inspection manual investigatory level, unlikely to deteriorate rapidly	6 months

* *(Refer to Highway Safety Inspection Manual for Current Practice).*

All highway safety inspections and any associated defect repairs are routinely recorded and documented within the Councils Alloy system. The data is updated using mobile technology employing real-time logging of defects.

Highway Condition Inspections.

The purpose of these inspections is to collect data so that the Council can monitor highway condition at a strategic network level, measure performance and report asset value. The data collected is used in asset lifecycle planning which supports the compilation of future maintenance programmes.

The specialist nature of highway condition surveys requires Walsall Council to procure the service through the private sector, using consultancies employing accredited:
Survey personnel; survey vehicles; survey collection devices/software; data processing platforms.

The Council undertakes highway condition surveys in accordance with the following network coverages:

Carriageways				
Annual Coverage ⇨ Survey Type ⇩	Principal A Roads	Non Principal B Roads	Non Principal C Roads	Unclassified Roads
SCANNER	50%	50%	50%	N/A
CVI	N/A	N/A	N/A	25%
Griptester	100%	Site Specific	Site Specific	Site Specific

Footways		
Annual Coverage ⇨ Survey Type ⇩	High Amenity Footways	Low Amenity Footways
DVI	50%	N/A
FNS	N/A	25%

The data collected is processed and analysed using the Councils UKPMS pavement management software. It informs the Council regarding asset condition for its long term decision making, enabling trend analysis and informing lifecycle planning and investment modelling activities.

Structural condition surveys undertaken include:

- **SCANNER**
  Machine surveys that collect data on transverse and longitudinal profiles, texture, rutting and cracking of carriageways. They are undertaken using specialist survey vehicles with real time processing for site condition readings.

- **Coarse Visual Inspection**
  CVI inspection surveys carried out from a slow moving vehicle designed to cover large parts of the network on a regular basis by categorising lengths of features having generally consistent defectiveness.

- **Detailed Visual Inspection**
  DVI Inspection surveys carried out on streets that incorporate high amenity footways where more detailed routine inspection is required.

- **Footway Network Survey**
  FNS surveys carried out on streets that incorporate low amenity footways where less detailed routine inspection is required.

Critically, these inspections don't identify individual defects and their risk, instead they gather overall condition data to help support informed decision making around investment needs.

- **Grip Tester**
  Machine survey used to collect skidding resistance data especially for higher risk event situations due to speed, geometry, bends, steep gradients, major junctions and pedestrian crossing locations, mainly on Classified Principal A Roads. The Council analyses this data in line with the West Midlands Skidding Resistance Strategy to associate on-site grip values with accident records. Specialist consultants are engaged for setting and reviewing Investigatory Levels to secure the professional competency skills required.

Service Inspections

This inspection category focuses on whether the network meets the needs of users. It includes inspections for regulatory purposes intended to maintain network availability, reliability and integrity, including:

- **New Roads and Street Works Act 1991**
  Utility companies operate under statutory powers, NRSWA co-ordinates and controls their works. Under Section 72 of NRSWA Highway Authorities are empowered to carry out investigation to check if an undertaker complies with the duties placed upon it for reinstatement of streets. The legislation is supplemented by the Permit Scheme (England) Regulations 2007. Key inspection procedures specifically provided for within the Act include:

Sample Inspections: This involves inspections of a structured random sample of various stages of excavation, reinstatement, and completion.

Defect Inspections: A procedure for dealing with individual reinstatements which do not comply with reinstatement specification, including joint inspections between the Council and utilities undertakers to determine the remedial actions required.

- **Bridge Inspections**
  General bridge inspections are scheduled to be carried out around an approximate two year cycle, although some structures may be subject to more frequent inspections depending on risk, condition, construction or accessibility.

  Principal Bridge Inspections are also carried out as appropriate following occurrences of crash damage and flooding, or on all major structures at six-yearly intervals. Bridge inspections may be undertaken using external consultants via a framework contract where essential competency requirements need to be met.

- **Street Lighting, Illuminated Signs and Bollards**
  As part of Walsall's Public Lighting PFI contract, maintenance of electrical components is carried out by Amey LG Ltd, who undertake: optical inspections; electrical testing; lamp changing at scheduled intervals to coincide with internal inspections and cleaning.

- **Fences and Barriers**
  Inspecting and testing of safety barriers with respect to mounting height, surface protection and structural condition are carried out where road traffic accident damage is suspected or where tensioning of pre-tensioned units is needed.

The approach developed for 'Asset Inspections and Condition Standards' is designed to meet the Code in the following ways:

Recommendation 16	**Inspections**
A risk-based inspection regime, including regular safety inspections, should be developed and implemented for all highway assets.	

Recommendation 17	**Condition Surveys**
An asset condition survey regime, based on asset management needs and any statutory reporting requirements, should be developed and implemented.	

Recommendation 18	**Management Systems and Claims**
Records should be kept of all activities, particularly safety inspections, including the time and nature of any response, and procedures established to ensure efficient management of claims whilst protecting the authority from unjustified or fraudulent claims.	

Recommendation 19	**Defect Repair**
A risk-based defect repair regime should be developed and implemented for all highways assets.	

4. Asset Performance.

The Council has an established Corporate Performance Management Framework, which recognises we are here to support the people of Walsall and all other stakeholders. Activities are undertaken using scarce public funds so investment decisions need to be made from an informed position to generate opportunities for maximising efficiency wherever possible. Performance management frameworks aim to provide clarity, consistency and intelligence led decision making, helping the Council to identify and manage risks and meet corporate visions and objectives. Embedding effective performance management provides:

- Defined and prioritised goals ensuring resources are targeted and allocated effectively.
- Outcomes are more clearly identified for local people.
- Ensures the Council and its partners achieve what they set out to do.
- Establish an evidence base against which to benchmark improved decision making and resource allocation.

For tracking and measuring the delivery of outcomes, the service data compiled must be sufficiently robust to connect frontline services with the strategic objectives of the Council, so that priorities are delivered by taking the actions required to meet the needs of customers. Where data or the review of data relates to 'network safety' specialist consultants shall be engaged whenever competency requirements dictate needs.

The quality and accuracy of data is paramount, especially where it highlights customer needs and shapes the priorities of the Council. Poor quality data could lead to the Council targeting the wrong priorities, skew performance measures and mislead decision making.

Through highways asset management planning the Council aims to identify:

- Where we are and where do we want to be?
- How will we do it?
- How are we doing it?
- How do we need to act differently?

Module D of the Council's Highway Asset Management Strategy – Performance Management, outlines 'targets and measures' for our most significant asset groups, and defines Red, Amber and Green levels of associated risk. This performance dashboard helps to guide the Council by focusing its strategy and investment into areas that most positively impact upon the highest level drivers, where greatest risk may lie.

The Council uses nationally recognised, industry acknowledged, and accredited forms of data collection for its performance monitoring measures to establish the condition of key infrastructure assets. This includes outputs from the National Highway & Transportation Survey (NHT) and Customer Quality Care analysis (CQC).
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These Performance monitoring mechanisms help the Council to monitor levels of:

- Resilience on the network
- Vibrant and healthy public realm
- Safe, Serviceable and Sustainable network
- Network accessibility
- Open engagement and communication

The performance data compiled and managed by the Council is periodically reviewed to ensure it achieves the desired robustness and reliability on a number of levels, including:

- Survey instructions to consultants and contractors
- Selection/appointment of inspectors, consultants and contractors
- Training/accreditation for inspectors, consultants, contractors and systems
- Specification of procurement and surveys
- Survey procedures and auditing processes
- Data collection devices and software
- Data processing software
- Maintenance and calibration of survey equipment

Current asset performance monitoring undertaken in support of highway infrastructure management activities by the Council includes:

RCI 130-01	Condition of classified Principal A roads
RCI 130-02	Condition of classified Non Principal B & C roads
BVPI 224b	Condition of unclassified roads
BVPI 187	Condition of high amenity footways
FNS HI	Condition of low amenity footways
DfT	Skidding Resistance survey
DfT	Carriageway work done survey
NHT	Network Public Satisfaction survey
NHT	Customer quality cost survey
APSE	Performance networks road asset management data survey
HISC	Contract Key Performance Indicators (KPI's)
Contact Centre	Complaints monitoring
Risk & Insurance	Public liability claims monitoring
Contractor	Scheme satisfaction monitoring
HAMFIG	West Midlands regional benchmarking
Kaarbontech	Gully cleansing performance dashboard
GIS	Work history, engineering programme inspections, complaints, Public rights of way, cycle tracks
Velocity Patch	Performance dashboard

The Council's Highway Infrastructure Services Contract (HISC) employs a robust set of contract Key Performance Indicators (KPI'S) and Operational Performance Indicators (OPI's) to measure, monitor and manage service delivery, including:

- People, staff and social values
- Planned maintenance scheme satisfaction surveys
- Financial performance
- Health & Safety, environment & recycling
- Structural, preventative, emergency, reactive and cyclical maintenance
- Winter maintenance
- Bridge maintenance
- Major and minor improvements scheme monitoring

The data feeds into the performance management framework and informs highways asset management decisions within a systematic and transparent framework to support our key financial planning decisions using lifecycle modelling predictions wherever practical. It also supports the development of the Council's Highway Asset Management Strategy and associated Maintenance Management Improvement Planning processes.

The approach adopted to measure, monitor and review 'Asset Performance' is designed to meet the Code in the following ways:

Recommendation 26	**Performance Management Framework**
A performance management framework should be developed that is clear and accessible to stakeholders as appropriate and supports the asset management strategy.	

Recommendation 27	**Performance Monitoring**
The performance of the Asset Management Framework should be monitored and reported. It should be reviewed regularly by senior decision makers and when appropriate, improvement actions should be taken.	

Recommendation 28	**Financial Plans**
Financial plans should be prepared for all highway maintenance activities covering short, medium and long term horizons.	

Recommendation 29	**Lifecycle Plans**
Lifecycle planning principles should be used to review the level of funding, support investment decisions and substantiate the need for appropriate and long term investment.	

5. Maintenance Strategies, Programmes and Priorities.

The Council's highway infrastructure management obligations span across a diverse range of asset groups, including: carriageways; footways; street lighting and illuminated bollards; bridges and structures; drainage; street signs; urban traffic control; high friction surfaces; street furniture; barriers and guardrails.

The priorities for respective asset types are most often determined by the outcome of safety inspections, service inspections, or condition surveys, assessed using appropriate risk factors. Any maintenance responses required will normally fall into one of the following categories:

- **Programmed Maintenance**
  Providing forward works programmes using lifecycles and condition data as part of a prioritisation matrix where practical, such as structural or preventative maintenance schemes.
- **Planned Maintenance**
  Attending to defects and other less urgent matters that may benefit from further planning leading to permanent repair, such as localised patching repairs.
- **Emergency/Reactive Maintenance**
  Attending to defects and other safety matters that require urgent action, such as a missing road gully cover. The response provided shall depend upon operational practicalities which may include fencing off and guarding, or repairs of a temporary nature where required.
- **Routine/Cyclical Maintenance**
  Providing locally defined levels of service, such as gully cleansing.
- **Regulatory Functions**
  Relating to occupation, interference or obstruction of the network, such as statutory undertakers street works co-ordination.
- **Winter Services**
  Providing locally defined levels of service, such as precautionary salting runs or the filling of grit bins.

The Council's Corporate Budget Process, and Treasury Management & Investment Strategy identify high level budget proposals. The Council then determines how the funds available to it for highway maintenance should be allocated across many different asset groups and then select the most appropriate and beneficial maintenance activities for each asset type. The treatments and timing of intervention are determined by identifying the most efficient means of meeting the required performance targets.

Modules G and H of the Highway Asset Management Strategy outline the approach for the development of maintenance strategies. Compilation of Forward Works Programmes are based primarily around an understanding of current asset condition, associated risks, lifecycle needs, and the likely social/commercial impact of our works.

Developed strategies are reviewed to accommodate, where possible, new treatment options, materials or technological developments that come onto the market. Where financial resources are limited, potential maintenance schemes may need to be prioritised for places within Forward Works Programmes.

Programmed Maintenance.
The Council's largest maintenance funding commitment is directed to its carriageway and footway structural resurfacing programmes, which are compiled using a Cabinet endorsed programme prioritisation tool. This considers a range of risk related factors, including:

- Local priority
- Commercial impact
- Social impact
- Safety inspector priority
- Partnership management priority
- Road classification
- Road hierarchy
- Traffic sensitivity
- UKPMS rankings
- Engineering Inspection ranking
- Reactive repairs
- Risk & insurance claims
- Public service requests, defect reports, enquiries
- Delayed/deferred schemes
- Co-ordinated schemes – including cross asset requirements
- Estate Management Schemes
- Recommended treatment year

Prioritisation is reviewed annually to provide a costed long term programme by scoring each scheme which can then be used to evaluate needs for potential maintenance locations, with sites posing greatest risks being considered for treatment. From this, the annual carriageway and footway maintenance programmes are developed and published on the Council's website.

To facilitate consideration of both the current and future maintenance costs associated with the delivery of planned maintenance schemes, the Council has developed and embedded a robust Highway Maintainability Audit procedure.

Preventative Maintenance.
Lifecycle planning modelling and industry best practice guidance such as the 'HMEP Potholes Review - Prevention and a Better Cure', confirm that intervening at the right time will significantly reduce the amount of potholes forming and will help to prevent bigger and more costly problems occurring later.

Prudent management of carriageway and footway assets requires the use of cost effective preventative maintenance treatments such as micro surfacing and surface dressing. Although not always initially popular with local residents or highway users, preventative treatments combined with targeted planned patching works form an essential maintenance strategy for prolonging the life of carriageway and footway surfaces throughout the boroughs highway network.

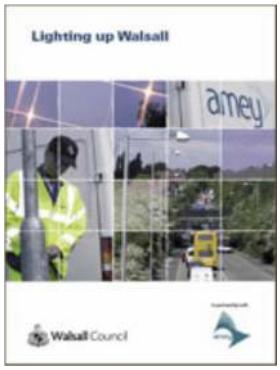
The Council develops flexible and responsive preventative maintenance programmes annually, using processed condition data and Engineering Inspections, which can be integrated within targeted estates management strategies.

Emergency/Reactive Maintenance.

Emergency and Reactive Maintenance includes rectifying Category 1 and Category 2 defects and other matters requiring attention, arising from inspections or public complaints. Such defects often involve a degree of urgency, with some having the potential for serious consequences for which priorities will almost exclusively be determined on the basis of risk to determine the operational practicalities for:

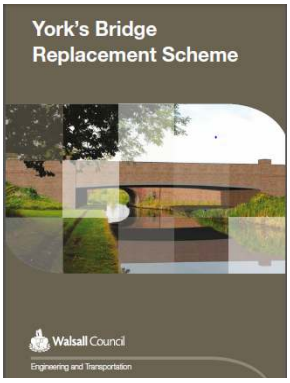
- Sign, guard or protect to make safe
- Provide an initial temporary repair
- Provide a permanent repair

For other key asset groups such as street lighting and illuminated signs/bollards, the Council has secured the services of Amey LG Ltd through a Private Finance Initiative (PFI), which started in April 2002 and will operate for a 26 year period. The main aim of the PFI was to replace ageing lighting stock, improve road safety, and reduce the fear of crime.



View the 'Walsall Council Street Lighting Strategy'

All major structures, bridges and culverts are managed in accordance with the recommendations set out in the Design Manual for Roads and Bridges. The Council undertakes principal bridge inspections every six years and general inspections every two years. The current forward works programme considers the findings of structural inspections, and is also influenced by the national transportation emphasis for the primary route network and historical levels of capital funding, which has resulted in the need to impose certain weight restrictions and other interim measures at some locations.



'Information regarding scheme specific bridge replacement works are published on the Councils Roads, Street Lighting and Parking website'.

The approach adopted for the development of 'Maintenance Strategies, Programmes and Priorities' is designed to meet the Code in the following areas:

Recommendation 6	**An Integrated Framework**
The highway network should be considered as an integrated set of assets when developing highway infrastructure maintenance policies.	

Recommendation 13	**Whole Life / Designing For Maintenance**
Authorities should take whole life costs into consideration when assessing options for maintenance, new and improved highway schemes. The future maintenance costs of such new infrastructure are therefore a prime consideration.	

Recommendation 30	**Cross Asset Priorities**
In developing priorities and programmes, consideration should be given to prioritising across asset groups as well as within them.	

Recommendation 31	**Works Programming**
A prioritised forward works programme for a rolling period of three to five years should be developed and updated regularly.	

6. Risk Based Practices.

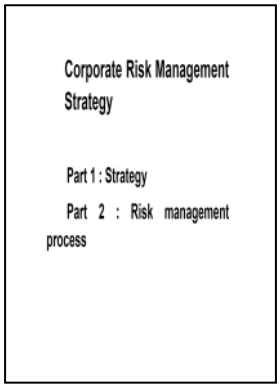
The Code encourages Council's to account for the management of current and future risk associated with highway assets and embed this within its approach to asset management. This ensures that strategic, tactical and operational risks are considered and appropriate mitigation measures implemented.

The Council considers risk management for 'significant' aspects of its highway maintenance management planning, including: procuring services; investment modelling; operations; information management; setting levels of service; resilience; safety and condition inspections; and for determining localised defect repair priorities and establishing forward programmes of work.

Walsall's risk based approach is founded on:

- Aligning the Council's legislative requirements and corporate objectives against the management of risk.
- Recognising risk for the highway service and the likely significance for users.
- Managing inventory to support effective service delivery.
- Establishing flexible hierarchies, levels of service and making cases for funding.
- Investing in staff & consultancy services to secure competency, & monitoring performance to make informed procurement decisions for delivering our service.

Organisationally the Council has developed a Corporate Risk Management Strategy which outlines the governance arrangements set in place for risk management and the processes embedded throughout the Council. All managers within the Council have a role to play in the identification of risks within their own areas of activity and expertise, including: service delivery, project risks, strategy, and the effective management of those risks as part of the Annual Governance Statement process.



Independent assurance and scrutiny of the adequacy of the risk management strategy and processes rests with the Audit Committee. It is the role of the Audit Committee to seek assurance that action is being taken to identify and manage risks effectively and that the strategy and processes that underpin this are appropriate and fit for purpose.

Risk Management Policy Statement
"It is the policy of the Council to identify, analyse and economically control the risks that threaten the objectives (both strategic and operational) or assets of the Council".

The aims in achieving this are to:-

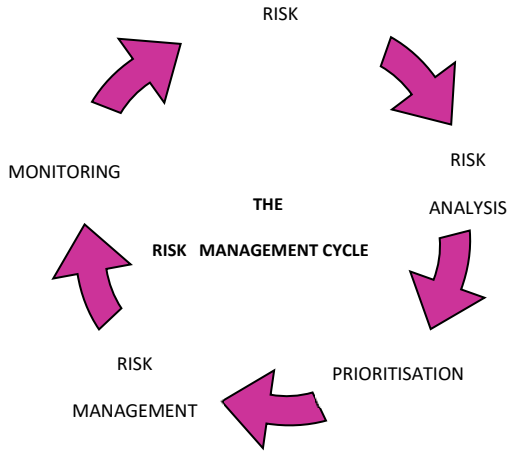
- Ensure that service delivery is not disrupted
- Provide a safe environment for those who come into contact with the Council
- Take all reasonable steps in the management of risk
- Protect the assets of the Council

When implementing this, the policy requires the Council to:-

- Identify significant risks that threaten the objectives or assets of the Council
- Evaluate the consequences of the identified risks on the Council in terms of their likelihood and impact
- Take reasonable steps to reduce the likelihood and/or impact of the identified risks. Where it is not economically prudent to control identified risks further, we will: Retain the risk where it is economically advantageous to do so or transfer the risk to a third party via contract or an insurance arrangement
- Establish a corporate risk management strategy and process
- Provide training, guidance and support to Officers and Members to help them understand and implement the policy in a consistent manner

A key goal for risk management is to allow business risks to be taken within a structured and transparent framework that encourages the taking of appropriate risks. The risk management process is the tool that is used to demonstrate that risks have been considered in an appropriate, structured and consistent manner. The Council recognises that there are risks associated with a large number of activities and that it has a duty to manage these risks in a balanced, structured and cost effective manner.

The Council's highway Asset Management Strategy identifies the key components of risk processes relating to the highway infrastructure by identifying the framework that engineers have developed for: communication, consultation, and monitoring mechanisms, using the principles outlined within the Corporate Risk Management Cycle.



Walsall Council Risk Management Cycle.

During the development of its Asset Management Strategy the Council has worked jointly with leading experts of asset management planning. As part of this collaboration consultants were commissioned to conduct a maturity assessment of the Council's compliance with the new Code of Practice via a series of workshop to identify any significant gaps in existing practices.

The maturity assessment was used to direct the highways asset management strategy toward greater adoption of risk based planning methodologies. The strategy employs a modular approach that seeks to apply risk focus to the core issues of highway asset management planning, including: highway infrastructure performance management and benchmarking framework's; asset information and competencies strategies; lifecycle planning and investment modelling for optimised maintenance strategies.

This strategic overview is intended to provide the Council's asset managers and custodians of resources with the data required to make informed decisions about the needs of highway assets over the long term, so that the potential impact of significant decisions can be predicted, understood and reviewed.

Risk based decision making supports our approach to highway infrastructure management from the highest strategic and tactical levels through to the individual defects on the ground. It is not practical to eliminate all risk, instead the Council aims to reduce it to acceptable levels and set in place any mitigating actions that may be beneficial to manage it.
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The approach adopted for managing 'Risk Based Practices' is designed to meet the Code in the following areas:

Recommendation 7	**Risk Based Approach**
A risk based approach should be adopted for all aspects of highway infrastructure management, including setting levels of service, inspections, responses, resilience, priorities and programmes.	

Recommendation 8	**Information Management**
Information to support a risk based approach to highway management should be collected, managed and made available in ways that are sustainable, secure, meet any statutory obligations, and, where appropriate, facilitate transparency for network users.	

Recommendation 14	**Risk Management**
The management of current and future risk associated with assets should be embedded within the approach to asset management. Strategic, tactical and operational risks should be included as should appropriate mitigation measures.	

7. Competency.

Highway infrastructure management requires appropriate levels of competency for all activities involved. The Council's approach to staff performance is detailed within its 'Corporate Workforce Strategy 2018-2021 Proud in Growing Together'. It acknowledges that Walsall's residents deserve the very best from their Council, ensuring that the workforce is able to respond to changing local needs, operate with reduced budgets and keep up with changes both nationally and globally.

Competency is a measure of our ability to undertake work effectively, professionally and safely, whilst meeting: legislative; environmental; industrial; technical; procedural and good practice guidance. The Council needs to ensure that it is able to attract and retain the best talent in which to deliver its services and undertake its duties.

View the 'Walsall Council Corporate Workforce Strategy'

Highways Infrastructure Management covers a diverse range of asset groups, including:

- Carriageways and footways
- Drainage and floodwater management
- Street lighting, road signs and road markings
- Bridges and structures
- Urban Traffic Control (UTC)
- Arboriculture maintenance, verges and trees
- Road safety, traffic regulatory functions and street works co-ordination
- Car parks
- Resilience planning and winter maintenance
- Public Rights of Way and cycle ways management

For all staff, competency is a critical factor considered from the initial recruitment stage onwards. Employee specifications and job descriptions are carefully focussed to meet the precise roles, responsibilities and duties required.

Walsall is liaising with its regional highways partners to help develop a common competencies framework for the West Midlands region for the future. Organisationally, the Council provides a web based e-learning and development framework for all staff, offering a suite of training packages designed to ensure that core corporate training competencies are met, including:

- Equality, safety and wellbeing
- Directorate specific training
- Personal development
- ICT skills including GDPR
- Financial systems
- Workplace skills

Engineers possess appropriate levels of formal qualification in line with competence and ethics guidance outlined by The Engineering Council as the UK's regulatory body for the engineering profession, including industry knowledge and practical experience required to enable them to undertake their work professionally, effectively and safely. Depending on service areas this may include:

- BTEC: Level 3 diploma (Built environment–civil engineering); ONC/HNC certificate/diploma in civils related fields
- Certificate/diploma in road safety engineering
- Bachelor's degree in: civils, construction, structural or electrical engineering
- Post graduate degree in engineering related fields, BSc, MSc, PhD
- Membership of professional bodies or institutes, including: ICE; IHT; IHE; IStrucE; ILP.

The Council routinely appraises its employees through 'Annual Performance Conversations' (APC's). These involve annual reviews of performance, exploring barriers or inhibitors to maximising performance, setting individual performance objectives for the year and agreeing personal learning and development plans to support achievement. Budgets are available to fund training initiatives where needs assessments confirm their requirements.

Beyond these Council wide initiatives, competency frameworks support our maintenance management functions by encouraging levels of Proficiency, Experience, Knowledge and Awareness (PEKA):

- Where specialist systems, equipment, technology, skill sets and knowledge are required to deliver certain highway infrastructure management services, private sector consultants may be procured to gain access to specialist competencies that are needed. In such cases the Council will make appropriate checks to ensure that the required competency from consultants is assured through evidence of qualifications, training, accreditations or experience. The Council currently engages consultancy support for work-streams such as highways asset management planning and skidding resistance network definition and accident association.
- For highway safety inspections, the Council ensures that its highway safety inspectors are trained to LANTRA certification standards and have been NRSWA accredited. They are also conversant with risk based decision making methodologies and industry good practice guidance and innovations.

- For network level highway condition surveys the Council requires surveyors to hold valid UKPMS survey accreditation certificates for CVI, DVI and FNS, whilst machine surveys including the setting of Investigatory Levels (I.L's) for skidding shall be subject to TRL, Griptester/SCANNER professional certification.

- Network level carriageway and footway highway condition survey data is collected on site, stored and processed using compliant data collection and data processing software subjected to and passing UKPMS annual health check certification.

- Network classification and hierarchies have been identified through a systematic review process undertaken by experienced specialist pavement management consultants. The Council provided all necessary GIS mapping data appropriate to support classification judgements. Individual street classifications are subject to routine on-site reality checks from highway inspectors as an integral part of the Council's highway safety inspection regime.

- Engineers, transport planners and highway safety inspectors have received Construction Design & Management Regulations 2015 (CDM 2015) training, ranging from general awareness sessions through to client and principal designer roles as appropriate. This has been supplemented with IOSH working safely training to consolidate health and safety awareness for staff delivering highway infrastructure maintenance management activities.

- Relevant politicians, senior managers, asset managers, safety inspectors and general practitioners who are directly involved with delivering highway maintenance management activities recognise the principles of the C.O.P and its recommendations for risk based decision making processes.

- As practical and where the case for funding can be established, the Council shall promote opportunities to appoint trainee engineers under appropriate apprenticeship frameworks, providing funded training opportunities through to graduate engineer and professional institute membership levels. This will remain a tangible measure of the Council's commitment to corporate social responsibility and the support it provides for the youth of our local communities and the civil engineering community in general.

The approach adopted to ensure workplace 'Competency' is designed to meet the Code in the following areas:

Recommendation 15	**Competencies and Training**
The appropriate competency required for asset management should be identified, and training should be provided where necessary.	

8 - Resilience, Extreme Weather and Emergencies.

Resilience as defined by the Cabinet Office is the “ability of a community, services, area or infrastructure to detect, prevent, and if necessary to withstand, handle and recover from disruptive challenges”.

The Council’s highway network is vital to enable the successful operation of the boroughs social and economic activities, so the continued availability and operation of its key routes is essential to keep the borough moving at an acceptable level.

The Transport Resilience Review acknowledges that an economically rational approach should be taken to spending on resilience, ensuring that enough is invested, with the right prioritisation, and avoiding wasteful and economically unjustified expenditure. For this reason there is a need to focus resilience risk assessments on a sub-set of the network which constitutes the resilient network to ensure it provides:

- Connectivity between major communities
- Links to the strategic highway network
- Connectivity across authority boundaries
- Access to emergency facilities including: Fire; Police; Ambulance and Hospitals
- Links to transport interchanges or critical infrastructure
- Principal public transport routes
- Local community facilities

The risk of specific asset failure leading to closure or restriction of the Resilient Network also needs to be considered along with the socio-economic consequences of failure and potential for community severance.

Network Resilience is particularly significant for winter maintenance as highlighted in the Climate Change Risk Assessment (CCRA) and the Governments National Adaption Programme (NAP), which called for Highway Authorities to consider how climate change variables including intense/prolonged rainfall, hotter temperatures and higher wind speeds will impact on highway assets, and the risks associated with these events occurring.

Meteorological forecasts and weather information are critical for the Council’s risk based operational planning responses, these are normally based on colour coded descriptions:

- Yellow – Be aware, there is a small chance of…
- Amber – Be prepared, there is likely to be…
- Red – Take action, there will be…

The Environment Agency has also developed a similar system for flood warnings:

- Flood Alert – Flooding is possible, be prepared…
- Flood Warning – Flooding is expected, immediate action required…
- Severe Flood Warning – Severe flooding, danger to life…

The key information needed to enable people to make informed decisions about how they should travel is made publically available through the council’s communications team whenever and wherever it is required. Consistency of standards and approaches are being

strengthened regionally through the workings of TfWM & the West Midlands Combined Authority with the development of its Key Route Network (KRN).

Precautionary measures taken in areas known to be at high risk of flooding may include:

- Place Fast Response Crew(s) on stand-by, equipped with road closure signs
- Check watercourse trash grids are clear of debris
- Clear any affected watercourses
- Clean any affected road gullies

The Council reviews its responses to severe weather events to identify potential improvements against our severe weather and operational service plans/procedures, using lessons learned and risk based principles.

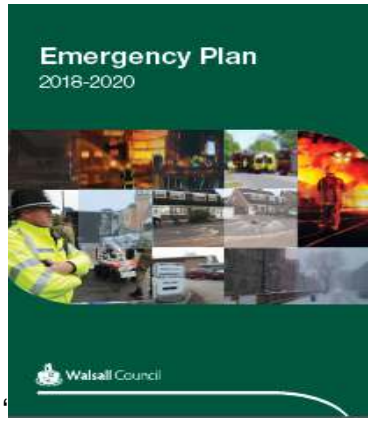
The Resilient Highway Network is published within the Council's Winter Service Operational Plan.

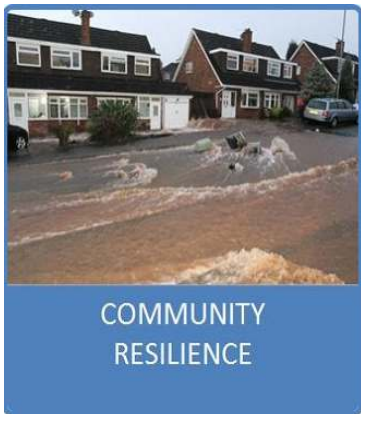
View the 'Walsall Council Winter Service Plan'

'The Plan sets out the approach to: winter policy; resilience standards; meteorological forecasts; precautionary salting runs and decision making'.

Emergency Planning procedures are published in the Council's website:

View the 'Walsall Council Emergency Plan'





The Resilience/Emergency Planning webpage provides detailed information and advice around a range of risk events, including: hot/cold weather, flooding, and communications, it defines Walsall's role as a Category 1 Responder under the Civil Contingencies Act 2004.

The approach adopted for 'Resilience, Extreme Weather and Emergencies' is designed to meet the Code in the following areas:

Recommendation 20	**Resilient Network**
Within the highway network hierarchy a 'Resilient Network' should be identified to which priority is given through maintenance and other measures to maintain economic activity and access to key services during extreme weather.	

Recommendation 21	**Climate Change Adaptation**
The effects of extreme weather events on highway infrastructure assets should be risk assessed and ways to mitigate the impacts of the highest risks identified.	

Recommendation 22	**Drainage Maintenance**
Drainage assets should be maintained in good working order to reduce the threat and scale of flooding. Particular attention should be paid to locations known to be prone to problems, so that drainage systems operate close to their designed efficiency.	

Recommendation 23	**Civil Emergencies And Severe Weather Emergencies Plans**
The role and responsibilities of the Highway Authority in responding to civil emergencies should be defined by the authority's Civil Emergency Plan. A Severe Weather Emergencies Plan should be established in consultation with others, including emergency services, relevant authorities and agencies. It should include operational resource and contingency plans and procedures to enable timely and effective action by the Highway Authority to mitigate the effects of severe weather on the network and provide the best practicable service in the circumstances.	

Recommendation 24	**Communications**
Severe Weather and Civil Emergencies Plans should incorporate a communications plan to ensure that information including weather and flood forecasts are received through agreed channels and that information is disseminated to highway users through a range of media.	

Recommendation 25	**Learning From Events**
Severe Weather and Civil Emergencies Plans should be regularly rehearsed and refined as necessary. The effectiveness of the Plans should be reviewed after actual events and the learning used to develop them as necessary.	

9 – Sustainability & Environment.

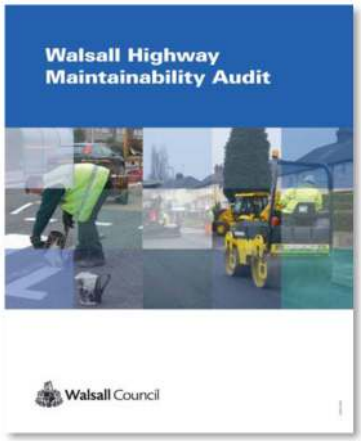
Highway infrastructure maintenance has a significant role to play in achieving a sustainable economy, as reflected in the Governments sustainability agenda. Sustainable construction is about designing and delivering works that meet the needs of the present, without compromising the ability of future generations to meet their own needs.

The DfT publication 'Sustainable Highways: A Short Guide' identifies that for highway maintenance to be delivered sustainably there must be a focus on maximising the use of recycled arising's from existing roads wherever possible. Furthermore, materials, products and treatments for highway infrastructure maintenance should be appraised for environmental impact and for the wider issues of sustainability.

Environmental management strategies need to encourage the consideration of:

- Carbon costs and energy reduction
- Noise reduction
- Material choices
- Waste management and recycling options
- Air quality and pollution control mechanisms
- Nature conservation, biodiversity and environmental intrusion

To co-ordinate and influence the design of maintenance and improvement schemes in the Borough, engineers have developed and embedded 'Walsall's Highway Maintainability Audit (WMHA)'. Its objective is to ensure that all materials and treatments selected or specified conform to the Design Manual for Roads and Bridges, HAPAS, and other relevant British or retained European Standards.



'The purpose of the WHMA is to give clear guidance to ensure that as far as reasonably practicable that future maintenance implications are considered at the earliest possible stage during any highways project'.

View the 'Walsall Council Highway Maintainability Audit'

The WHMA provides a framework so that whole-life maintenance implications of highways projects are systematically considered, including:

- Selecting materials that will be durable and functional
- Selecting materials from sustainable/ethical sources, that can be matched and replaced easily
- Reduce street furniture and unnecessary clutter
- Recycle to reduce the need for virgin aggregates

The maintainability audit draws attention to lifecycle considerations, including:

- Scheme design life and compatibility with the surrounding highway
- Suitability of the design and materials for predicted traffic use
- Are the materials likely to be readily available across the life-cycle
- Are the materials likely to fade or discolour, will they be resilient to contamination
- Can surfaces be cleaned easily
- Have recycled materials been considered
- Are there any special engineering difficulties
- Have co-ordinated works opportunities been explored

The key deliverables arising from the WHMA include:

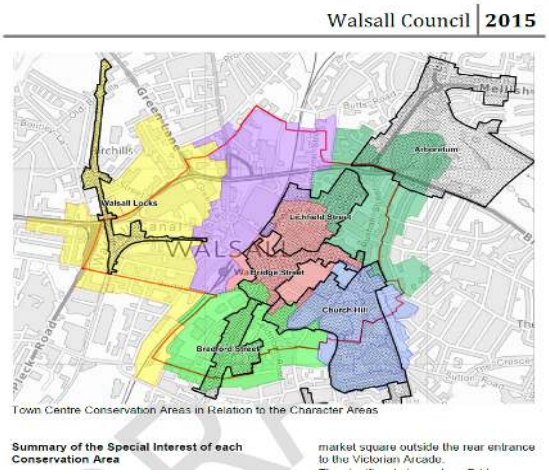
- Reduced remedial works and associated congestion
- Reduced routine maintenance requirements
- Better knowledge for future planned maintenance operations
- Better surfaces to walk, cycle and drive on
- Lower waiting times for repairs using materials from regular suppliers and reduced needs to carry varieties of stock items as alternative products

The Council routinely recycles machine planed arising's for use as sub base material when delivering planned maintenance schemes throughout the borough, and where durability requirements can be satisfied consideration is given to the use of Low Energy Asphalts (LEA's) for resurfacing works.

Heritage Assets.

The Council has developed a comprehensive log of Designated Heritage Assets across the borough, which includes: scheduled monuments, listed buildings and conservation areas.

A range of Supplementary Planning Documents are also published to link legislation and policy frameworks to both design processes and environmental considerations, including our key district centre locations



Minimising Clutter

The Councils published online 'Walsall's Way Ahead – Wayfinding Strategy Document' sets out the strategy adopted to aid mobility across the borough, including the key district centres. The strategy embraces and encourages a Declutter approach, our maintenance and sign replacement programmes endorse the strategy wherever practical, with over 700 items of obsolete street furniture having been removed in response.

The approach adopted for 'Sustainability and Environment' is designed to meet the Code in the following areas:

Recommendation 32	**Carbon**
The impact of highway infrastructure maintenance activities in terms of whole life carbon costs should be taken into account when determining appropriate interventions, materials and treatments.	

Recommendation 33	**Consistency with Character**
Determination of materials, products and treatments for the highway network should take into account the character of the area as well as factoring in whole life costing and sustainability. The materials, products and treatments used for highway maintenance should be met for effectiveness and durability.	

Recommendation 34	**Heritage Assets**
Authorities should identify a schedule of listed structures, ancient monuments and other relevant assets and work with relevant organisations to ensure that maintenance reflects planning requirements.	

Recommendation 35	**Environmental Impact, Nature Conservation And Biodiversity**
Materials, products and treatments for highway infrastructure maintenance should be appraised for environmental impact and for wider issues of sustainability. Highway verges, trees and landscaped areas should be managed with regard to their nature conservation value and biodiversity principles as well as whole-life costing, highway safety and serviceability.	

Recommendation 36	**Minimising Clutter**
Opportunities to simplify signs and other street furniture and to remove other redundant items should be taken into account when planning highway infrastructure maintenance activities.	

10 – Engaging and Communicating with Stakeholders.

Highways network stakeholders consist of our residents, visitors or anyone using our highway network whether for business or pleasure, including:

- Pedestrians, motorists, motor cyclists and cyclists
- Bus/taxi operators and their passengers
- Freight vehicle drivers and haulage operators
- People with disabilities
- Equestrians
- Residents and landowners adjoining the highway
- Emergency services

How the Council engages, communicates, and informs customers is through a variety of ways including:

- Consultation
- Participation and empowerment
- Service pledges
- Service standards

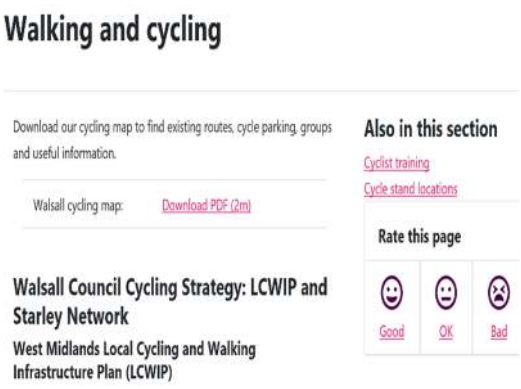
The Council has a robust consultation protocol: Our Approach to Preparing for Consultation (Sept 17). This affirms the Councils commitment to listening and responding to the residents and businesses of Walsall to inform decision making processes, providing vital service information, and collecting feedback.

The Roads, street lighting and parking website is the primary interface for stakeholders to find out about, and contribute to, Council services. It provides multiple links to top level folders including:

- Cycling
- Highway investment, highway maintenance and pothole reporting
- Parking
- Public Rights of Way
- Public transport and red routes
- Road safety

Further information and supporting guidance is available through sub-links for a range of service matters, including:

- Council services/provision
- Policies, strategies and improvement initiatives
- Service standards
- Funding streams
- Major schemes
- Defect reporting



View the 'Roads, Parking & Travel' webpage

To monitor highway infrastructure service delivery the Council participates in a National Highways and Transportation (NHT) survey conducted by IPSOS Mori, supplemented by the Customer Quality Costs (CQC) survey which measures: customer satisfaction levels; work quality issues; value for money and stakeholder perception. This information is considered alongside APSE benchmarking data to help us target those areas where improvements may be required, and to develop a better understanding of how we are performing against what our stakeholders are expecting from us.

Feedback for all of our services is also available through Walsall's Comments, Compliments & Complaints webpage.

View the 'Walsall Comments, Compliments & Complaints webpage'

Customers can also contact the Council:

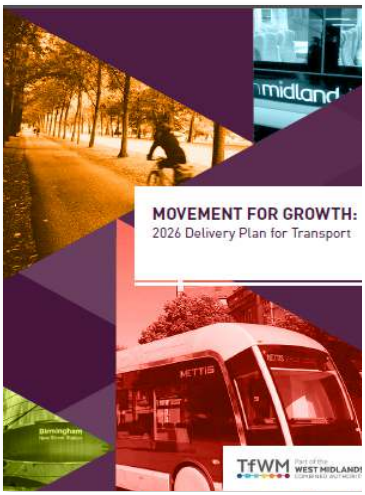
By telephone during working hours 01922 650000.

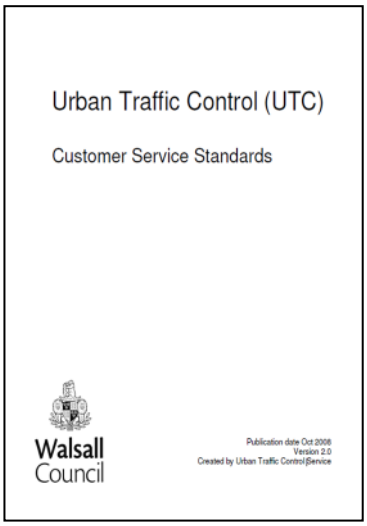
Day	Opening hours
Monday	8.45am – 5.15pm
Tuesday	8.45am – 5.15pm
Wednesday	8.45am – 5.15pm
Thursday	8.45am – 5.15pm
Friday	8.45am – 4.45pm
Saturday	Closed
Sunday	Closed

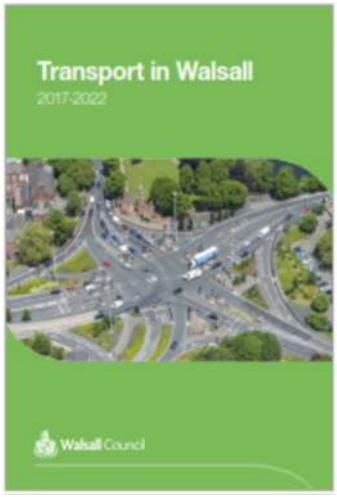
And also, for out of hours emergencies at any time by phone 01922 650000.

Or online using the 'Apply or Report' link.

Service Standards are published on the Councils roads, parking & travel website and on other suitable outlets in the form of: Policy; strategy documents; route maps; service leaflets; project leaflets, providing the information required to enable the public to understand in qualitative terms the levels of service they can reasonably expect from the highways maintenance service.







The approach adopted for 'Engaging and Communicating with Stakeholders' is designed to meet the Code in the following area:

Recommendation 4	**Engaging And Communicating With Stakeholders**
Relevant information should be actively communicated through engagement with relevant stakeholders in setting requirements, making decisions and reporting performance.	