

A Road Safety Strategy for Solihull 2017–2030

Involving local people in keeping Solihull safe

Building Safer and Healthier Communities, now and for the future



**SOLIHULL
CONNECTED**



Four Strategic Priorities



List of Contents

Our strategy on a page (executive summary)	5
Setting the Scene	7
Background	7
Nationally	7
Regionally	8
Locally	8
Past Performances	9
Financially	9
Our challenges	10
Quick wins – already achieved	10
Chart 1 – Killed and seriously injured road casualties trend (2000–2015)	10
Chart 2 – Components of collisions	11
Who is injured?	11
Chart 3 – Solihull casualties by mode of travel	11
Chart 4 – Solihull child casualties by mode of travel	12
Chart 5 – Road traffic casualties in Solihull by gender/age (2013–2015)	12
Chart 6 – Full car driving licence holders in England by gender/age	13
Chart 7 – Road traffic casualties in Solihull by class/age	13
Which road users are at more risk?	13
Which groups are at most risk?	16
Where do road traffic collisions occur?	19
Where do casualties live?	20
This is where we want to be	21
Our targets	21
This is how we will get there	24
Partnership working	24
Smarter data analysis	26
Behavior change	27
Communication	28
Maintenance	29
Road Design	31
Speed Management	33
Connected and autonomous vehicles	36
Pedestrians	37
Cycling	38
Motorcycling	39
Young drivers	39
Children	40
Older people	40
Finance	40
Appendices	41
Appendix 1 – Action Plan	41
Appendix 2 – (Local Safety Scheme Analysis (Single Sites and Routes))	45

Our strategy on a page

Setting the Scene

The development of this latest road safety strategy has been influenced by national, regional and local policy objectives and forms an integral part of wider reaching transport plans established in Solihull Council's 'Solihull Connected' transport strategy.

Regionally there will be significant governance changes with the first Mayor for the West Midlands being elected on 4 May 2017 and powers being moved from Whitehall to the new West Midlands Combined Authority. These changes are likely to have a significant impact on the delivery of transport initiatives including road safety.

Our challenges

Many of the quick wins have already been achieved and it is increasingly difficult to find patterns in collisions that can be addressed through engineering measures.

Our main challenges are:

- The 'Fatal 4': (excess speed; use of mobile phones / electronic devices; failure to wear a seatbelt and drink or drugs.)
- Child pedestrians aged between 10 and 15.
- Male cyclists between the ages of 30 and 60.
- Young male motorcyclists between the ages of 16 and 29.
- Young male drivers between the ages of 17 and 29.

Where we want to be

The target that we have adopted for the year 2030 is to reduce the 5 year annual average number of people killed and seriously injured in road traffic collisions to 55% of the 2005 to 2009 average.

How we will get there

In our strategy we have taken into account the national strategic 'safe system' approach and adapted it to suit the local needs of the Borough through a wide range of interventions:

- Working in partnership and playing to the strengths of the different agencies involved by co-ordinating the use of complementary skills.
- Smarter data analysis of road traffic collisions and those involved is an essential part of our strategy to reduce road traffic casualties.
- Behaviour change will be a key element to our success and increasingly programmes will be based on psychological behavioural change.
- Communication and social marketing are very powerful tools and we aim to make better use of these.
- Highway maintenance and road design schemes will be reviewed for opportunities to improve road safety without any significant additional cost.
- Speed Management, particularly on urban roads where there are high numbers of vulnerable road users will be an on going part of our work.
- Connected and autonomous vehicles are likely to play a significant part in reducing casualties and we will investigate joint working with a vehicle manufacturer so that we are well placed locally to reap the full benefits from this technology.
- Focusing on our challenges of the fatal four, child pedestrians, cyclists, motorcyclists and young male drivers.

Setting the Scene

Background

This refreshed Road Safety Strategy for Solihull builds on the strengths and success of the previous Strategy, published in 2012.

In this latest Strategy we take account of the most recent thinking and consider the emerging national, regional and local issues that affect road safety delivery as well as taking account of the lessons learnt over the past five years.

The strategy is an integral part of wider reaching transport plans and has a balanced approach that takes account of other Council and Safer Solihull Partnership objectives; particularly those relating to health and wellbeing. Within that context, the aim is to minimise the number of people in Solihull who are injured in road traffic collisions, set out our expectations on performance and show how road safety will be developed.

The Strategy will cover the period up to 2030, with a periodic review every five years to support the lifespan of the document and provide a flexible response to emerging collision types, trends and hot topics.

Nationally

On 11 May 2011, the Department for Transport (DfT) published a Strategic Framework for Road Safety, which includes the Government's key themes and a package of policies. There is a split between national measures that the Government intends to take and areas where the policy and delivery will reflect local priorities and circumstances. The Framework does not have any overarching casualty reduction targets or definitive forecasts and accepts that predicting future levels of road deaths and injuries is not straightforward. There is, instead, a Road Safety Outcomes Framework, which sets out six indicators to be monitored at a National level and three key indicators at a local level. These indicators are set out in more detail in the section on Targets.

[The Strategic Framework for Road Safety](#) is available on the DfT's website.

In December 2015 the Secretary of State for Transport presented to Parliament a British Road Safety Statement 'Working Together to Build a Safer Road System'.

The statement confirmed the government's commitment to invest in road safety. It also set out the context of road safety in Britain today and listed the government's key priorities for road safety. Adopting the Safe Systems approach was one of those key priorities and is a theme that runs throughout the statement. The approach promotes a 'five pillar' strategic approach for managing road safety as listed below: -

- Pillar 1: Road Safety Management
- Pillar 2: Safer Roads and Mobility
- Pillar 3: Safer Vehicles
- Pillar 4: Safer Road Users
- Pillar 5: Post Crash Response

[The Working Together to Build a Safer Road System: British Road Safety Statement](#) is available on the DfT's website.

Regionally

In June 2016 - the West Midlands Integrated Transport Authority, Centro and the West Midlands Passenger Transport Executive were dissolved and replaced by the West Midlands Combined Authority (WMCA) with the transport arm of the Combined Authority being led by Transport for West Midlands (TfWM).

The WMCA strategic transport plan, 'Movement for Growth', sets out the long-term approach to guide many transport improvements, to be made over a twenty year period. In that strategic plan the future of road safety is recognised as being critical and includes a proposal for a new road safety strategy which will be aimed at reducing by at least 40% the number of killed and seriously injured road traffic collisions within ten years from a 2015 base, whilst increasing the amount of cycling and walking in the metropolitan area.

The West Midlands 'Movement for Growth' strategic transport plan is available on the TfWM website.

Locally

In August 2016 we published 'Solihull Connected' a new transport strategy for Solihull.

The document marks out our vision for how we will deliver transport infrastructure and initiatives in the future, how we will accommodate growth in travel demand on our highway network and how we will seek to maintain Solihull's character.

The transport strategy provides a long-term strategic vision for how we manage the extra travel demand brought about by the predicted economic and population growth, both in the Borough and across the West Midlands.

Solihull Connected is aligned with the West Midlands Strategic Transport Plan, 'Movement for Growth', which provides the strategic direction for transport across the region. Solihull Connected takes that overall direction and shows how it can be applied within the Borough.

Solihull Connected recognises that the Council's current Road Safety Strategy will have to be refreshed and that the new Safety Strategy will be linked to the vision and policies set out in Solihull Connected.

The Solihull Connected transport strategy is available on Solihull Council's website: [Solihull Connected](#).

More recently we have published a [Solihull Connected Delivery Plan](#) which aims to turn the Solihull Connected vision in to reality by identifying the specific transport priorities for development to an investment-ready state. The Solihull Connected Delivery Plan introduces a new initiative called the Community Liveability Programme which is about local transport interventions, of small, impactful schemes that support local neighbourhoods and centres to improve people's everyday lives. The programme also links to wider agendas like health, community engagement and place-making.

In support of this we are committed to promoting active travel, such as walking and cycling, as part of the strategy to reduce obesity in children and adults in the borough. Active travel has many benefits including the improvement of health and mental wellbeing, reduction in congestion on the roads and reduction in environmental pollutants from exhaust fumes. We will work in partnership with the Council's Public Health team to promote active travel, particularly to school and work, and will also work with them to promote road safety messages through their commissioned services, such as Health Visiting and School Nursing.

Funding

The outcome of the government's 2010 autumn spending review for the years 2011/12 through to 2014/15 led to a reduction in the funding made available to local authorities, the fire services and the police. In Solihull significant savings were made over the period covered by the review.

The autumn 2015 review of government expenditure indicated a further reduction in the overall funding to local authorities along with significant changes to the funding system. The Revenue Support Grant for local authorities is being phased out and replaced by other changes to local funding, including the retention of business rates.

These latest funding changes and reductions will require further savings with all areas of expenditure being considered, including road safety. To minimise the impact of the savings the Council will look to be even more innovative as it moves towards establishing a viable self-sufficient budget.

Past Performance

The good news is that Britain's roads are very safe by all international comparisons. In terms of global road safety we remain second with only Sweden having a better record. (Working Together to Build a Safer Road System) There were fewer people killed on British roads in 2013 than at any time since records began in 1927. (Reported road casualties in Great Britain 2015 –Table RAS41001)

Not only are Britain's roads very safe but also Solihull is one of the best performing local authorities having one of the lowest casualty rates for each mile driven. (Reported road casualties in Great Britain 2015 –Table RAS41003)

In 2000, the Department for Transport (DfT) published its targets for reducing road casualties by the year 2010 based on the 1994-1998 average. These were a:

- 40% reduction in the number of people killed or seriously injured.
- 50% reduction in the number of children killed or seriously injured.
- 10% reduction in the number of people slightly injured.

In Solihull we had already exceeded the national target of a 40% reduction in the number of people killed or seriously injured in 2001 and by 2010 we had achieved a 65% reduction.

In 2008, we adopted Local Area Improvement Targets for the period 2008-11 which included a more challenging local National Indicator (NI) 47 and an updated NI 48. Those were as follows:

- NI 47 Killed and seriously Injured – A 7.5 % reduction between the 2005-07 average (83) and the 2008-10 average (77).
- NI 48 Children under the age of 16 killed and seriously Injured - A 3 year average of no more than 13 children killed or seriously injured based on an average of the three years 2008-10.

While we did not meet those more challenging targets we continued our good long term performance in reducing the number of people killed and seriously injured on our roads.

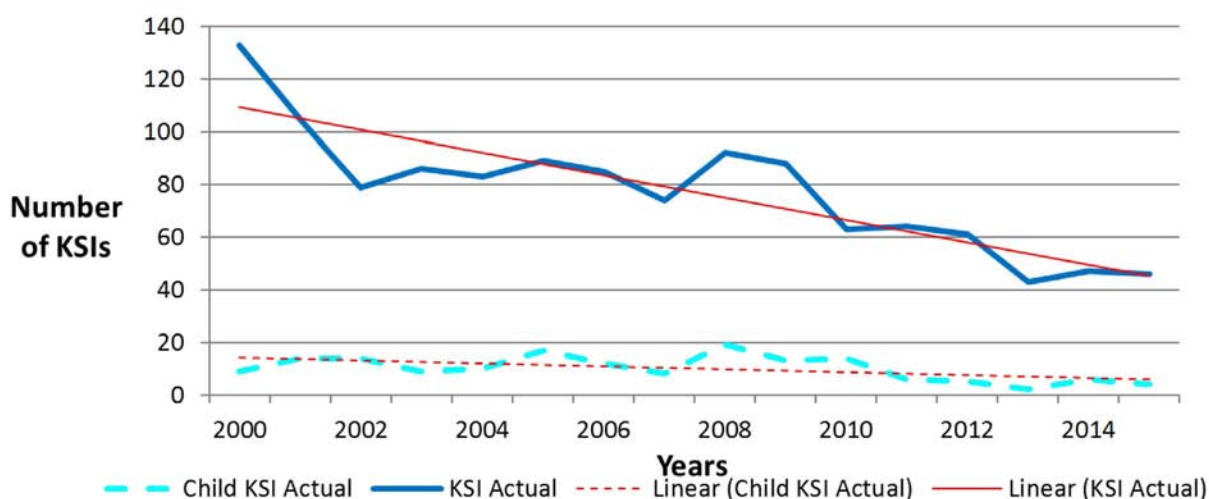
In 2012, the Solihull Road Safety Strategy (2012-2016) set a new target of reducing the five year rolling average of killed and seriously injured casualties by 17.3% between the baseline 2005-09 (average of 85) and the 2011-15 average. We exceeded that target and reduced the number of people killed or seriously injured by 39% (a five year average of 52 people).

Our Challenges

Quick wins - already achieved

We have continued, in common with many local authorities across the UK, to make impressive reductions in traffic-related injury, especially in the killed and seriously injured category. Chart 1 illustrates our good performance in reducing Killed and Seriously injured casualties over the last fifteen years, despite an overall increase in traffic.

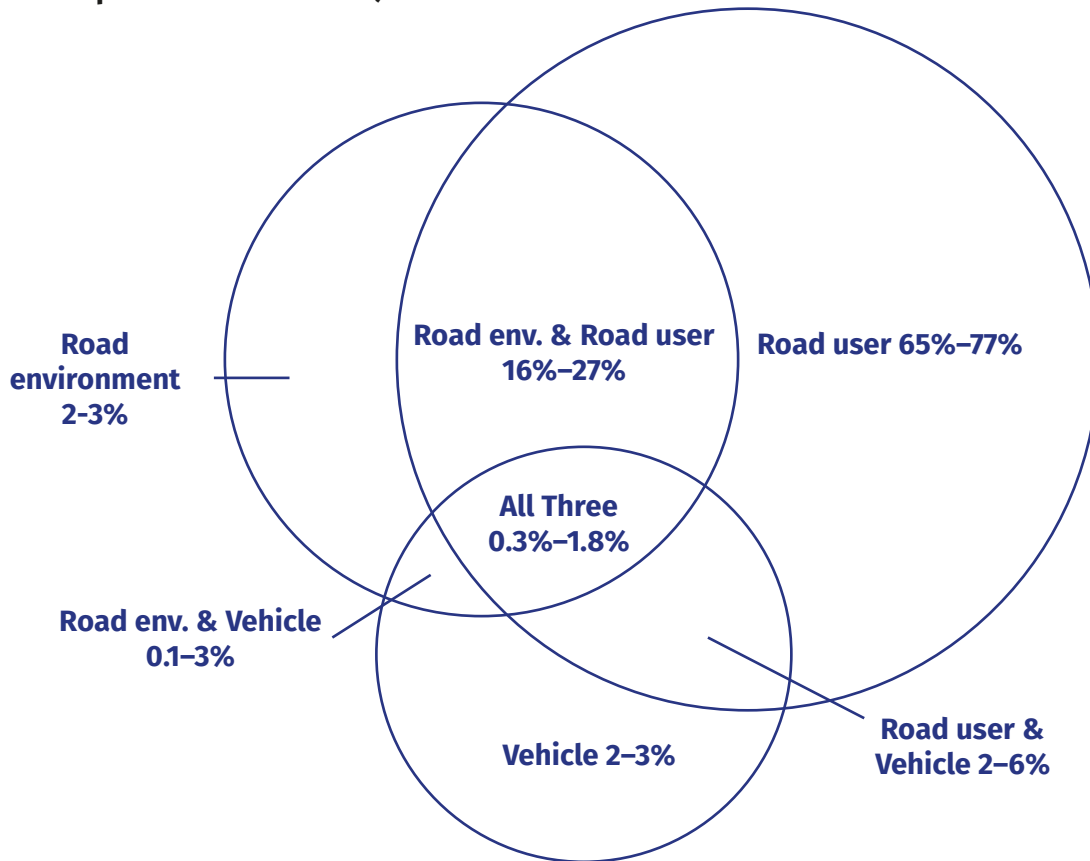
Chart 1 – Killed and Seriously Injured (KSI's) Road Casualties (2000 – 2015)



However, over the past few years we have found it increasingly difficult to find patterns in collisions that can be addressed through engineering measures. Future casualty reductions will be harder to achieve unless new approaches are used as many of the quick wins have already been achieved.

Increasingly we need to place more emphasis on educating road users to change risky behaviours. Most collisions are attributed to human error as demonstrated in Chart 2. Aggression and a lack of empathy towards other road users are characteristic of the way too many people travel and we need to try to utilise behaviour change techniques to tackle those attitudes. In particular we will look to develop programmes that address the 'Fatal 4': excess speed, use of mobile phones / electronic devices, failure to wear a seatbelt and drink or drugs.

(Chart 2 – Components of collisions)



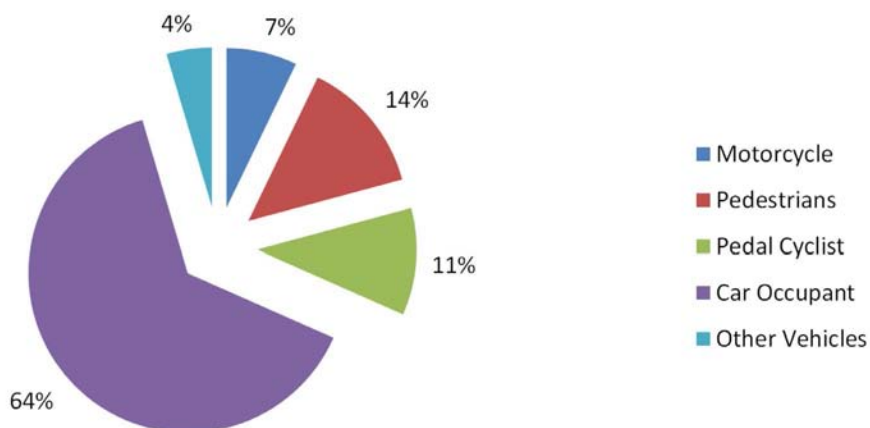
We also need to understand that we can never entirely eliminate road collisions because there will always be some degree of human error and work towards minimising injuries.

Who is injured?

If we look at the number of people injured in Solihull by mode of travel, car occupants are the road user group with the greatest number of casualties each year. However, this is unsurprising as cars account for around 80 per cent of the distance travelled.

When compared to the years 2008-2009 {A Road Safety Strategy for Solihull 2012-2016: Chart 2} the proportion of pedal cyclist casualties has increased from 7% to 11%. The proportion of casualties for other modes of travel has reduced or, in the case of pedestrians, remained the same.

Chart 3 – Solihull Casualties by Mode of Travel (2013 - 2015)



When looking at child casualties under the age of 16, as Chart 4 demonstrates, the majority of casualties are either as car occupants or pedestrians.

Chart 4 – Solihull Child Casualties by Mode of Travel (2013-2015)

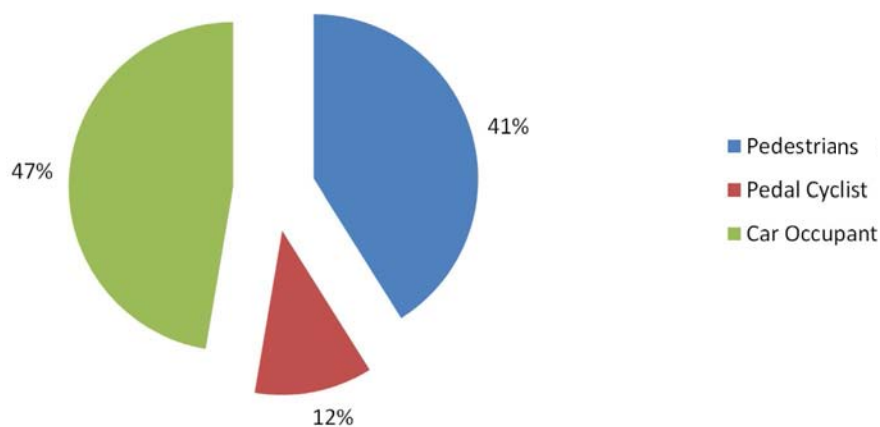
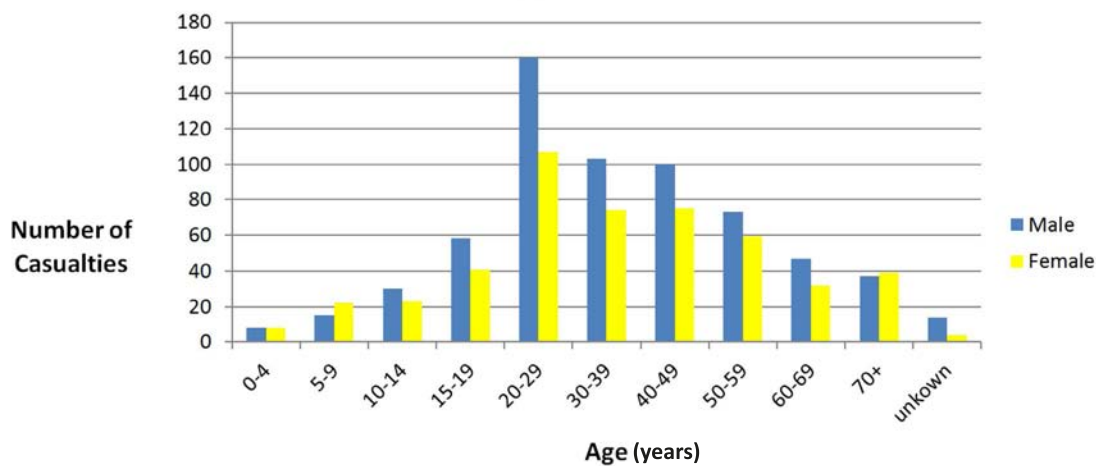


Chart 5 below provides a demographic breakdown of the people injured from road traffic collisions in Solihull. This shows that:

- Males and females are both most at risk of being injured in the 20 - 29 age groups.
- The proportion of male casualties is more than 30% higher than females despite the overall population being evenly balanced. (If we look at killed and seriously injured casualties the proportion of males is more than 100% higher than females).

Chart 5 – Road traffic casualties in Solihull by gender/age (2013-2015)



In 2015, 74% of the population in England aged 17 and over held a full car driving licence compared with 48% in the mid 1970s with the increase in driving licence holding being greatest among older age groups.

During the last 20 years the proportion of males holding driving licences has remained at about 80% whereas for women it has continued to increase reaching 68% in 2015.

Chart 6 – Full car driving licence holders in England by gender / age

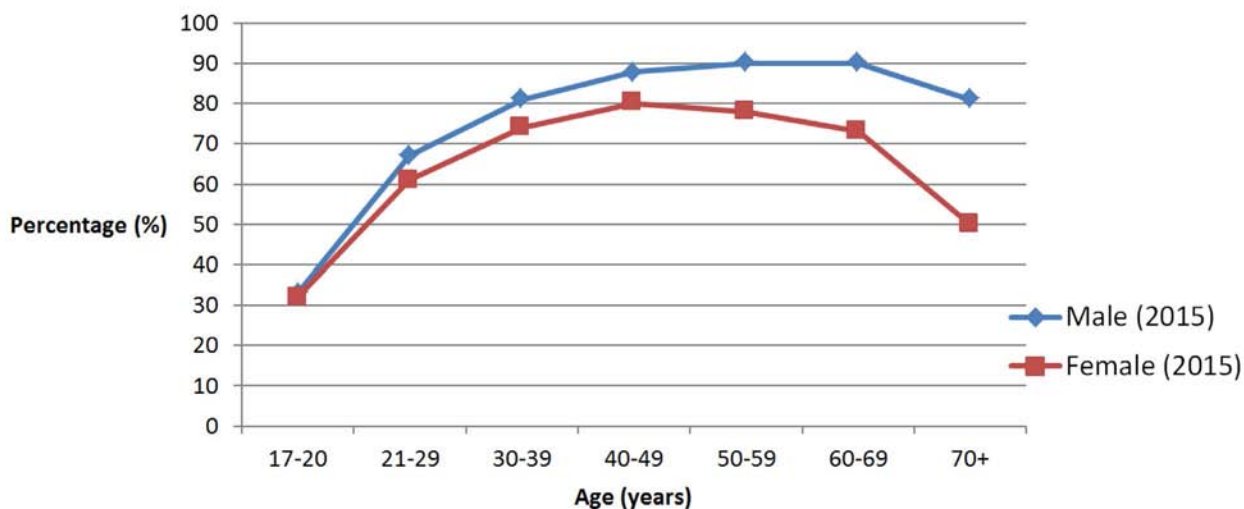
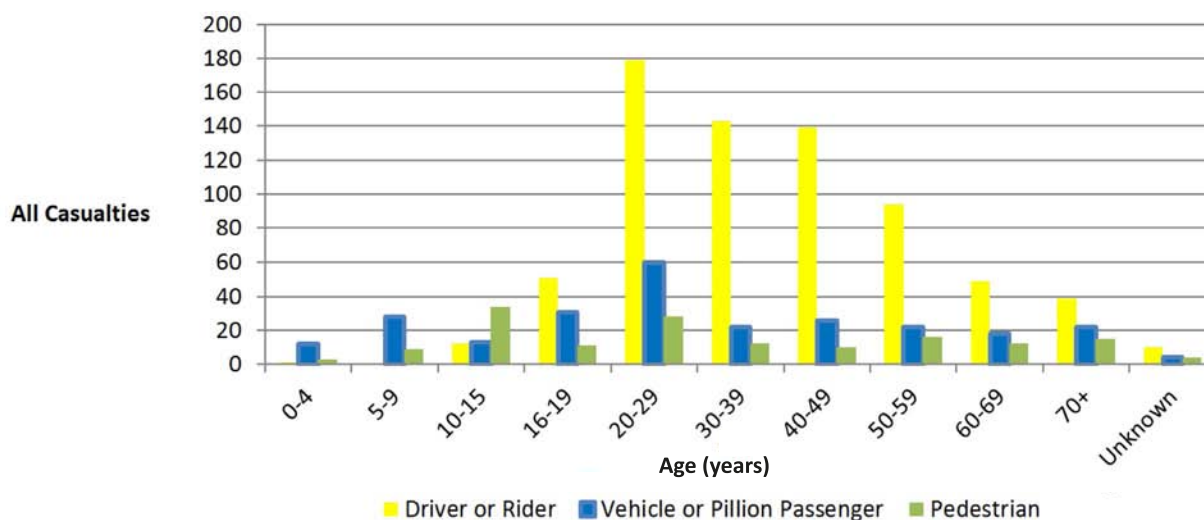


Chart 7 below provides a breakdown by road user type and age of the people injured from road traffic collisions in Solihull and shows that:

- The 10 to15 age group is at the greatest of being injured as a pedestrian.
- The group at the greatest risk of being injured as a vehicle or pillion passenger is the 16 to19 age group. (proportionately for the age range covered).
- The 20 to 29 age group is at the greatest risk of being injured as a vehicle driver or rider.

Chart 7 – Road traffic casualties in Solihull by class / age (2013-2015)

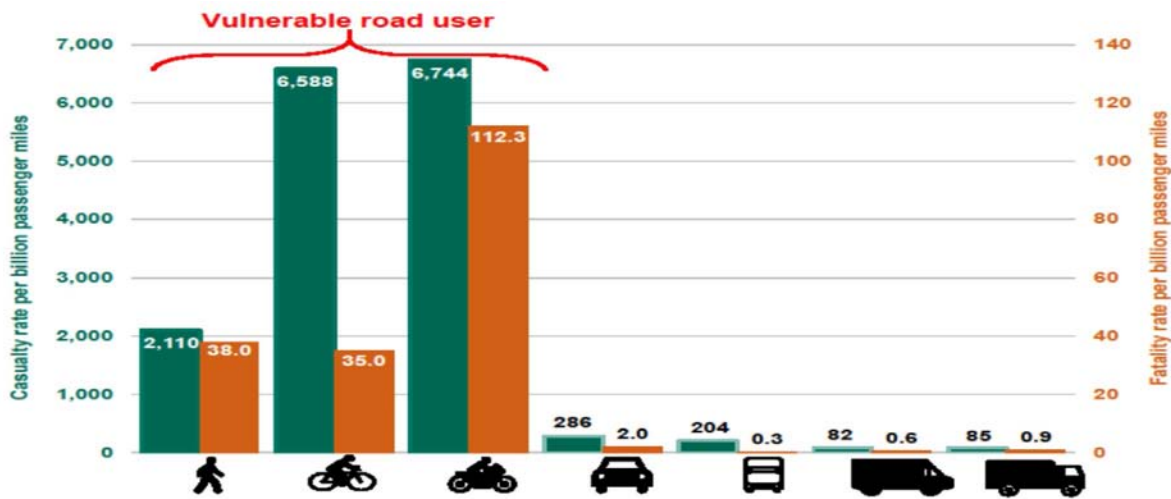


Which road users are at more risk?

To enable us to better understand and target a reduction in casualties for those people who are at greatest risk, we have drawn on research carried out throughout the UK. {Reported road casualties in Great Britain 2015}

Using that research we have looked at casualty rates in terms of the number of casualties per mile travelled. In these terms, the road user groups are split into two clearly distinctive groups. The first, with much higher casualty rates, are typically referred to as vulnerable road users (usually defined as pedestrians, pedal cyclists, motorcyclists). All of these groups have much higher casualty rates per mile travelled in comparison with the other road user groups, as shown in Chart 8.

Chart 8 – Casualty rates by road user type, Great Britain: 2014 (per billion passenger miles)



Despite the elevated risks for vulnerable road user groups, it is important that we recognise the benefits of these modes of travel.

Pedestrians

Nationally, walking is the second most used mode of travel after the car accounting for 22% of trips and 3% of the distance travelled.



Women make more walking trips than men generally, with the 21 to 29 age group having the greatest difference.

In Solihull pedestrians represented 21% of all the people killed and seriously injured in road traffic collisions and 14% of all injuries with the highest risk group being young pedestrians between the ages of 10 and 15.

Cyclists

Nationally cycling only accounts for 2% of trips and 1% of the distance travelled but it accounts for 14% of killed or seriously injured casualties. Along with other vulnerable road users they do not have the protection of a vehicle body to help reduce the risk of injury. Cyclists also tend to be harder for other drivers to see and are less likely to be able to accelerate quickly to avoid obstacles and collisions.



Over the last twenty years the number of cycling trips has dropped by 14% but the distance travelled by bicycle has increased by 16%. On average, men of all ages, make more cycling trips than women and travel further on those journeys, with men accounting for 79% of the distance travelled.

The majority (68%) of cycling is on urban roads and therefore it is not surprising that most of the pedal cyclist casualties (81%) also occur on urban roads. However, over half (58%) of pedal cyclist deaths happen on rural roads, which have higher speed vehicles.

Cycling has many benefits and the perceived disadvantages are far outweighed by the the advantages. It is a form of transport that provides health benefits and is one of the easiest ways to fit exercise into the daily routine. Cycling is also better for the environment and can save money, fuel and time.

In Solihull, between 2013 and 2015 pedal cyclists represented 13% of all the people killed and seriously injured in road traffic collisions and 11% of all injuries. The majority, (88%) of cyclists injured are male.

Motorcyclists

Nationally motorcyclists have the highest casualty risk of all road user groups on account of both their physical vulnerability and the elevated speed at which they can travel compared with other vulnerable road user groups. Motorcyclists account for less than 1per cent of traffic each year, but 19 per cent of fatalities. Consequently they are considerably over-represented in collisions, more so than any other road user group.

Nationally, men account for 86% of the distance travelled on motorcycles and 94% of the killed or seriously injured casualties. Riders under the age of 25 account for 33% of the killed

and seriously injured with those between 16 and 20 having more casualties than any other age group. A second peak in the number of killed or seriously injured casualties also occurs for riders between the age of 41 and 50.

Motorcyclists are very exposed with relatively little protection, beyond clothing. It is hard to introduce secondary safety features on motorbikes that will reduce injuries when collisions occur.

Despite the elevated risks, motorcycling provides an efficient means of transport and can support affordable social and economic inclusion.

In Solihull, between 2013 and 2015 motorcyclists represented 22% of all the people killed and seriously injured in road traffic collisions but only 7% of all injuries. The highest risk group is young male motorcyclists between the ages of 16 and 29, particularly those under the age of 20.

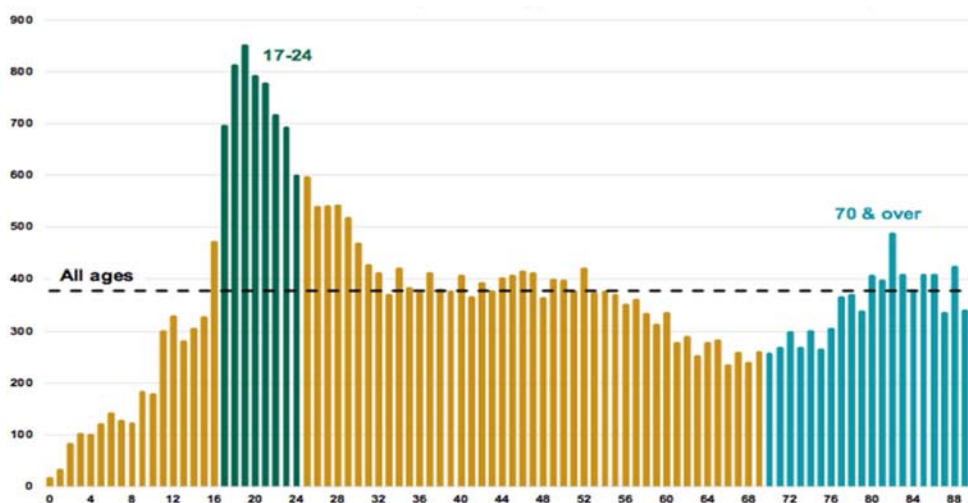
Which Groups Are Most at Risk

Young Drivers

Nationally young drivers are statistically over-represented in reported road collisions. In 2015, there were 49 road deaths for every million people aged 17-24 compared with 27 deaths for every million people for the whole population.

- Of all young drivers involved in fatal collisions nearly 79% were male.
- Young drivers are more likely to have collisions that result in either a fatal or serious injury at night (10pm -4am). The majority of young driver collisions occur in urban areas although the collisions in rural areas are more likely to be fatal or serious.
- Collisions involving young drivers are more likely to have contributory factors relating to speed, recklessness and vehicle control compared with older drivers.
- In Solihull there are 40% more collisions involving young drivers aged 17 to 29 than might be expected when compared with the rest of the West Midlands. {West Midlands Regional Summaries: Young Drivers}
- An assessment of the historic and projected trends indicates that the risk of young people in Solihull being involved in collisions will increase.

Chart 9 – Killed or seriously injured drivers by age, Great Britain: 2015 (per million car driver licence holders)



Key factors that need to be taken into account: -

- Analysis of 2001–04 road traffic collisions {Ward et al., 2007a} shows a link between the low socio-economic status of car occupants and the fatality risk. The analysis also raised a number of key issues which offer some possible explanations for these differences:
- Speed – in the most deprived areas, there was twice the percentage of fatal crashes involving excess speed compared with the least deprived quintile;
- Impairment – the areas with the most deprived Index of Multiple Deprivation (IMD) had over one in five of their fatal collisions involving alcohol or drugs as a contributory factor compared with one in six for the least deprived;
- Seat-belt wearing – the most deprived IMD areas had nearly twice the percentage of non-seat-belt wearing fatalities compared with that of the least deprived areas, with the difference being even more pronounced for passenger fatalities;
- Licence violations – fatalities involving driving licence violations were the most prevalent in the lowest IMD areas, with the percentage of unlicensed driving being over six times higher in IMD 1 compared with IMD 5; and
- Insurance violations – the recorded rate of insurance violations in fatal collisions in the most deprived IMD 1 was over three times higher compared with the least deprived IMD 5.

In Solihull young car drivers aged 17 to 29 are 67% more likely to be involved in an injury road traffic collision than might be expected based on their population when compared with all adult drivers. Young male drivers, aged 17 to 29, account for 30% of all the adult drivers who are killed or seriously injured in road traffic collisions.

Children

Nationally, 95% of pedestrian injuries occur on urban roads, with children being disproportionately at risk (22% of killed and seriously injured pedestrians are between 8 and 15 years old).



Children are often taken to and collected from primary school by parents and the move to secondary school is a time when children are generally given greater freedom to travel alone or with friends for the first time. Unfortunately, statistics show that children are more at risk of being involved in a road traffic collision during this transition from primary to secondary school.

When children travel by car their risk of death or serious injury is highest aged 14 and 15. Over half of the 15 year olds killed and seriously injured in cars have a driver under the age of 21. Research shows as children get older they are more likely to begin travelling with drivers only a few years older and this is particularly the case for young teenage girls travelling in cars driven by slightly older teenage boys.

There is also evidence that nationally a child from a low-income family is five times more likely than a child from a high income family to be killed on the roads. Children living in disadvantaged areas are more likely to live in households headed by single parents (where parental age, education and literacy levels are typically low), with a parent with a long-term health condition or disability (including a mental health condition) or in overcrowded accommodation with a greater than average number of siblings {Towner et al., 2005}. In addition, the lack of play space within the house may mean that children need to play out in the streets more than those in other types of household or in other areas {Towner et al., 2005}.

In Solihull 41% of children injured in road traffic collisions are pedestrians with the 10 to 15 age group being at highest risk.

Older People

Nationally the number of older people in Great Britain has increased at the fastest rate of all the age groups, with 1.9 million more people aged 70 or over now compared with thirty years ago.



The proportion of those aged 70 or over sustaining a road injury per year has remained approximately the same over the last ten years while other age groups have had a decline. The rapidly increasing population and increased likelihood of this age group to drive and be more active than they were previously may be leading to the slower reduction in the casualty figures for this age group compared with the others.

While there is some evidence nationally of higher rates of pedestrian injuries (Lyons et al., 2003) among older people in disadvantaged areas, large gaps in knowledge exist that need to be addressed to enable proper programme planning and intervention to understand and address this.

In Solihull older people, over the age of 60, account for 26% of the population and only 14% of road traffic casualties. The percentage of older people killed and seriously injured in road traffic collisions is much higher (21%). A possible explanation for this is the physical vulnerability of older people with them being less likely to recover from injuries.

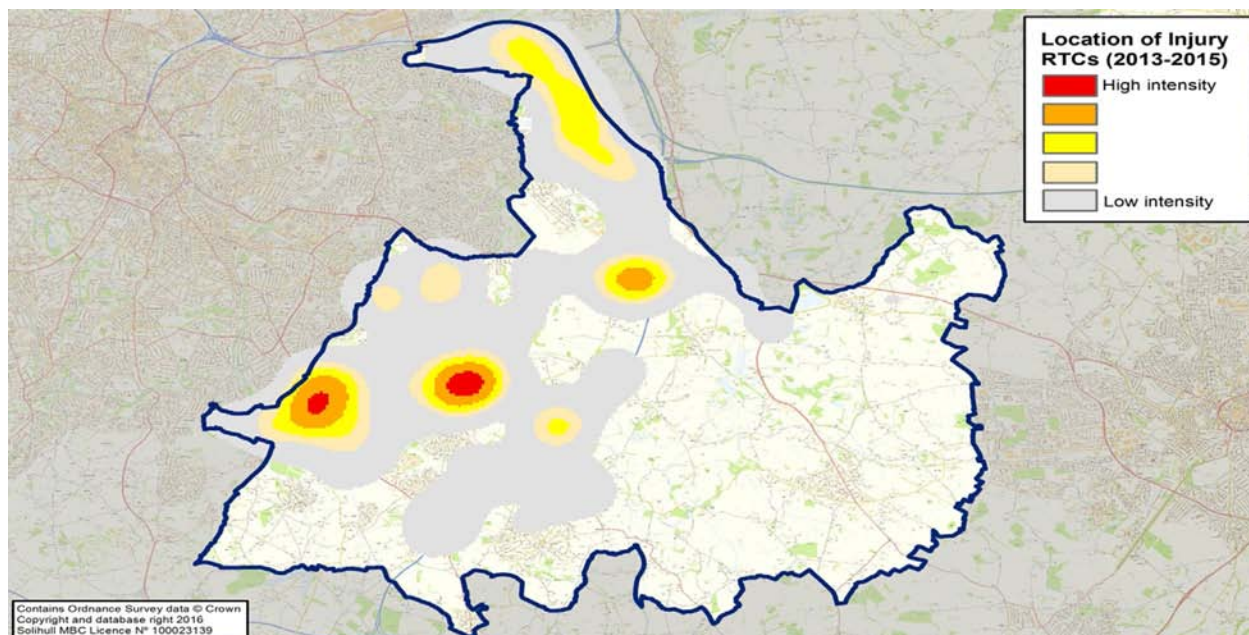
With the rapidly increasing older population, and the greater likelihood of this age group to drive and be more active, it is likely that their representation in the number of casualties will rise.

Where do road traffic collisions occur?

Plan 1 indicates the hotspots for all road traffic collisions that involve a person being injured are located in the west of the Borough particularly around: -

- Solihull Town Centre.
- A45 Coventry Road, just west of M42 junction 6.
- A34 Stratford Road, within the Shirley area.

Plan 1 – Locations of injury road traffic collisions (2013 – 2015)

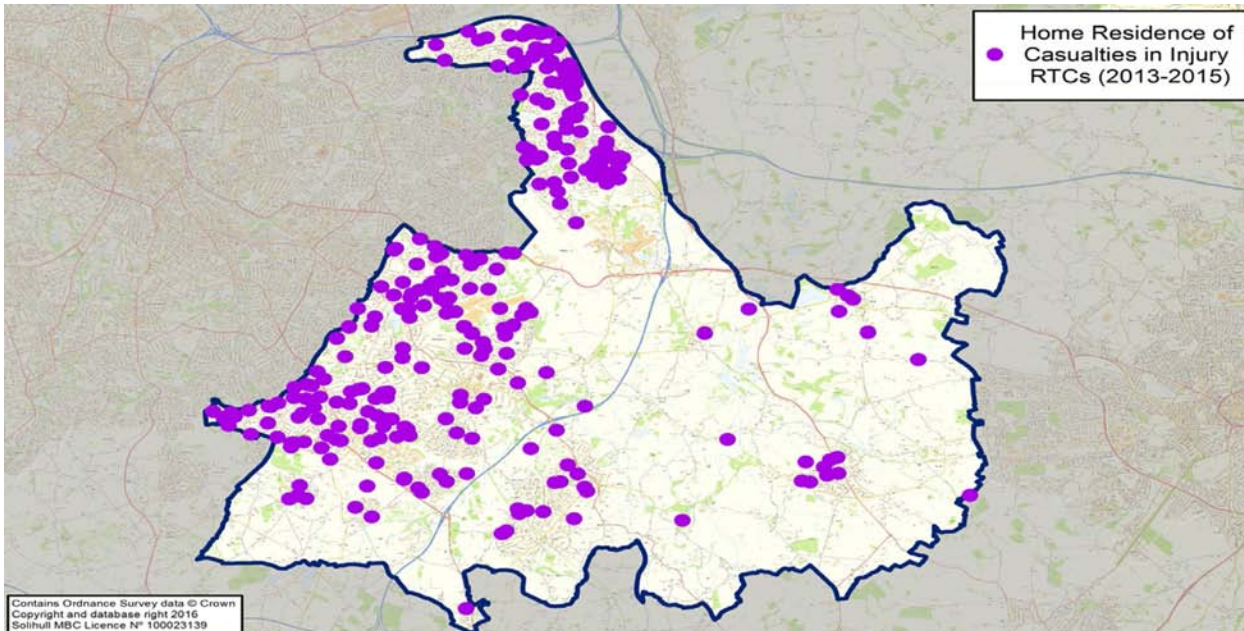


Where do casualties live?

Analysis shows that the home residences of those most likely to become a casualty are located in the areas around: -

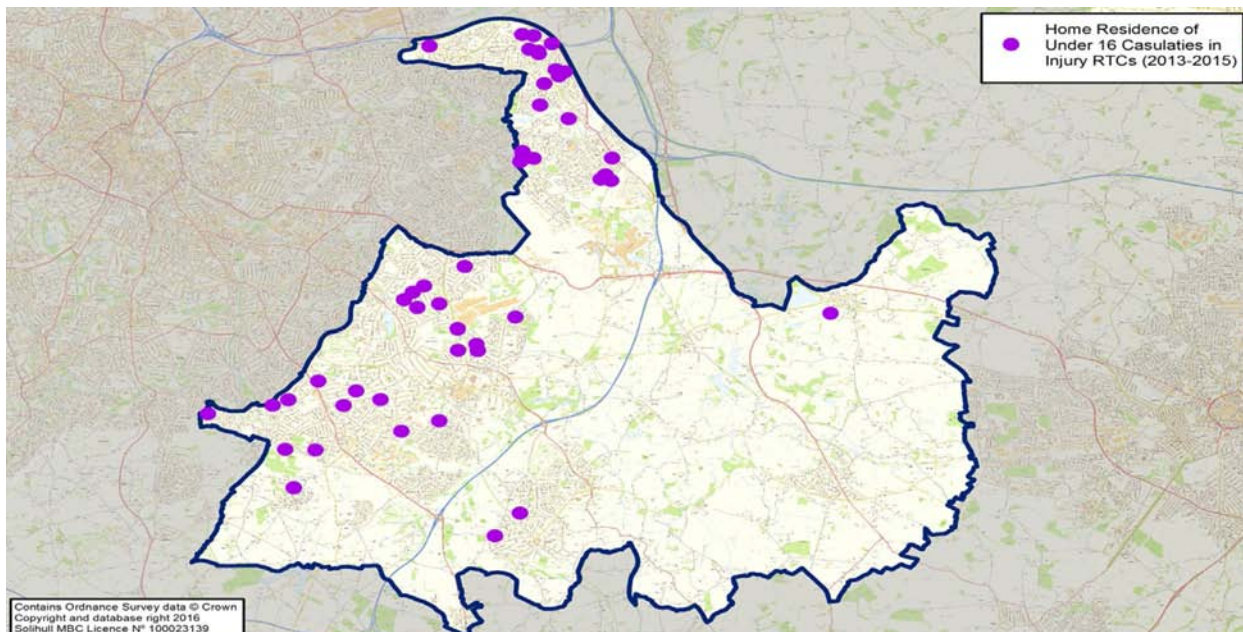
- Smith's Wood.
- Kingshurst.
- Shirley.

Plan 2 – Home residence of casualties (2013 – 2015)



The home residence locations for casualties aged under 16 indicates a hot spot in north Solihull particularly in Smith's Wood and Kingshurst.

Plan 3 – Home residence of under 16 casualties (2013 – 2015)



Where we want to be

Over the past few years we have found it increasingly difficult to find patterns in collisions that can be addressed through engineering measures. Future casualty reductions will be harder to achieve unless we adapt to meet the emerging challenges. To do this we want to:

- Minimise the number of people in Solihull that are injured in road traffic collisions within the framework of wider reaching transport plans and other Council and Safer Solihull Partnership objectives.
- Build on and update the previous Solihull Road Safety Strategy retaining the parts that remain valid but taking account of the 'lessons learnt' and the latest thinking.
- Encourage strong, good quality partnership working – playing to the strengths of the different agencies involved and co-ordinating the use of complementary skills.
- Increasingly place more emphasis on utilising behaviour change techniques to tackle the risky behaviours and attitudes displayed by too many road users.
- Consider how road safety can be more widespread and integrated into related areas of activity such as pedestrian and cycle training rather than being seen as a stand alone function.
- Encourage the development of a broad based communication strategy that delivers the right message, to the right people, in the right way and takes full advantage of social media.
- Follow and promote a flexible data led methodology that takes account of the greatly reduced number of killed and seriously injured road traffic casualties in Solihull.

Local Road Safety Outcomes

In developing our targets we have considered the regional road safety outcomes in the West Midlands Strategic Transport Plan, 'Movement for Growth' and the National road safety outcomes in the Strategic Framework for Road Safety.

The West Midlands Strategic Transport Plan, 'Movement for Growth' aims at a reduction of at least 40% in the number of killed and seriously injured road traffic collisions within ten years from a 2015 base, whilst increasing the amount of cycling and walking in the metropolitan area.

The Strategic Framework for Road Safety accepts that predicting levels of road deaths and injuries is not straight forward. It is, however, possible to make broad predictions of casualties based on past casualty rates and trends, the expected effect of current measures and the projections of traffic growth.

To produce national projections for road traffic casualties the DfT commissioned the Transport Research Laboratory to produce forecasts and the target we have agreed is generally in line with the National Central Projections but considers a five year average to smooth out yearly variations.

Targets

Unfortunately, we will never entirely eliminate road collisions because there will always be potential for some degree of human error. We also need to be aware that future casualty reductions will be harder to achieve and that the remaining collisions will be the most difficult to prevent.

In addition it has been known for a long time that police data does not provide a complete record of all personal injury collisions and casualties. Nationally it is estimated that somewhere in the region of 519,000 casualties go unreported each year.

Comparisons of road collision reports with death registrations show that very few, if any, road traffic fatalities are not reported to the police. However, it has long been known that a considerable proportion of non-fatal casualties are not known to the police. Hospital, survey and compensation claims data all indicate a higher number of casualties than police collision records would suggest.

That police data is not a complete record of all injury collisions should be borne in mind when using and analysing the reported road traffic casualty data. However, police data on collisions remains the most detailed, complete and reliable single source of information on road casualties covering the whole of Great Britain.

A new data recording tool for police forces has been rolled out over 2015 and 2016. Surrey Police started using the new system, called CRASH (Collision Reporting And SHaring) in 2012. A number of other forces, including the West Midlands force, adopted it during November and December 2015. Although not apparent in the data for Surrey, there is some evidence that casualty records coming from CRASH have had a 2 percentage point swing from slight injuries to serious injuries. It is anticipated that the Department for Transport will provide more detail and analysis about the National implications of the move to CRASH when the 2016 statistics are reported in September 2017.

Over time there may be improvements in reporting and the introduction of CRASH in the West Midlands Police area may lead to increased reporting regionally. Nevertheless, we have decided in principle to follow the local Key Indicators proposed in the Road Safety Outcomes suggested in the Strategic Framework for Road Safety.

Our Targets

Table 2 indicates the local target that we have adopted for the reduction in the number of people killed and seriously injured. The target is generally in line with the National Central Projections but considers a five year average to smooth out yearly variations.

Table 2 – Our target reductions for killed and seriously injured casualties

Year(s)	2005–09 average	2016–20 average	2021–25 average	2026–30 average
Killed or Seriously Injured	85	51	45	38
Percentage Change on 2005–09 average		-40%	-47%	-55%

Table 3 provides a yearly ‘rolling average’ based on those targets.

Table 3 – Our rolling average target for reductions in killed and seriously injured

Solihull's Road Safety Target Reduction in the number of people killed and seriously injured					
Five Year Average Base Line 2005–09	2012–16 Average	2013–17 Average	2014–18 Average	2015–19 Average	2016–20 Average
85	63	60	57	54	51
Five Year Average Base Line 2005–09	2017–21 Average	2018–22 Average	2019–23 Average	2020–24 Average	2021–25 Average
85	50	49	47	46	45
Five Year Average Base Line 2005–09	2022–26 Average	2023–27 Average	2024–28 Average	2025–29 Average	2026–30 Average
85	44	42	41	39	38

We will also monitor child casualties and the two local indicators suggested by the Department for Transport to ensure that there is a reducing trend:

- Rate of killed or seriously injured casualties per million people
- Rate of killed or seriously injured casualties per billion vehicle miles

The data for the above casualty rates is produced annually in the Department for Transport document 'Reported road casualties in Great Britain' which is published each September.

How we will get there

The 2012 strategy, although retaining the traditional three E's – engineering, enforcement and education, introduced the concept of a target-based approach to road safety looking at specific groups, issues and risks.

We are now looking to develop our strategy to encompass parts of what is known as a 'safe systems' approach promoted by the World Health Organisation (WHO) in their Global Plan for the Decade of Action for Road Safety 2011-2020.

The safe systems approach is also one of the government's key priorities for road safety and is a theme that runs throughout the British Road Safety Statement 'Working Together to Build a Safer Road System'.

The approach promotes 'five pillars' for delivering and managing road safety as listed below:

- Pillar 1: Road Safety Management
- Pillar 2: Safer Roads and Mobility
- Pillar 3: Safer Vehicles
- Pillar 4: Safer Road Users
- Pillar 5: Post Crash Response

The goal of a safe system is to ensure that collisions do not result in serious human injury by developing a road transport system that is better able to accommodate human error and take into consideration the vulnerability of the human body. It recognises that:

- We can never entirely eliminate road collisions because there will always be the potential for some degree of human error;
- When collisions do occur the human body is inherently vulnerable to death or injury; and
- Because of this, we should manage our infrastructure, vehicles and speeds to reduce crash energies to levels that can be tolerated by the human body.

In our strategy we have taken into account the national strategic safe system approach and adapted it to suit the more local needs of the Borough through a wide range of interventions. The relationships to the 'five pillars' are indicated throughout except for Pillar 5, which relates to post-crash emergency responses and longer term rehabilitation for crash victims and therefore does form part of this strategy.

Working in partnership {Pillars 1, 2, 3 & 4}

The Borough's Road Safety activities are delivered through a robust partnership that includes Solihull Metropolitan Borough Council, West Midlands Police West Midlands Fire Service and Solihull Advanced Motorists, affiliated to IAM RoadSmart (formerly called the Institute of Advanced Motorists).

Whilst there is a strong partnership in place we will look to see if there are ways we can improve partnership working and integration between the different organisations. We recognise that each of the partners has an essential role to play and will work together to build on, encourage and develop strong, quality partnership working – playing to the strengths of the agencies involved and co-ordinating the use of complementary skills.

We also work with other groups, including neighbouring highway authorities, and in developing our Safer Road Safety Group partnership we will also consider whether other organisations, such as Highways England, should be invited to take part. Our partnership will look to work with and respond appropriately to the new ways of working as they emerge.

Partnership working case study

Multi Agency Vehicle Examinations

On a monthly basis Solihull Metropolitan Borough Council, West Midlands Police and West Midlands Fire Service work in partnership, together with teams from other organisations, to carry out a series of co-ordinated checks on vehicles and the occupants. The aim of the examinations is to reduce crime and road traffic offences, promote road safety and educate motorists with enforcement action being taken when appropriate.



Each of the individual teams that are invited, listed below, all have different powers, access to different systems and provide differing levels of enforcement or education when it comes to road safety.

- West Midlands Police – have the power to stop vehicles providing certain criteria are met and, if appropriate, take enforcement action for traffic offences.
- West Midlands Fire Service Road Traffic Casualty Reduction Team – educate those that are committing road traffic offences such as not wearing seat belts and incorrect child safety seats / booster seats.
- Solihull Metropolitan Borough Council Licensing Team – have the power to inspect any taxi, private hire vehicle or Hackney carriage and take action if the vehicle is not road worthy. This may include suspending the driver or even revoking the driver's taxi license depending on the severity of the issue.
- Solihull Metropolitan Borough Council Trading Standards – have powers in relation to overweight vehicles and can escort any vehicle that is suspected of being overweight to a nearby weigh bridge for inspection. The team also inspect child safety seats to ensure they meet all the current regulations around safety.
- DVSA (Driver & Vehicle Standards Agency) – have a team of officers who will carry out vehicle inspections and issue prohibitions on vehicles that are not road worthy.
- DVLA (Driver & Vehicle Licensing Agency) – responsible for ensuring that vehicles are licenced. A large number of motorists that drive vehicles without vehicle licences do not

- have insurance cover to drive the vehicle either.
- Her Majesty's Revenue and Customs Officers – check vehicles to ensure they are using the correct fuel and not evading any duty by using red diesel.
- Her Majesty's Courts Warrants Officers – have details about people convicted at court, and have subsequently not paid a fine with powers to arrest any individual that has not and will not pay their fine.
- Immigration Enforcement Officer – have information to conduct citizenship status checks on both EU and non-EU citizens to establish if a motorist is residing in the country illegally.

Smarter data analysis {Pillars 1, 2 & 4}

The system

Analysis of road traffic collisions and those involved is an essential part of our strategy to reduce road traffic casualties.

To analyse road traffic collisions at the moment we use a web based geographical information system called Spectrum, which is supported by the West Midlands local authorities. The system is maintained on their behalf by a consultancy under an agreement that runs until 1st April 2018.

As that agreement comes to an end we propose to work with the West Midlands Combined Authority to review the various collision analysis systems that are available to ensure that we have the most effective and efficient system in place.

How we use data

Effective road safety planning depends on reliable evidence of the real problems, and identification of both long and short term trends. We need to understand when and where collisions occur, who is involved and what the consequences are. We will increasingly make use of more sophisticated approaches to help us understand what groups are most at risk and also how socio-demographic and lifestyle factors contribute.

Our studies need to take account of the greatly reduced number of road traffic casualties in Solihull, particularly those who are killed and seriously injured, and the resources available for road safety analysis. We also wish to have periodic reviews and a flexible response to developing collision types, trends and hot topics that are identified through the data led analysis.

To help us establish any emerging collision locations or routes we will, every two years, carry out a study of all the road traffic collisions that have resulted in a person being injured and all known collision "hot spots" in the Borough. Appendix 2 illustrates the outcomes from the 2016 study. As a result of those studies the difficult task of prioritising the locations for safety improvement projects will be determined and considered for funding along with other highway improvement projects.

In the interim years we will carry out studies that are tailored to identifying our highest risk groups and road users as well as providing information about collisions on differing road types and environments which will help target our activities to maximise the reduction in casualties.

Fatal Collisions

Fortunately there are now very few fatal road traffic collisions in Solihull. However, when they do occur we will work with the Police to investigate the circumstances and, if possible reduce the likelihood of another similar incident.

To help in those fatal collision investigations we will follow the protocol agreed between the Police and the West Midlands local highway authorities which sets out the joint working practices and procedures. The aim of this process is to: -

- Provide a detailed report of the highways infrastructure at the collision location.
- Identify any opportunities to improve road safety at the collision location.
- Improve communications between West Midlands Police and the relative highways authority.

The police make arrangements with the relevant highway authority with the aim of jointly attending the fatal collision scene within 10 days. The site meeting is used to discuss the individual nature of the collision, the environment and any other relevant factors that may have had a bearing on the incident. The highway authority will then prepare a written report on the collision environment, which will be a part of the overall investigation.

Monitoring and Evaluation

Monitoring and evaluating our projects will help us assess how well we are doing and aid continuous improvement. It is about asking what has happened, what has worked and what has not worked. To monitor the impact of programmes our evaluation will include changes in behaviour, attitudes, knowledge and/or skills. The knowledge we gain will enable us to create more effective programmes in the future and to spend money in the best way.

Monitoring the progress and effectiveness of road safety programmes, whether engineering or education measures, will be an integral part of a scheme or project. Whilst costs and outputs are relatively straightforward to monitor, evaluating the impacts for individual programmes can be more difficult. For instance, a particular campaign targeting local young drivers may have a measureable impact if this was the sole intervention but in practice there will be a number of other influences all taking place at the same time.

Behaviour Change {Pillar 4}

Research has shown that the most common techniques currently employed in road safety education are associated with identifying risky behaviour and its consequences with most interventions based on providing information.

They typically provide general information about the link between a target behaviour and the adverse outcomes that might happen, such as greater risk of being hit by a car if you use a mobile phone while crossing the road.

Increasingly we need to design programmes based on psychological behavioural change techniques. There are many factors involved in developing these programmes including encouraging people to think of themselves as a role model who should set a good example and contemplate what others, their peers, think about the risky behaviour.

We will look to develop programmes that address the 'Fatal 4': excess speed, use of mobile phones / electronic devices, failure to wear a seatbelt and drink or drugs.

Driver distraction is an issue that we will particularly want to address. Distraction associated with the use of mobile phones is well known and recently has received a lot of publicity. However, there are many other activities that drivers perform without realising that they are not paying full attention to their driving and we will work through our partnership to raise awareness of these problems.

Behaviour change case study

How Safe Are You?

Awarded the prestigious Prince Michael International Road Safety Award, the 'How Safe Are You?' initiative is a behaviour change programme aimed at Year 7 pupils travelling to secondary school for the first time and has been running in Solihull since 2012. The core of the initiative encourages youngsters to make eye contact with drivers before they step into a road. The initiative also challenges the notion pupils may have that drivers are always responsible for pedestrian collisions or that drivers always notice pedestrians and cyclists.

These pupils are often taken to and collected from primary school by their parents, but now travel alone or with friends for the first time. It has been found that these pupils are more likely to show risky behaviour on their journey to and from school, such as using their phones, listening to music or generally chatting with friends instead of taking the time to look properly when crossing roads. Statistics show that they are more at risk of being involved in a road traffic collision during this transition from primary to secondary school.

This initiative stands out against the often shock tactics for road safety campaigns; instead it targets the behaviour of young pupils which has a lasting positive effect. The presentation has been professionally developed in conjunction with a behavioural psychologist and based on statistical evidence. It is designed to promote behavioural change with students being encouraged to develop their own opinions.

Recently the 'How Safe Are You?' year 7 programme has been complemented by the introduction of another school transition project, 'On the Move!', aimed at helping children in year 6, their last year of primary school, plan how they will travel to secondary school.

These programmes have been very successful in reducing road traffic casualties for this age group and the intention is to continue delivering them to schools across the Borough.

Communication {Pillar 4}

The strategy

We will work to develop a broad based Communication Strategy which will recognise that our communications need to be tailored to the target audience and deliver the right message, at the right time and in the right way. To help us with this work we will collaborate with our specialist communications teams.

We recognise that social marketing can be a very powerful part of behaviour change programmes having a very influential impact on certain groups and we will aim to make better use of these techniques. The strategy will help deliver that improvement by encouraging a joined-up approach to communications that actively looks for opportunities to make the best use of the media and emerging technology to deliver our messages and influence behaviours.

We will also make use of and support Department for Transport national 'Think' road safety messages and publicity particularly when they align with 'our challenges'.

Changing perceptions

The risk of being involved in a fatal or serious road traffic collision is far lower now than at any since the 1930's. However with the enormous increase in traffic, the general perception seems to be that the risk of injury has increased in recent years. The risk in real terms is far lower now but those perceptions of risk can deter people from walking and cycling. Our communication strategy will also aim to dispel some of those perceptions and act as a mechanism to co-ordinate with the work carried out by Solihull's Sustainable Travel Team.

Highway Maintenance {Pillars 1 & 2}

Resistance to skidding

It is important that road surfaces reaching the end of their serviceable skidding resistance are detected and that appropriate action is taken.

To ensure that happens we will follow the West Midlands Skid Resistance Strategy. The aim of the strategy is to provide guidance to ensure that the road surface provides adequate skid resistance to drivers during wet conditions and to target maintenance to reduce related collisions.

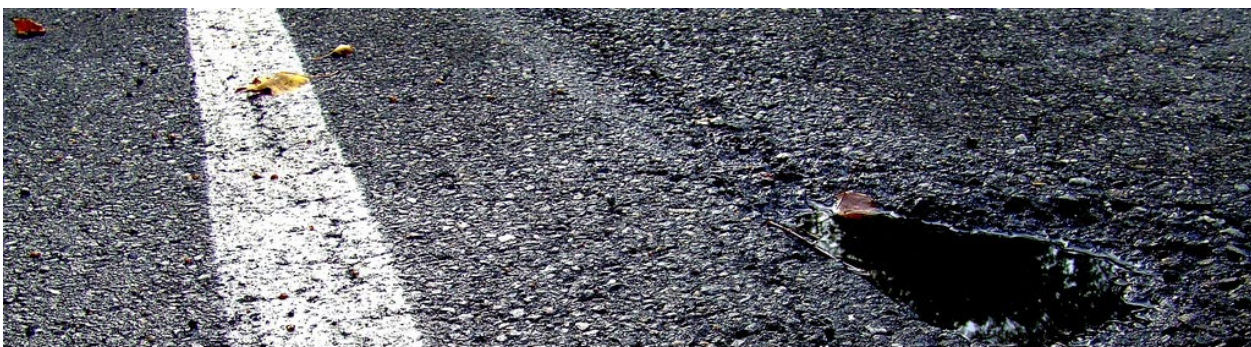
Road safety opportunities

When roads are being resurfaced there is an excellent opportunity, particularly with larger schemes, to make changes to the road layout and to reallocate road space without any significant additional cost. The existing carriageway markings do not need to be removed which not only avoids unsightly and confusing scarring from the previous markings but also saves money. The new surface also presents an opportunity to use contrasting aggregates to create an impression of narrower running lanes which can help towards reducing traffic speeds and providing space for cyclists.

The roads on the annual resurfacing programme will be reviewed and checked against the injury collision data to see if there are any safety improvements that can be made. Where there is no evidence of a historic road safety issue, the road will still be reviewed to see if there are any opportunities to help vulnerable road users or promote cycling and walking.

Managing highway maintenance (Asset management)

We take an asset management led approach to highway maintenance which is aimed at obtaining the optimum life from all our highway assets and ensuring that performance requirements are met. The method is aimed at providing value for money by targeting and timing maintenance programmes, including preventative maintenance, to improve skid resistance and prolong the life of existing road surfaces.



Potholes

Potholes and other uneven road surfaces such as manhole covers are a potential factor in collisions and can be particularly hazardous for people on bicycles or motorcycles. There are systems in place to repair critical areas as quickly as possible and we will review this from time to time to make sure that our surfacing programme keeps the number of potholes that occur to an absolute minimum. The reviews will help us make sure that we are making best use of any new materials and technologies used to repair potholes and reduce the risk of them reoccurring. Similarly we will work with contractors to monitor the market for new road resurfacing materials which are more enduring, to minimise the likelihood of potholes forming, and have a durable skidding resistance.

Street lighting

Street Lighting is a highly visible and vital part of the street scene and has an important role to play in road safety. Information published by the Royal Society for the Prevention of Accidents in August 2015 recognises that the period between 7pm and 8am accounts for only 25% of all travel by car drivers but makes up 40% of car drivers' fatal and serious injuries. The report mentions that pedestrians and vulnerable road users suffer from decreased visibility in the dark and ways of reducing risk to road users during those hours must be found.



The role that street lighting can play in road safety is recognised in the Street lighting strategy which was published in 2012 and includes an upgrade programme of all street lighting to energy efficient LED technology. This upgrade will improve the lighting characteristics of the Borough's roads and greatly enhance reliability. The annual energy bill will also be halved without having to resort to switching off any lanterns.

Inevitably, road traffic collisions occur that involve items of street furniture such as street lighting columns. For most new lighting schemes on rural roads and on major urban roads, where appropriate, passively safe lamp columns to reduce the risk of injury will be installed. When lighting columns or road signs are damaged in road traffic collisions we will carry out an audit to see if there is a safer location for the column or post where it is less likely to be hit again.

Other maintenance

We will take measures to ensure we make best possible use of the resources available in the face of hazards caused by flooding as well as snow and icy conditions. We will reduce the risk of flooding by gaining a better understanding of the condition and capacity of our assets and improving them where necessary. We will also treat road and footway surfaces in accordance with our winter maintenance plan to prevent the formation of ice.

We will also continue to use powers which impact on road safety such as those to cut back overhanging trees and bushes, as well as removal of illegal signs and abandoned vehicles.

Road Design {Pillars 1 & 2}

New developments

When assessing the highway safety implications of new developments, developers will be required to meet and be guided by local and national policy.

In national policy terms, this means the National Planning Policy Framework and specifically paragraph 32 which states:

“All developments that generate significant amounts of movement should be supported by a Transport Statement or Transport Assessment. Plans and decisions should take account of whether:

- the opportunities for sustainable transport modes have been taken up depending on the nature and location of the site, to reduce the need for major transport infrastructure;
- safe and suitable access to the site can be achieved for all people; and
- improvements can be undertaken within the transport network that cost effectively limit the significant impacts of the development. Development should only be prevented or refused on transport grounds where the residual cumulative impacts of development are severe.”

Although the [National Planning Policy Framework](#) introduces a ‘severe harm’ test to refuse development, it is clear that maintaining ‘safe and suitable’ access into site will continue to be an important consideration in determining planning applications.

In local policy terms, this means [Solihull Local Plan](#) and specifically Policy P8 which states:

“All development proposals should have regard to transport efficiency and highway safety: -

- Development will not be permitted which results in a significant increase in delay to vehicles, pedestrians or cyclists or a reduction in safety for any users of the highway or other transport network;
- Travel demands associated with development should be managed to minimise detrimental impact to the efficiency of the highway network;
- Ensure new development reduces the need to travel e.g. by promoting linked trips and encouraging mixed use development where appropriate;
- Provision for parking and servicing will be required in accordance with a Supplementary Planning Document on managing travel demands associated with development.”

In assessing the safety implications of new development, developers will be required to take an evidence based approach that considers local context and expected average trip demand levels by all modes. This should consider pedestrian and cycle access to the development and forecast traffic and parking generation.

Highway Improvement Schemes

When road improvement schemes are being considered, whatever the aim of the scheme, we will investigate the collision record as part of the design process and, where possible, address any safety issues. We will also consider whether it is possible to help vulnerable road users or promote cycling and walking including measures that can help to control traffic.

Accepting that the feasibility of each location has to be assessed on its own merits, we will aim to follow the Chartered Institution of Highways and Transportation advice and good practice guide [Street Design for All](#) and the Department for Transport guidance Manual for Streets 2 (or subsequent revisions). Within that context we will seek to maximise opportunities to deliver high quality public realm in new future developments and major

projects. We will look towards modern approaches to traffic speed management and road safety with street design that includes shared space and de-cluttering.

We recognise the importance of enhancing the quality of the environment of the borough for residents and visitors. Our approach to de-cluttering is a key part in delivering that aspiration and only signs and street furniture which have a positive effect on the attractiveness, ease of use, safety or legibility of the Borough will be installed or retained.



All highway improvement schemes will be subject to either a road safety audit or an assessment based on the thresholds in the Road Safety Assessment Policy & Procedure for Solihull.

Road Safety Audits and Assessments

Road safety audits are undertaken on highway schemes at various stages of their design, construction and completion to ensure that they will not create future road safety problems.

The road safety audit process is used to help achieve this by scrutinising changes to the road network within the Borough, to ensure they are as safe as possible.

To prioritise our resources and ensure they are being used effectively, we have developed our own Road Safety Assessment Policy & Procedure for Solihull following the advice from the Chartered Institution of Highways and Transportation. The policy is based on the likelihood of a scheme having the potential to create future collisions and is linked to the size and complexity of the scheme. Issues such as the impact of the scheme in terms of traffic levels and mix, the status of the road within the road hierarchy and the exposure to risk for vulnerable road users are also taken into account.

Developers will have to follow the requirements set out in the Road Safety Assessment Policy & Procedure, based on the appropriate thresholds, from the planning application stage, through to post-construction monitoring. The requirements will also apply to improvements on existing roads whether as part of a development or a Council highways scheme.

Highway improvement scheme case study



Solihull Gateway

The Solihull Gateway project is an innovative shared space entrance to Solihull town centre. The aim of the project was to reduce the consistently high casualty rate on this relatively short route as well as making Solihull town centre more accessible and convenient. The works also improved and updated the look of the area helping to support the town centre's economy and encourage investment and growth.

We supported these changes with a bespoke training programme for bus drivers to ensure they understood the importance of driving carefully through this shared space and being aware of the needs of a variety of vulnerable road users. Consultation took place with groups such as 'Age UK' and 'Guide Dogs for the Blind' and during the project we assisted vulnerable visitors to minimise disruption and to facilitate the safe and active flow of people smoothly.

- Early indications are that the scheme has been successful in reducing the high casualty rate for this area.
- Feedback received from the public has been very positive and in favour of the project.

Speed management {Pillars 1, 2 & 4} Research

Research shows a strong link between speed and road casualties. Much of this evidence has been demonstrated by studying the average speed of traffic including for example, studies that show how each 1mph reduction in average speed reduces the number of collisions by 5%. The three most important issues to tackle are: -

- Speeding in Rural areas where the problem is often inappropriate speed rather than one of exceeding the speed limit.
- Speeding in Urban areas where there are high numbers of vulnerable road users.
- The most extreme speeds when the speed limits are exceeded by a considerable margin.

Public concern

The results from the listening surveys carried out with the Police and Crime Commissioners office have consistently highlighted inconsiderate speeding as one of the most important things that matter to our communities.

To address those concerns about the speed of traffic there needs to be a better understanding of what type of roads cause the most concern and what kind of interventions residents would like to support. To help us with the issues we will invite the West Midlands Police and Crime Commissioner to consider the feasibility of establishing a regional Focus Group on Traffic Speed Management.

Speed Limits

Over the last few years we have reviewed every road in the Borough that had a speed limit in excess of 30 mph and, where appropriate, changed the speed limit.

We are now looking at roads with 30mph speed limits to see whether some of them should be reduced to 20mph and, following successful pilot schemes elsewhere in England, we agreed to trial 20mph speed limits.

The aim of 20mph speed limits is to make drivers more aware of their behaviour in residential areas and hopefully make them a safer and more enjoyable place to live without providing any additional road humps.



We have already introduced 20mph speed limits in the North Arran Way area of Smiths Wood and in part of the Shirley South area.

The intention is to complete the trial by providing a 20mph speed limit in one more area, evaluate their effectiveness and ascertain local residents' views to help us judge how successful they are in our environment. The assessment will also take account of the findings

of the on-going Department for Transport research into the effectiveness of 20mph speed limits as opposed to 20mph zones. The outcomes from the evaluation will be used as a basis for developing a 20mph policy and assessing the possible roll-out of further 20mph schemes.

We have also recently run a pilot project outside five of our Schools introducing either full-time or part-time 20mph speed limits depending on which was considered to be most appropriate. Some of the part-time 20 mph speed limits were mandatory and others were advisory.

Our evaluation and monitoring has shown that there is very little evidence that the part-time 20mph speed limits outside schools have been successful. On that basis we will only use part-time 20mph speed limits when traffic and safety indicate that there would be a specific benefit or where they can be introduced as part of a wider scheme for the area.

Safety enforcement cameras



We have been working in partnership with the Police and Birmingham City Council to replace the old obsolete wet film speed enforcement cameras with a new digital camera system.

The new system measures average vehicle speeds over a length of road between two cameras encouraging drivers to maintain a constant speed rather than braking and then accelerating at each camera.

The system was switched on in the summer of 2016 with the aim of reducing the number of road traffic casualties by influencing and improving driver behaviour so that they adhere to the speed limit. It is also anticipated that reduced vehicle speeds will have a positive effect for vulnerable road users such as cyclists and pedestrians through a general improvement in safety and a change in the perceptions of danger.

Community speed watch

We acknowledge the value of Community Speed Watch and the future challenges that the initiative faces in terms of resourcing and sustainability. We will look for opportunities to help by: -

- sharing equipment between individual community groups;
- exploring any potential for resourcing opportunities from funding that the West Midlands Police and Crime Commissioner provides to the Safer Solihull Partnership; and
- considering the provision of an initial “on-loan” start-up kit and equipment to new community groups who have expressed an interest to participate.



Connected and autonomous vehicles {Pillar 3}

The government is committed to creating the right environment for connected and autonomous vehicles to be available on our roads in a way that is safe, legal and maximises benefits for all. (Working Together to Build a Safer Road System)

The Government is providing £19 million to fund ‘driverless car’ trials in Bristol, Milton Keynes, Coventry and Greenwich. These will test autonomous vehicle technology in real-world environments, providing valuable insights into how autonomous vehicles operate and how they interact with other road users. At the same time we are already seeing increasing levels of technology, aimed at assisting the driver but increasingly capable of carrying out parts of the driving function. It is anticipated that at the start of the next decade we will see big changes with moves towards full autonomy.

Chart 2 – Components of collisions shows that up to 94% of road collisions have human error as a factor, so driverless cars have huge potential to improve road safety. In recognising the massive road safety, and mobility enhancing, potential of these and other new technologies, we will investigate the possibility of joint working with a vehicle manufacturer to ensure that we are well placed locally to reap the full benefits from the technology.

Pedestrians {Pillar 4}

Child pedestrian training



We have been training child pedestrians in Solihull since 1993 in response to high numbers of child pedestrian casualties in north Solihull.

The courses provide practical road safety training for children aged 6 to 8 and introduce children to the first steps of being a safe pedestrian. The training covers how to recognise safe places to cross, crossing at junctions and coping with parked cars. Trained volunteers, mainly parents or other people connected with schools, are used to provide a safe ratio of adults to children.

Encouraging walking to school

- Park and Stride – Campaigns to encourage parents to park away from the school gate – usually at a car park that could be owned by shops, church, pub etc. in order to reduce potentially dangerous congestion outside schools.
- Car Exclusion Zones – A pilot project to exclude cars from travelling either through or on the roads immediately outside selected schools in the morning and at home time to reduce risk to the safety of children and to encourage active travel.
- Mode Shift Stars – A national sustainable travel award that all Solihull Schools are encouraged to sign up to. To gain a Bronze, Silver or Gold Award schools have to demonstrate a commitment to safe and active travel including promoting road safety within their schools.
- Stroll and Roll – A campaign for primary schools which encourages classes to compete against each other to see which class can complete the most journeys to school by walking, scooting or cycling therefore reducing the amount of traffic congestion outside the school gates.
- Walking bus – Walking buses have been operating in Solihull since 2000 with the aim of reducing traffic congestion outside schools. Run by trained adult supervisors, a walking bus picks up children from a fixed route and walks them to school ensuring that they arrive safely and on time. Walking buses have a positive effect on attendance and punctuality as well as being a healthy way for children to learn valuable road safety skills.

Cycling {Pillars 2 & 4}

Cycling infrastructure development needs to be addressed and further improved if we are to encourage more sustainable travel and keep everyone moving in line with Solihull Connected. The strategic radial cycle routes linking the UKC Hub with east Birmingham and the town centre have been identified as the initial priorities in Solihull Connected Delivery Plan.

It is thought that when the number of cyclists increases there is a tipping point at which motorists become more aware of cyclists. In the Netherlands and Denmark where there have been remarkable increases in the number of people cycling there have also been impressive reductions in the number of cyclists fatally injured.

Solihull's Sustainable Travel Team will continue to deliver and develop our schools cycle training programme in which we also deliver important safety messages. The skills and road awareness that young people acquire through cycling also have the potential to help them be safer when they start driving. The team also deliver adult cycle training and will look to extend that as much as possible.



Our intention is to reduce our cyclist casualty rate by providing better quality on road segregated cycle facilities that encourage more cycling, training cyclists, and making other road users more aware of cyclists. There will be more detail about how we will deliver cycling improvements in the Solihull Cycling and Walking Strategy that will be published in spring/summer 2017.

Motorcycling {Pillars 2 & 4}

Improving skills

Bikesafe is a national initiative run by police services around the country which aims to reduce motorcycling casualties. In the West Midlands, the one day workshops are run from the West Midlands Police Training Centre at Tally Ho in Birmingham.

The course aims to give participants a greater understanding of the current risks involved in riding motorcycles on roads and leave them better equipped to combat them. The course has 3 elements: -

- A classroom discussion forum based on the Bikesafe interactive DVD with the opportunity for riders to interact and ask questions.
- Slow speed handling / manoeuvring in a controlled and safe environment with police riders providing close and personal guidance.
- An accurate and constructive road riding assessment by a fully qualified police motorcyclist.

There is spare capacity on these riding skills lessons and we will work with the Police to promote the sessions with a view to increasing attendance across the full spectrum of motorcyclists.

We will work with the Police to see if the National Driver Offenders Rehabilitation Scheme, RiDE, can be offered to motorcyclists in the West Midlands. RiDE is a course for those motorcyclists whose behaviour has brought them to the attention of the Police and seeks to change riders' attitudes rather than simply issuing a Fixed Penalty Notice.

Road Design

We recognise that people who do not ride motorbikes are less likely to understand all the risks involved in riding motorcycles and in future we will include a group representing motorcyclists in our consultations on new schemes. We will also consider whether the Road Safety Assessment Policy & Procedure should be amended so that, in appropriate circumstances, the team includes a member or observer with experience of motorcycling.

Young Drivers {Pillar 4}

Statistics tell us that nationally, 20% of all drivers involved in a collision are under the age of 25 years and a quarter of all men who die by the age of 25 are killed in road traffic collisions. Road safety problems can be symptomatic of wider sets of local problems such as anti-social behaviour and criminality.

Young Driver Case Study

Multi Agency Pre-Driver Event

The yearly multi-agency pre-driver event has been developed to encourage good behaviour amongst young people before they are legally old enough to drive. Solihull Metropolitan Borough Council, West Midlands Police and West Midlands Fire Service work in partnership, together with the support of the NEC, IAM RoadSmart and Young Drivers to deliver the event. There are generally four workshop-type sessions engaging with young people aged 16 to 17 and highlighting a wide range of road safety issues including distraction, drink/drug driving, speeding, mobile phones and seatbelts as well as a bespoke driving session.

Children {Pillar 4}

In Solihull 41% of children injured in road traffic collisions are pedestrians within the 10 to 15 age group being at highest risk.

We will continue to deliver the award winning 'How Safe Are You?' programme for year 7 pupils and the 'On the Move!' programme aimed at helping children in year 6, their last year of primary school.

These programmes have been very successful in reducing road traffic casualties for this age group and the intention is to continue delivering them to schools across the Borough.

Older People {Pillar 4} **Increasing risk**

The rapidly increasing older population, as well as the greater likelihood of this age group to drive and be more active, makes it likely that their representation in the number of casualties will rise. We will monitor collision data to keep us up to date with the situation and help inform our actions to address any issues that arise.

Eyesight

As we age, our eyes usually begin to fail and, as it is a gradual process, it can be a long time before we notice it. Night vision can be a particular problem for older motorists. In this country we do not generally screen drivers to make sure that their vision is good enough to drive and instead rely on individuals to visit an optician as often as necessary to make sure they can see well enough to drive safely. We are not sure how much of an issue this is but will consider how we can assess the scale of the problem and, if necessary, what steps we can take to encourage drivers to have regular eyesight assessments.

Training

When we can we will support bespoke targeted training programmes to help older people and work with groups such as 'Age UK'. A good example of this is the bespoke training programme we provided for bus drivers who travel through the Poplar Road / Station Road shared space. The training was aimed at making the drivers aware of the wide variety of vulnerable road users, their differing needs and to understand the importance of driving carefully.

Funding {Pillar 1}

We will apply for road safety related grants when appropriate and seek funding from developers to tackle existing problems that are likely to be exacerbated by additional traffic. We will also look for opportunities to work with commercial organisations on road safety projects and explore opportunities for sponsorship when road safety activities are being planned.

When new developments are proposed the Council passes comment on the applications and looks to mitigate the impact of the development on the highway. This can be by either a financial contribution or by the developer delivering highway improvements directly.

The road safety strategy aligns with a number of strategic priorities, particularly the health and wellbeing agenda. Casualty reduction and promotion of measures to increase healthier lifestyles, including active travel, help to reduce health service costs and we will seek support from the health professionals for our activities. There are also opportunities to support road safety and active travel messages when public health services are being delivered.

Appendix 1 – Action Plan

Theme	Key Activities	Timescale
Working in partnership	Strengthen partnership working and develop a co-ordinated and integrated programme of activities with a lead partner nominated for each intervention.	Medium
	Review membership of the Safer Solihull Road Safety Group with a view to inviting other relevant organisations to join.	Short
Smarter data analysis	Work with other West Midlands Local Authorities to ensure that we have the most effective and efficient collision / casualty analysis system.	Short
	Every two years carry out a study of all road traffic collisions that have resulted in a person being injured and all known 'hotspots'	Short/Medium
	Biannually carry out a study of all road traffic collisions that have resulted in a person being injured and all known 'hotspots'	Medium
	Carry out studies to provide information about collisions on different road types and environments.	Medium
	Investigate in detail the collisions on the A34 Stratford Road through Shirley to identify appropriate interventions.	Short
	For each fatal collision work with the police to follow the agreed protocol.	Short
Behaviour change	Increasingly design road safety programmes based on psychological behavioural change techniques.	Medium
Communication	Develop a broad based Communication Strategy which recognises the importance of social marketing.	Medium
Highway maintenance	Follow the West Midlands Skid Resistance Strategy to ensure that the road surface provides adequate skid resistance to drivers during wet conditions.	Short
	Review the annual resurfacing programme against the injury collision data to see if there are any safety improvements that can be made.	Short
	Review the position of lighting columns or road signs damaged in road traffic collisions to see if there is a safer location.	Short
Road design	Recommend refusal/modification of any development that would result in a significant reduction in road safety.	Short
	Investigate the collision record as part of the design of all road improvement schemes. When possible those designs will address any safety issues and help promote cycling and walking.	Short
	Developers and Council highway schemes will follow the requirements set out in the Road Safety Assessment Policy & Procedure, from the planning application stage, through to post construction monitoring.	Short

Speed management	Invite the West Midlands Police and Crime Commissioner to consider the feasibility of establishing a regional Focus Group on Traffic Speed Management.	Medium
	Complete the Borough's trial of 20mph speed limits, evaluate their effectiveness and ascertain local residents' views to help us judge how successful they are in our environment.	Medium
	Work with Birmingham City Council and the Police to evaluate the new digital speed camera system and consider extending the coverage.	Medium
	Support the Community Speed Watch programme.	Short
Connected and autonomous vehicles	Investigate the possibility of joint working with a vehicle manufacturer to make the most of the potentially massive road safety benefits from new vehicle technologies.	Medium/Long
Walking & cycling	Continue and develop programmes to train and encourage walking and cycling.	Short
	Publish a Cycling and Walking Strategy for Solihull in spring/summer 2017.	Short/Medium
Motorcyclists	Include a group representing motorcyclists in our consultations on new schemes.	Short
	Consider including a person with experience of motorcycling in appropriate road safety audits either as a team member or observer.	Medium
	Work with the Police to see if the National Driver Offenders Rehabilitation Scheme, RiDE, can be offered to motorcyclists in the West Midlands.	Long
Young drivers	Develop existing programmes and make use of new technologies, to encourage good attitudes towards driving amongst young people before they are legally old enough to drive.	Short
Children	Deliver the award winning 'How Safe are You?' programme for year 7 pupils and the "On the Move!" programme aimed at helping children in year 6, their last year of primary school.	Short
Older people	Monitor collision data relating to the rapidly increasing older population to help inform our actions to address any issues that arise.	Medium
Finance	Apply for road safety related grants when appropriate and seek funding from developers to tackle existing problems that are likely to be exacerbated by additional traffic.	Medium
	Seek opportunities to work with commercial organisations on road safety projects and explore opportunities for sponsorship when road safety activities are being planned.	Medium

2016 Local Safety Scheme - Single Site Analysis

Based on 4 collisions within a 20 metre radius in Solihull 2013 - 2015

KEY:

	Potential 2017-2018 schemes.
	Activity recently or soon to be carried out (see comments.)
	Not considered to be a viable option post analysis and/or site visit (see comments).

All Single Site Clusters (Ranked on All Collisions)		COLLISIONS						CASUALTIES						OUTPUT	COMMENTS	Statement of Actions
Rank	Description	All	Fatal	Serious	Slight	Severity_Index	Rank based on severity index	All	Fatal	Serious	Slight	Severity_Index	Rank based on severity index			
1	Warwick Road/B425 Lode Lane	8	0	0	8	0.000	4	10	0	0	10	0.00	4	Data + Analysis + Site	6 PIC's due to fail to "Give Way" on Lode Lane (southbound) approach. "Give Way" carriageway marking on Lode Lane (southbound) approach improved in 2016. Possible improvements at Warwick Road/Lode Lane roundabout will be investigated as part of UKC proposals for the town centre.	1). Continue to monitor.
2	Aqueduct Road/Colebrook Road/High Street/Windmill Road	7	0	1	6	0.140	3	7	0	1	6	0.14	3		Local Safety Scheme 2012-13 minor works (roundabout warning sign) complete in October 2012. Roundabout is not clearly visible to drivers. Width of the circulatory may be misleading. (Route Study 48). Improvements undertaken on High Street, Solihull Lodge, including new traffic calming measures and a raised zebra crossing, as part of a housing developer's scheme during 2016/17.	1). Continue to monitor.
3	Stratford Road/Stanway Road	6	0	0	6	0.000	4	10	0	0	10	0.00	4	Data + Analysis	Analysis of the 6 PIC's shows that they were all due to driver error & there is no particular pattern to the incidents which have occurred. Therefore, little scope for engineering intervention.	1). Continue to monitor. 2). Intention is to include as part of future A34 Stratford Road route study if resources become available.
4	Warwick Road/Grange Road	5	0	2	3	0.400	1	6	0	2	4	0.33	1	Data + Analysis	Analysis of the 5 PIC's shows that they were all due to driver error & there is no particular pattern to the incidents which have occurred. Therefore, little scope for engineering intervention at this stage.	1). Continue to monitor to determine if a trend develops.
5	Stratford Road/Church Road	4	0	1	3	0.250	2	4	0	1	3	0.25	2	Data + Analysis	Analysis of the 4 PIC's shows that they were all due to driver error & there is no particular pattern to the incidents which have occurred. Therefore, little scope for engineering intervention.	1). Continue to monitor. 2). Intention is to include as part of future A34 Stratford Road route study if resources become available.
6	Warwick Road/Jacobean Lane	4	0	0	4	0.000	4	6	2	0	4	0.33	1	Data + Analysis + Site	Analysis of 4 PIC's shows that two were due to vehicle overshoots from Jacobean Lane on to Warwick Road. "Stop" sign & line installed previously on Jacobean Lane.	1). Neighbourhood Management to cut back foliage on Jacobean Lane to improve forward visibility of "Stop" sign. 2). "Stop line" carriageway markings to be renewed as part of 2017/18 highway maintenance programme. 3). The condition of the carriageway on Jacobean Lane will be assessed by the Council's Highway Maintenance team to determine whether it is acceptable. 4). Continue to Monitor.
7	Hob's Moat Road/Ulleries Road	4	0	0	4	0.000	4	5	0	0	5	0.00	4		New pelican crossing facility installed in 2010. Road re-surfaced and carriageway markings renewed during 2015/16. "Give Way" carriageway markings on Ulleries Road renewed in 2015/16.	1). Improving trend. 2). Continue to monitor.
8	Poplar Road	4	0	0	4	0.000	4	4	0	0	4	0.00	4	Data + Analysis	Public Realm/Local Safety Scheme undertaken during 2015/16. 3 PIC's prior to the completion of the scheme.	1). Continue to monitor.

2016-2017 Local Safety Scheme (Route) Analysis

- Potential 2017-2018 schemes/minor works.
- Activity recently or due to be carried out (see comments - *Historical works in italics* & **Recent/Programmed works in Bold**).
- Not considered to be a viable option at this time post analysis and/or site visit (see comments.)
- Ranked outside top 30 - no further analysis carried out this year.

All Routes (Ranked on Score)			Personal Injury Collisions (PICs) 3 Years (2013 to 2015)														Average 12 Hr Traffic	Length (KM)	Rate per 100 Million Veh. KM	DfT 'Expected' Rate	Rate Minus Expected	Rank Based on Rate	Score (Rank based on Collisions + Casualties + Rate/3)	OUTPUT	Comments	Actions									
Overall Rank	Route No.	Route Description	COLLISIONS						CASUALTIES																										
			All	Fatal	Serious	Slight	Severity Index	Rank Based on Coll.	All	Fatal	Serious	Slight	Severity Index	Rank Based on Cas.																					
1	9	A34 Stratford Road bet Birmingham boundary & Marshall Lake Road	44	0	3	41	0.068	1	60	0	3	57	0.050	1	26975	4.17	84.53	66	18.53	22	8	Data + Analysis	Heart of Shirley scheme completed in Spring 2014 which included significant highway improvements. 5 permanent vehicle activated signs installed between 2009 and 2012. Existing traffic calming through Shirley. Red route. Moderate rate per 100 m veh. km. Several clusters along this route identified and investigated by 2013-2014 Local Safety Scheme (Single Site) Analysis.	1) Improvements expected to reduce PICs along this route. 2) Intention is to undertake a future route study of the A34 Stratford Road if resources become available. 3) Improving trend; Continue to Monitor.											
2	37	B425 Hobs Moat Road bet boundary & Lode Lane	13	0	2	11	0.154	4	15	0	2	13	0.133	6	17586	1.37	105.50	54	51.50	14	8	Data	New pelican crossing facility installed in 2010. Resurfaced in 2010. No pattern to PIC's. Therefore, no scope for engineering intervention.												
3	48	Colebrook Road/High Street, Solihull Lodge bet Haslucks Green Road & boundary	10	0	2	8	0.200	11	10	0	2	8	0.200	14	12016	2.05	118.18	54	64.18	11	12	Data	Single Site Local Safety Scheme 2010-11 implemented in 2010 (humped zebra crossing on High Street.) Local Safety Scheme Minor Works 2012-13 implemented in 2012 (roundabout signage.) Permanent vehicle activated signs installed in 2009. Developer funded traffic calming scheme undertaken on High Street, Solihull Lodge, in 2016.												
4	3	A41 Warwick Road bet Seven Star Road & boundary	23	0	2	21	0.087	2	32	0	2	30	0.063	2	19724	2.76	66.01	66	0.01	33	12	Data	Permanent vehicle activated sign installed in Olton Hollow in 2010. Potential Single Site Local Safety Scheme 2012-13 (signalisation of A41/Grange Road JCT) "deferred as initial investigations indicate that stats costs may be too high, further consideration needed." Smart Route Local Safety Scheme 2016-17 (HFS, VAS, relocation of bus shelter/splitter and alterations to A41/Heaton Road JCT.) Upgrade of traffic signal installation at Warwick Road/Seven Star Road on LTP list for future consideration & programming.	1). Continue to Monitor.											
5	60	Moorend Avenue/Alcott Lane bet Chemsley Road & Station Road	7	0	0	7	0.000	18	11	0	0	11	0.000	12	7808	2.32	126.01	54	72.01	7	12	Data	Walking and Cycling Scheme 2010-11 implemented in 2011 (Toucan crossing facility and realignment of carriageway.) Significant changes to the highway implemented by 2010 as part of the redevelopment of the Town Centre. Sections resurfaced in 2009, 2011 and 2012. No pattern to PIC's. Therefore, no scope for engineering intervention.												
6	36	B4102 Marshall Lake Road/Blossomfield Road bet A34 Stratford Road & Streetsbrook Road	12	0	1	11	0.083	7	13	0	1	11	0.077	10	14936	3.29	71.49	54	17.49	23	13	Data	Walking and Cycling Scheme 2011-2012 (signal changes and pedestrian facilities at Widney Lane junction) implemented in 2011. Safety camera installed on Blossomfield Road in 2009. Clusters identified and investigated by 2013-2014 Local Safety Scheme (Single Site) Analysis. New traffic signals installed at Blossomfield Road/Dingle Lane junction in 2016/17.												
7	85	Poplar Road/Station Road	7	0	0	7	0.000	20	8	0	0	8	0.000	23	2838	0.28	1042.75	54	988.75	1	15	Data	Safety and public realm improvements undertaken in 2015/16.												
8	59	Bosworth Drive bet Moorend Avenue & boundary	11	1	2	8	0.273	8	15	1	2	12	0.200	5	7699	1.75	50.24	54	-3.76	37	17	Data	No pattern to PIC's. Therefore, no scope for engineering intervention.												
9	4	A41 Seven Star Road/Solihull Bypass bet A41 Warwick Road & Hampton Lane	8	0	1	7	0.125	13	10	0	1	9	0.100	15	13695	2.55	83.21	66	17.21	24	17	Data	Single Site Local Safety Scheme 2011-12 implemented in August 2011 (pedestrian facilities and separate right turn signal stage at Yew Tree Lane junction).	1) Continue to monitor.											

Appendix 2

2016-2017 Local Safety Scheme (Route) Analysis

Overall Rank	Route No.	Route Description	All	Fatal	Serious	Slight	Severity Index	Rank Based on Coll.	All	Fatal	Serious	Slight	Severity Index	Rank Based on Cas.	Average 12 Hr Traffic	Length (KM)	Rate per 100 Million Veh. KM	DfT 'Expected' Rate	Rate Minus Expected	Rank Based on Rate	Score (Rank based on Collisions + Casualties + Rate/3)	OUTPUT	Comments	Actions
10	23	B4114 Chester Road bet Bradford Road & Cooks Lane	12	0	1	12	0.083	6	13	0	1	12	0.077	9	13121	3.54	43.79	54	-10.21	42	19	Route Local Safety Scheme 2011-12 implemented in July 2011 (removal of deceleration lane at Hazelhurst Road junction and new VAS). Hurst Place Public Realm scheme undertaken during 2015/16. Average speed camera installed on Chester Road in 2016/17.	1) Improving trend; continue to monitor.	
11	58	Green Lane/Auckland Drive/Windward Way	7	0	2	5	0.286	17	7	0	2	5	0.286	25	4691	6.05	83.18	54	29.18	17	20	Existing traffic calming on Green Lane and part of Auckland Drive, some of which was remodelled in June 2009, in response to complaints from residents. New table-top junction installed at junction of Green Lane/Windward Way in November 2010 and another at junction of Burtons Way/Windward Way in August 2012. Significant improvements completed as part of North Solihull Regeneration, Strategic Cycle Network and nearby 20mph speed limit pilot scheme. Main Speed/Visor campaign carried out as of April 2012. Proposed zebra crossing & raised platform at Windward Way/Arran Way on LTP list for future prioritisation & programming.	1) Improving trend. Continue to Monitor.	
12	2	A45 Coventry Road bet Old Damson Lane & M42	12	0	3	9	0.250	5	15	0	3	12	0.200	4	35224	5.25	7.29	34	-26.71	56	22	A45 Corridor Highway Improvement undertaken in 2016/17 including carriageway widening & improved signing and lining. No pattern to PIC's. Therefore, no scope for engineering intervention.	1). Continue to Monitor.	
13	41	B4025 Streetsbrook Road bet Lode Lane & boundary	16	0	3	13	0.188	3	20	0	3	17	0.150	3	14676	3.32	26.07	54	-27.93	59	22	New safety camera installed in 2009. New VAS installed in 2010 near boundary. Streetsbrook Road/Ashleigh Road junction improvement undertaken in 2015/16. No pattern to PIC's. Therefore, no scope for engineering intervention.		
14	42	B4102/B4025 Warwick Road bet Lode Lane & Brueton Park RBT	7	0	1	6	0.143	15	8	0	1	7	0.125	19	21131	2.41	58.09	54	4.09	31	22	Walking and Cycling Scheme 2011-12 implemented in 2012 (signal changes and pedestrian facilities at New Road junction.) Single Site Local Safety Scheme 2010-11 implemented in 2010 at Warwick Road/Lode Lane roundabout (build-outs, hatching with coloured surfacing, vegetation removal and realignment of give way.) The junction of Warwick Road/Lode Lane junction is to be reviewed as part of UKC proposals for the town centre.		
15	49	Haslucks Green Road bet Colebrook Road & boundary	5	0	2	3	0.400	29	6	0	2	4	0.333	33	6635	0.90	114.70	54	60.70	12	25	Single Site Local Safety Scheme 2010-11 implemented in January 2011 (humped zebra crossing facility near Sansome Road.) Safety improvements implemented in 2012 (junction warning VAS and high friction surface on the approach to the Station car park in response to community concern.) New zebra crossing installed near Shirley Train Station as part of Sainsburys development.	1) Improvements expected to reduce PICs. 2) Continue to monitor.	
16	20	B4118 Water Orton Road bet Chester Road & boundary	4	0	0	4	0.000	35	7	0	0	7	0.000	28	8461	1.68	85.81	54	31.81	15	26	Four permanent vehicle activated signs installed between 2006 and 2010. Existing traffic calming on SB approach to Parkfield Drive. Traffic splitter islands and refuges along entire length.		
17	1	A45 Coventry Road bet boundary & Old Damson Lane	10	0	0	10	0.000	9	15	0	0	15	0.000	7	35823	1.89	4.44	34	-29.56	63	26	Toucan crossing installed on A45, near Damson Lane, in 2016/17. A45 Coventry Road (northbound) resurfaced during 2015/16. 3 PIC's are rear end shunts on the Coventry Road (northbound) at the junction with Damson Parkway.	1). Continue to monitor.	

Appendix 2

2016-2017 Local Safety Scheme (Route) Analysis

Overall Rank	Route No.	Route Description	All	Fatal	Serious	Slight	Severity Index	Rank Based on Coll.	All	Fatal	Serious	Slight	Severity Index	Rank Based on Cas.	Average 12 Hr Traffic	Length (KM)	Rate per 100 Million Veh. KM	DfT 'Expected' Rate	Rate Minus Expected	Rank Based on Rate	Score (Rank based on Collisions + Casualties + Rate/3)	OUTPUT	Comments	Actions
18	39	B425 Lode Lane bet Dove House Lane & Seven Star Road	6	0	1	5	0.167	25	7	0	1	6	0.143	27	16384	1.42	67.64	54	13.64	27	26	Proposed Local Safety and Cycle Improvement Scheme 2013-14 (mandatory cycle route on both sides of Lode Lane between Seven Star Road and Moat Lane) identified through 2013-14 Local Safety Scheme (Single Site) Analysis. Two safety cameras installed in 2008. Main SpeedVisor campaign carried out as of Sept 2012. Red route. Traffic splitter islands and refuges along entire length. Lode Lane Enhancement Scheme undertaken in 2016/17. Average speed camera installed on Lode Lane in 2016/17.		
19	50	Cooks Lane bet Chester Road & boundary	6	0	0	6	0.000	27	7	0	0	7	0.000	29	12909	1.60	67.72	54	13.72	26	27	Route Local Safety Scheme 2011-12 (traffic calming) scaled back due to lack of support from the local community. Gateway features installed and waiting restrictions implemented in April 2012. Permanent vehicle activated sign installed in 2009. Main SpeedVisor campaign carried out in Summer 2011. Existing humped zebra crossings.		
20	63	Coleshill Heath Road bet Chester Road & Bickenhill Parkway	5	0	1	4	0.200	31	7	0	2	5	0.286	26	8349	2.01	71.03	54	17.03	25	27	Data New pelican crossing facility installed 2011. Two permanent vehicle activated signs installed in 2009. The Coleshill Heath Road is a site for regular mobile safety camera enforcement undertaken by West Midlands Police.		
21	16	A452 Kenilworth Road bet A45 & Hallmeadow Road	10	0	3	7	0.300	10	13	0	3	10	0.231	8	15859	11.77	4.11	34	-29.89	65	28	A major highway improvement is to be undertaken on the A452 Kenilworth Road as part of proposals for HS2.	1) Improving trend; Continue to monitor.	
22	6	A4141 Warwick Road bet A41 Solihull Bypass & Wychwood Avenue	6	0	0	6	0.000	21	8	0	0	8	0.000	21	14642	1.96	55.64	66	-10.36	43	28	Data Highways Agency Safety Scheme completed in June 2011 (signalisation of M42 Junction 5 roundabout.) Two new 40mph/elderly persons warning vehicle activated signs installed in 2012 on approaches to Sunrise of Knowle. 5 PIC's occurred on Warwick Road, Knowle, by the junction with Jacobean Lane. The site appears as a single site cluster in the 2016/17 analysis.	1) Maintenance improvements to be undertaken at Warwick Road/Jacobean Lane as part of single site analysis outcome. 2) Continue to monitor.	
23	33	B4101 Station Rd/Kenilworth Road bet Grange Road & Canal Bridge	6	0	2	4	0.333	23	6	0	2	4	0.333	32	8115	3.03	53.80	54	-0.20	34	30	Data Safer Routes to School Scheme implemented in 2010 (including traffic calming nr Lodge Road.) *Cycle improvement scheme not supported by the community, 20mph speed limit outside school due to be looked at again in 2013-14. Waitrose development approved by planning committee in Nov 2012, to include some improvements nearby. Pedestrian crossing assessment and study of Wilsons Road/Kenilworth Road junction concluded that pedestrian crossing and/or one way system is not suitable and would most likely increase PICs.	1) Improvements expected to reduce PICs. 2) Monitor.	
24	46	Olton Road bet Streetsbrook Road & Stratford Road	4	0	0	4	0.000	39	5	0	0	5	0.000	42	10567	0.78	124.24	54	70.24	8	30	Route Local Safety Scheme implemented in 2010 (new VAS, reflective posts, carriageway markings and vegetation removal.) Main SpeedVisor campaign carried out in Summer 2011. Heart of Shirley scheme completed, in Spring 2014, which included significant highway improvements.		
25	52	Bills Lane bet Stratford Road & Burman Road	4	0	1	3	0.250	40	4	0	1	3	0.250	46	5798	0.83	260.17	54	206.17	3	30	Proposed Route Local Safety Scheme and Safer Routes to School Scheme 2010-11 (traffic calming) *Scheme not supported by the community and minor improvements implemented in places. Main SpeedVisor campaign carried out as of April 2011.		
26	22	B4114 Bradford Road bet boundary & Chester Road	4	0	0	4	0.000	36	6	0	0	6	0.000	36	12265	1.61	72.75	54	18.75	21	31	Safety camera installed in 2008. Main SpeedVisor campaign carried out as of April 2012. Existing pelican crossing facilities at or near to most junctions. Pedestrian refuges along entire length. Average speed camera installed on Bradford Road in 2016/17.		

