

## POPE of Major Schemes Summary Report

Scheme Title	<b>A5 Weeford Fazeley Improvement</b>
Opening Date	October 2005
POPE Stage	One Year After

### Scheme Description

The scheme comprised the construction of dual carriageway between the A5 at Fazeley and the junction with the A38 / A5 at Weeford Island. Specific elements of the scheme included:

- ◆ 3 mile section of new two lane dual carriageway between the existing A5 south of Tamworth and the Junction with the A5 and A38.
- ◆ Grade separation of the A38/A5 Weeford Junction.
- ◆ Environmental mitigation measures to reduce the impact of the new route.

Objectives (from Public Inquiry Statement of Case)	Objective Achieved?
◆ Improve journey times and reliability for trunk road traffic on A5 and A38, including reducing congestion at the Weeford roundabout.	Yes
◆ Reduce the number of accidents along the A5 and A38 at the junction, and improve the safety of pedestrians along the former route of the A5.	Yes
◆ To improve the air quality and noise levels along the former A5.	Yes
◆ To assist regeneration as the scheme is within the West Midland Assisted Area and European Regional Development Fund Area.	Too early to conclude

### Key Findings

- The objective of the A5 Weeford Fazeley Scheme to improve journey times and reliability on the A5 and A38 has been achieved.
- The number of accidents has reduced on the A5 route, and at the A38 junction at a statistically significant level. Accident severity has also reduced, with no fatal accidents after opening, therefore the safety objective has been achieved.
- The reduction in accidents is higher than predicted. The predictions were based on COBA default accident rates rather than observed figures.
- Predicted traffic volumes were reasonably accurate with observed traffic on both the old and new road between the high and low growth forecast.
- The split between the old and new road was less accurate, with more traffic on the old road than predicted, but the differences in absolute numbers is small.
- There has been re-routing of traffic from parallel roads in the corridor.
- Journey time savings are found on the new A5, old route and A38.
- Both journey time savings and accident benefits are above forecast, leading to a higher BCR than predicted, despite outturn costs being higher than forecast. The HA has since improved its cost estimating method in order to improve accuracy.
- Environmental impacts generally as expected and mitigation measures have been incorporated as planned.
- The scheme has contributed to achievement of objectives in local plans and policies, but it is too early to assess the impact of the scheme on regeneration, although the potential for development has improved.

## Summary of Scheme Impacts

### Traffic

- The new dual carriageway section is used by 23,700 vehicles per day (vpd), of which 23% are HGV's.
- Traffic volume on the old A5 has decreased by between 87-92%.
- Opening year traffic on the new A5 was accurate compared to the forecast flows, but the level of traffic remaining on the former route of the A5 was slightly higher than the forecast, although the absolute differences in numbers are small.
- Total traffic flow volumes using the A5 corridor (both the old and new road) have increased by 35%, this is likely to be due to localised rerouting to take advantage of shorter journey times.
- Journey times for the new A5 route have improved, with savings of at least 3 minutes at any time of the day compared to the old road. Journey times on the old A5 route have improved, with speeds increasing due to less congestion.
- Journey times on the A38 have also improved, due to the grade separation of the roundabout, removing the pinch point on this route.

### Safety

- There has been a large reduction in the annual average number of accidents after opening compared to before scheme opening, with the number of personal injury accidents (PIAs) almost halving to just over 9. This is higher than the first year of opening forecast saving of 5. The predictions were based on COBA default accident rates rather than observed figures.
- The reductions have taken place at both the junction and bypass section of the scheme and are statistically significant.
- The accident rate on the bypass is below the national average for a road of this type.
- The accident rate for the Weeford Island junction has also reduced from 0.32 to 0.13.
- There is an annual casualty saving of 12 compared to before opening.
- There is a slight reduction in accident severity one year after opening, although this would require at least 3 years data to be fully evaluated.

### Environment

- Based on traffic flows, it is likely that the predicted improvements to the local noise and local air quality for the majority of properties along the old A5 have been realised. Due to the significant reductions in traffic volumes the impacts are positive as expected.
- Landscape, biodiversity and water impacts are also as expected, and some aspects were thought to be better than expected by one consultee.
- Continued establishment of the landscape planting will be required to ensure that screening objectives are met long term.
- Contrary to pre-scheme concerns it is understood that the scheme did not disturb large areas of archaeology.
- Impacts on other environmental objectives are as expected and mitigation measures have been implemented as planned

### Accessibility

- Severance has improved for Hints Village due to the reduction of traffic on the old A5.
- In addition the provision of bridleway and cycle/pedestrian crossing facilities over the A38 will have improved local access and safety for non-motorised users.
- As expected, the scheme has had no impact on access to the public transport system or option values.

### Integration

- The scheme has enabled a high standard link between the A38, M6 Toll and M42, which is likely to increase the attractiveness of the surrounding area to future investment. The scheme is consistent with local policies.
- However, land-use changes generally take a number of years and will be assessed in more detail in the Five Year After Study.

### Summary of Economic Performance

All in 1998 prices, discounted to 1998	Forecast Low Growth	Forecast High Growth	Post-opening reforecast
Journey Time Benefits	£46.0m	£120.8m	£132.6m
Safety benefits	£7.5m	£7.9m	£14.9m
Total 30 Year Benefits (PVB 1998 prices)	£53.5m	£128.7m	£147.5m
Costs (PVC 1998 Prices)	£26.0m	£26.0m	£21.9m
Benefit Cost Ratio (BCR)	2.1	4.95	6.9

- Journey time benefits at £132.6 are above both the low and high growth predictions;
- Accident benefits are almost double the prediction;
- Present Values of Cost (PVC) are used in scheme appraisals and evaluations as a way of comparing expenditure that happens in different years. Out-turn costs (once converted to PVC) at £21.9m, are lower than forecast. However this is mainly due to the fact that the expenditure happened later than anticipated. Undiscounted expenditure was £2.5m more than predicted (1998 prices), therefore it is considered that the cost forecast was reasonably accurate. Further details are available in the full report; and
- The higher than predicted benefits result in the BCR being 6.9, above the high growth forecast and representing excellent value for money.

This document summarises the findings of the five year after post opening evaluation study completed in October 2008.