

5 Option Costs

5.1 Introduction

This Chapter of the report summarises the high level, preliminary costs of each of the options, including the costs of infrastructure, station interchange and facility costs.

Allowances are made in the costs for project management and development costs, Network Rail costs, risk and contingency. In addition, the level of optimism bias in the costs at 66% is assumed, which is in accordance with TfGM's and the DfT's guidance for the appraisal of major transport schemes (involving rail) at the preliminary stage of development.

5.2 Do-minimum Costs

The following assumptions are made on do-minimum costs.

- Signing and Information – a number of measures will be provided in the town centre including the Wayfinder signage. While making this assumption, the strategy for locating elements of signage will need to appropriately reflect the ultimate option chosen.
- Car park size and revenues – no change in revenue at the North Western Station. The same number of spaces will be provided even if the location of the car park is changed, and where this results in the requirement for additional capacity provision (e.g. an additional level on the multi-storey car park), this is factored into the costs.
- Highway maintenance in the town centre – assumed highway maintenance in Wallgate area even if no scheme developed, resulting in no net change in costs with the scheme.
- Existing bus station costs – loss in departure charges if a bus station is not provided. No extra advertising gained from new scheme.
- Railway station management – no change in management operating costs of current station (bus and rail).
- Rail and bus retailing – no additional revenue assumed due to a lack of detail of known, proposed outlets.
- Rail Service operating costs – assumed to be unchanged in the options – no extra stock, miles or station calls.
- Change in departure charges is reflected in each option as part of the operating costs.

5.3 Costs of Options

The key costs for each option are highlighted in Table 5.1. The table lists the main capital costs, operating costs and any key cost savings as a result of implementing each option:

Table 5.1: Summary of Cost Issues

Option	Main Capital Costs	Operating / Renewal Costs	Other Costs
1A – Bus Loop and Super Stops	<ul style="list-style-type: none"> • Super Stops along the full length of the proposed circuit, including high quality waiting facilities and real time information • Enhancement of pedestrian link between Wigan North Western area and King Street • Minor highway works associated with improvements. 	<ul style="list-style-type: none"> • Cost of maintaining Super Stops assumed to be equivalent to savings made in maintaining old bus station • Additional cost accounted for in operating and maintaining the enhanced pedestrian link to ensure continuity of route attractiveness. • Renewal costs for new facilities. 	<ul style="list-style-type: none"> • Land cost sales for bus station
1B – Bus Spinal Services through Town Centre	Same cost assumptions made as for Option 1A	Same cost assumptions made as for Option 1A	Same cost assumptions made as for Option 1A
2 – New Rail and Bus Interchange at North Western	<ul style="list-style-type: none"> • Replacement platforms associated with Wallgate station closure. • Provision of new bus station, including terminus, building, taxi rank and kiss & ride facilities. • Relocation of existing car park, with additional level to maintain current capacity. • Super Stops on King Street. • Enhancement of pedestrian link between Wigan North Western area and King Street, including replacement bridge (incorporating access to new platforms). • Further public realm improvements on Wallgate to enhance restricted access area. • Minor highway works associated with improvements. • Not assumed to be any requirement for property purchase on Wallgate. 	<ul style="list-style-type: none"> • Cost of maintaining new bus station assumed to be equivalent to savings made in maintaining old bus station. Same principle applied to Wallgate platforms. • Savings could be made on new build and in amalgamating interchange facilities at one location. These savings have not been accounted for. • Additional cost accounted for in operating and maintaining the enhanced pedestrian link to ensure continuity of route attractiveness, associated with additional car park level and Wallgate restricted movement area. • Renewal costs for new facilities. 	<ul style="list-style-type: none"> • Costs from selling existing Wallgate station for commercial (or other) use are assumed to be minimal. • Land cost sales for bus station
3A – Combining Options 1A and 2.	Combination of Options 1A and 2	Combination of Options 1A and 2	Combination of Options 1A and 2

Option	Main Capital Costs	Operating / Renewal Costs	Other Costs
3B - Options 1B and 2, with Wallgate Station Relocation	Combination of Options 1B and 2 and includes relating to the closure/relocation of Wallgate Rail Station	Combination of Options 1B and 2 and includes relating to the closure/relocation of Wallgate Rail Station	Combination of Options 1B and 2 and includes relating to the closure/relocation of Wallgate Rail Station
4 – North Western Access and Queen Street Super Stops	<ul style="list-style-type: none"> • Creation of pedestrian link between Wigan North Western and Queen Street (through arches and internal amendments to station). • Super Stops on King Street West and Queen Street. • Further public realm improvements on Wallgate to enhance restricted access area. 	<ul style="list-style-type: none"> • Additional cost accounted for in operating and maintaining all new facilities. • Renewal costs for new facilities. 	None
5 – Rodney Street Link to Interchange at North Western	<ul style="list-style-type: none"> • Provision of new bus station, including terminus, building, taxi rank and kiss & ride facilities. • Creation of new link road between King Street / Rodney Street and Wallgate, including new junctions and railway bridge. • Relocation of existing car park, with an additional level to maintain current capacity. • Enhancement of pedestrian link between Wigan North Western area and King Street and creation of better links between relocated car park and King Street • Super Stop on King Street. • Further public realm improvements on Wallgate to enhance restricted access area. 	<ul style="list-style-type: none"> • Cost of maintaining new bus station assumed to be equivalent to savings made in maintaining old bus station. • In reality, savings could be made on new build and in amalgamating interchange facilities at one location. These savings have not been accounted for. • Additional cost accounted for in operating and maintaining all new facilities. • Renewal costs for new facilities. 	<ul style="list-style-type: none"> • Land cost sales for bus station. • Costs of purchasing land (MFI site).

Option	Main Capital Costs	Operating / Renewal Costs	Other Costs
6 - Balanced Option	<ul style="list-style-type: none"> • Provision of new smaller replacement bus station at site of current bus station. • Provision of new small bus station (at Wigan North Western Station), including terminus, building, taxi rank and kiss & ride facilities. • Provision of enhanced integrated facilities (ticketing, information, signing) at North Western facility. • Enhancement of pedestrian link between Wigan North Western area and King Street (including forming of a more direct link through car park). • Further public realm improvements on Wallgate to enhance restricted access area. • Provision of second entrance to Wigan Wallgate station from King Street West in form of a bridged entrance to platforms. 	<ul style="list-style-type: none"> • Cost of maintaining new bus station (at existing location) assumed to be equivalent to savings made in maintaining old bus station. • Additional cost accounted for in operating and maintaining all other new facilities, including “second” bus station. • Renewal costs for new facilities. 	<ul style="list-style-type: none"> • Land cost sales for approximately 2/3 of current bus station.

5.4 Source of Cost Information

In developing this initial broad understanding of scheme costs, a number of sources have been investigated. These are summarised as follows:

- The costs associated with the provision of similar high quality Super Stops in other locations, including recent examples from Birmingham and Horncastle (Lincolnshire).
- Additional public realm improvements are envisaged to be at a similar financial level to the current street scene improvements.
- Interchange facilities costs are founded on those associated with other recently completed / currently planned TfGM schemes.
- Cost estimates associated with the provision of new platforms / pedestrian bridges have been gained from the recent Leigh Area Rail Study.
- Costs associated with the provision of the new link road between King Street / Rodney Street and Wallgate are based on similar projects including complexities such as new railway bridges.
- Land cost / sale values have been determined based on a typical land value of £350 per sq m. The potential commercial benefits associated with the closure of Wigan Wallgate station are assumed to be minimal at this stage.
- Given their specific nature, broad estimations have been made in relation to:
 - Pedestrian link enhancements (Wigan North Western to King Street);
 - Creation of new pedestrian access to Wigan North Western (through arches from Queen Street);
 - Minor highway works; and
 - The relocation of the car park.

5.5 Project and Contingency Costs

Allowances are made for project and contingency costs as a proportion of total capital costs, as follows:

- Project management – 15%
- Project design and development – 15%
- Interfacing and commissioning costs – 15%
- Network Rail costs – 15%
- Contingency (optimum bias) – 66%

The level of utility costs has not been investigated at this stage and will require further consideration at subsequent stages of the schemes progression.

5.6 Capital Costs

Based on the above information in relation to the do-minimum costs, the cost complexities of each option, the sources of cost information and the project and contingency costs, an estimation of likely capital costs has been developed and is provided in Table 5.2.

Table 5.2: Option Capital Costs (All Values in 2011 Prices, £m's)

Item	Option 1A	Option 1B	Option 2	Option 3A	Option 3B	Option 4	Option 5	Option 6
New Link Road (and Railway Bridge)	-	-	-	-	-	-	£15.00	-
Bus Station Infrastructure (and associated Facilities)	-	-	£10.50	£10.50	£10.50	-	£10.50	£9.25
Platforms (and associated Facilities)	-	-	£4.00	£4.00	£4.00	-	-	-
Provision of Super Stops	£0.41	£0.41	£0.03	£0.31	£0.31	£0.40	£0.03	-
Wallgate Public Realm Improvements	-	-	£1.00	£1.00	£1.00	£1.00	£1.00	£1.00
Wallgate Station Second Entrance	-	-	-	-	-	-	-	£0.60
North Western – Queen Street link	-	-	-	-	-	£0.50	-	-
King Street Pedestrian Link Enhancement	£0.20	£0.20	£0.10	£0.20	£0.20	-	£0.20	£0.40
Car Park Relocation	-	-	£0.20	£0.20	£0.20	-	£0.20	-
Car Park – King Street Pedestrian Link	-	-	-	-	-	-	£0.10	-
Supporting Highway Works	£0.30	£0.30	£0.05	£0.30	£0.30	-	-	-
Sub-total	£0.91	£0.91	£15.88	£16.67	£16.67	£1.90	£27.03	£11.25
Project / Contingency Costs	£1.15	£1.15	£20.01	£21.01	£21.01	£2.39	£34.06	£14.18
Total	£2.06	£2.06	£35.89	£37.68	£37.68	£4.29	£61.09	£25.43

5.7 Operating / Renewal Costs

Operating and renewal costs have been estimated on the basis of the assumptions outlined above in Table 5.3, where it can be summarised that consideration has been given to the operating / renewal costs associated with the newly provided facilities (0.6% of capital costs for each element per annum), whilst also taking into account the operating / renewal savings made in relation to any closure of existing facilities. The table below presents the annual operating and renewal costs for each option.

Table 5.3: Option Annual Operating / Renewal Costs (All Values in Absolute 2011 Prices £'s)

Item	Option 1A	Option 1B	Option 2	Option 3A	Option 3B	Option 4	Option 5	Option 6
Operating Costs	£1,200	£1,200	£11,400	£12,600	£12,600	£11,400	£99,180	£36,000
Renewal Costs	£5,460	£5,460	£95,280	£100,040	£100,040	£11,400	£162,180	£36,000

5.8 Other Costs

Accounting for the uncertainty of these occurring, a series of other costs associated primarily with the land purchase requirements (which require further investigation) and land sale opportunities (which are not guaranteed) have been considered. Table 5.4 summarises these other costs for each option (**negative values** indicating a net income).

Table 5.4: Other Costs (All Values in 2011 Prices, £m's)

Item	Option 1A	Option 1B	Option 2	Option 3A	Option 3B	Option 4	Option 5	Option 6
Other Costs	-£2.84	-£2.84	-£2.84	-£2.84	-£2.84	-	-£1.79	-£1.90

5.9 Costs Summary

Bringing together each element of the cost assessment of each of the options, Table 5.5 below provides the headline costs for each option (a **negative value** indicating a net income)

Table 5.5: Costs Summary (All Values in Absolute 2011 Prices, £'s)

Item	Option 1A	Option 1B	Option 2	Option 3A	Option 3B	Option 4	Option 5	Option 6
Capital Costs	£2,056,600	£2,056,600	£35,888,900	£37,681,733	£37,681,733	£4,294,000	£61,087,800	£25,425,000
Annual Operating costs	£1,200	£1,200	£11,400	£12,600	£12,600	£11,400	£99,180	£36,000
Annual Renewal costs	£5,460	£5,460	£95,280	£100,040	£100,040	£11,400	£162,180	£36,000
Other costs	-£2,843,750	-£2,843,750	-£2,843,750	-£2,843,750	-£2,843,750	-	-£1,793,750	-£1,895,833

6 Appraisal of Options

6.1 Introduction

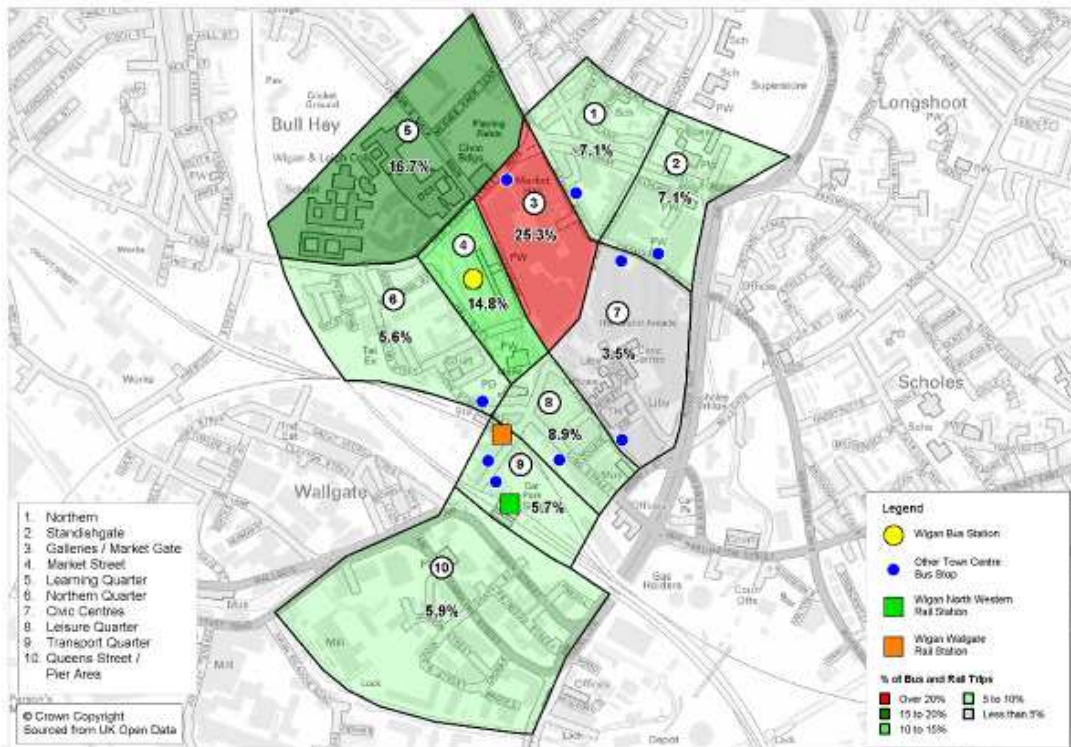
This Chapter of the report summarises the results of the outline appraisal of preferred options. The value for money analysis covered economic appraisal, which included the generation of TfGM BCR (Benefit Cost Ratio) values. Benefits of the options were estimated using the baseline data, GMPSM2PT models information and the standard TfGM appraisal template. Included in the template were revenue impacts for all public transport modes and scheme costs, including capital, maintenance, renewals and operating costs, and reflect the requirements of the DfT’s WebTAG, and Network Rail’s GRIP, processes.

6.2 Demand Assessments

A spreadsheet demand model was built to assess the impacts of the proposed options and to estimate the benefits and other impacts. The model was based on the following inputs:

- NRTS data.
- HFAS data – public transport.
- Timetable data for all services.
- TfGM count data.
- Outputs from SPM2PT model (base year 2008 validation model for AM and IP).
- Zoning as presented in Sector Map (Figure 6.1).

Figure 6.1: Town Centre Sectors and Demands



The output of the model for each option is as below:

- Change in walk and on-bus time by sector and corridor, weighted by demand
- Use of stops in the centre by stop cluster.
- Bus resource change and costs by route and corridor
- Change in revenue and operator margin

The assessment of options is based on the following:

- 1 – Bus Loop and Super Stops – assuming services enter and leave the town centre via the current cordon points and travel around the proposed loop in either a clockwise or anticlockwise direction.
- 2 – New Rail and Bus Interchange at North Western – assuming the current bus services route with all services terminating at the new interchange adjacent to North Western station. Routes are extended or truncated to this point, meaning that all services currently using Wallgate will terminate at the new Interchange and serve no other stops in the town centre.
- 3A – Combining Options 1A and 2.
- 3B – Combining Options 1B and 2.
- 4 – North Western Access and Queen Street Super Stops, as an increment to Option 1A, with the loop extended to cover Queens Street and River Way, and no services are routed by Wallgate.
- 5 – Rodney Street Link to Interchange at North Western, as an increment to Option 3A, with the route via the new link replacing the need to use Library Street and King Street East.
- 6 – Balanced Option – is a stand alone option and is not an increment of the other options.

The growth in modelled demand in the Wigan area has been derived using the GMSPM2 model (LUTI - Land Use Transport Interactive Model) where transport packages in the GM TDP – Transport Development Package - are modelled and will attract trips to their corridors. The current 2016 matrices were used in the SPM2PT option test runs.

The key outputs of the options are summarised below:

- Figure 6.2 – Split of demand by bus stop clusters – demands at the four stop clusters (Figure 2.4) presents the impact a new interchange located at North Western station will have, with up to 75% of passengers using the facility.
- Figure 6.3 – Average change in walk and on-bus time per trip – all options generate a walk saving except Option 2 where the bus station is relocated to North Western station and bus services do not operate around a loop of the centre. In all cases except Option 2, the walk savings are greater than the on-bus time changes and options deliver net passenger benefits in terms of travel time.

- Figure 6.4 – Changes in bus and rail demands – the schemes will deliver increased demands for rail and bus services, with the exception of Option 2. The latter is due to disbenefits generated, thereby making public transport less attractive. Demand from other options would generate up to 5% more demand for services.
- Figure 6.5 – Revenue and operator impacts – only Options 3 and 6 will generate additional passenger revenue that exceeds extra costs, hence operators are no worse off financially from the changes. All other options will see operators worse off unless TfGM pays subsidy or services are reduced in length or frequency.

Detailed impacts of each option are reported in Appendix B.

Figure 6.2: Split of Demand by Bus Stop Clusters

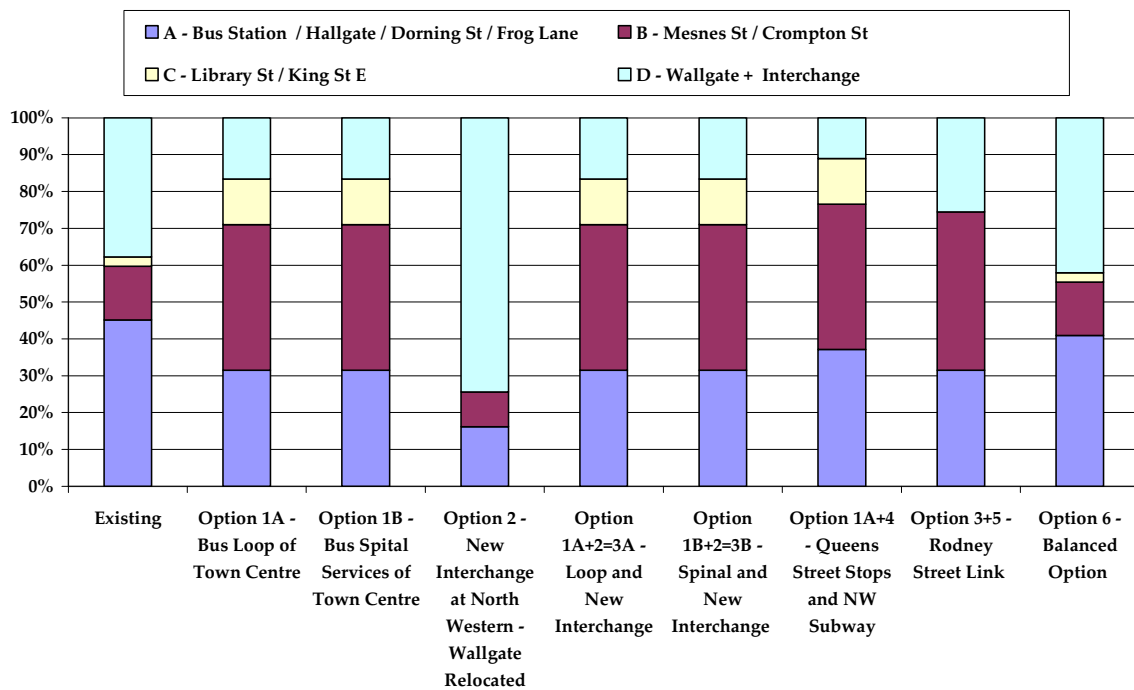


Figure 6.3: Average Change in Walk and on-Bus Time per Trip

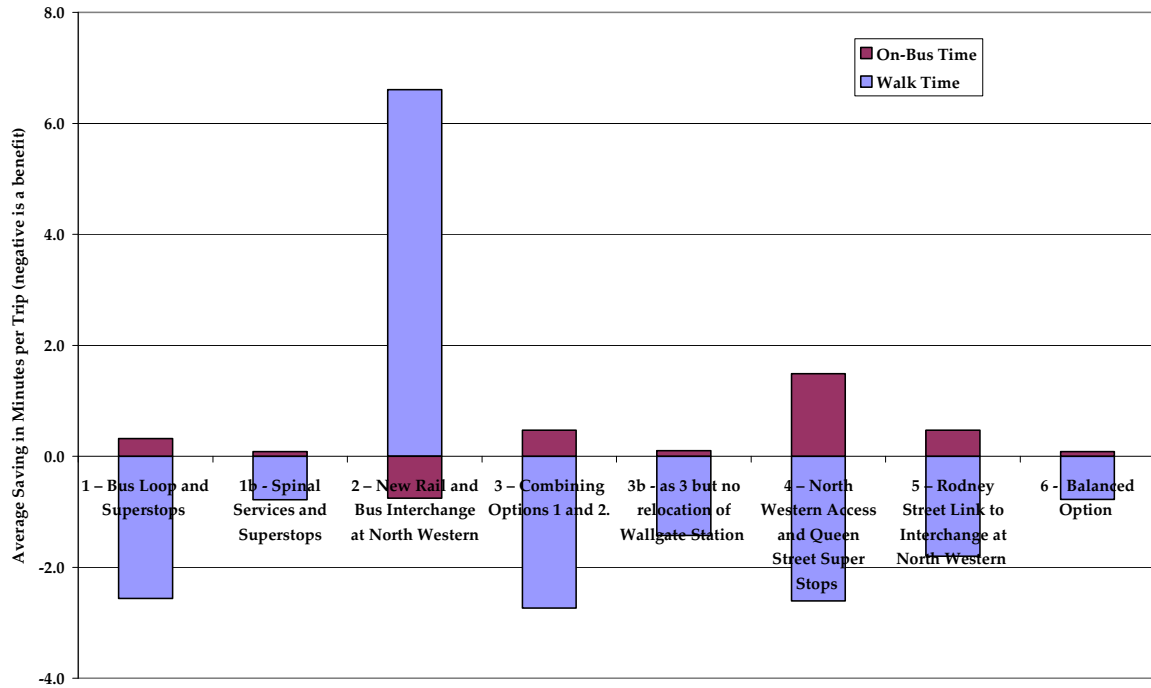


Figure 6.4: Change in Bus and Rail Demands

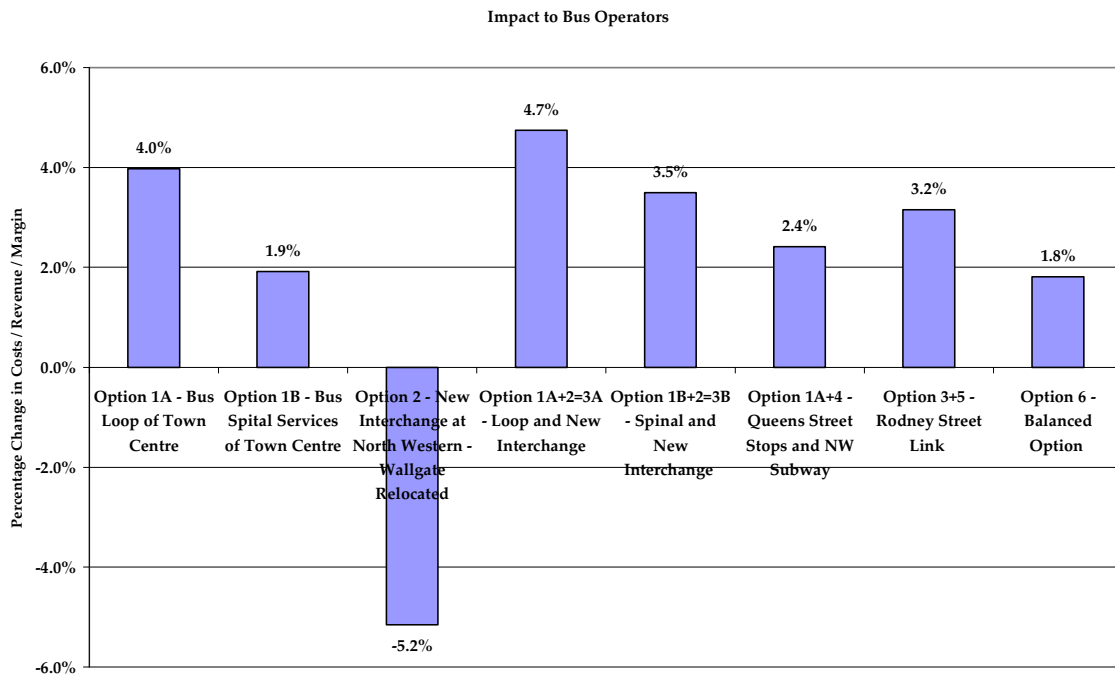
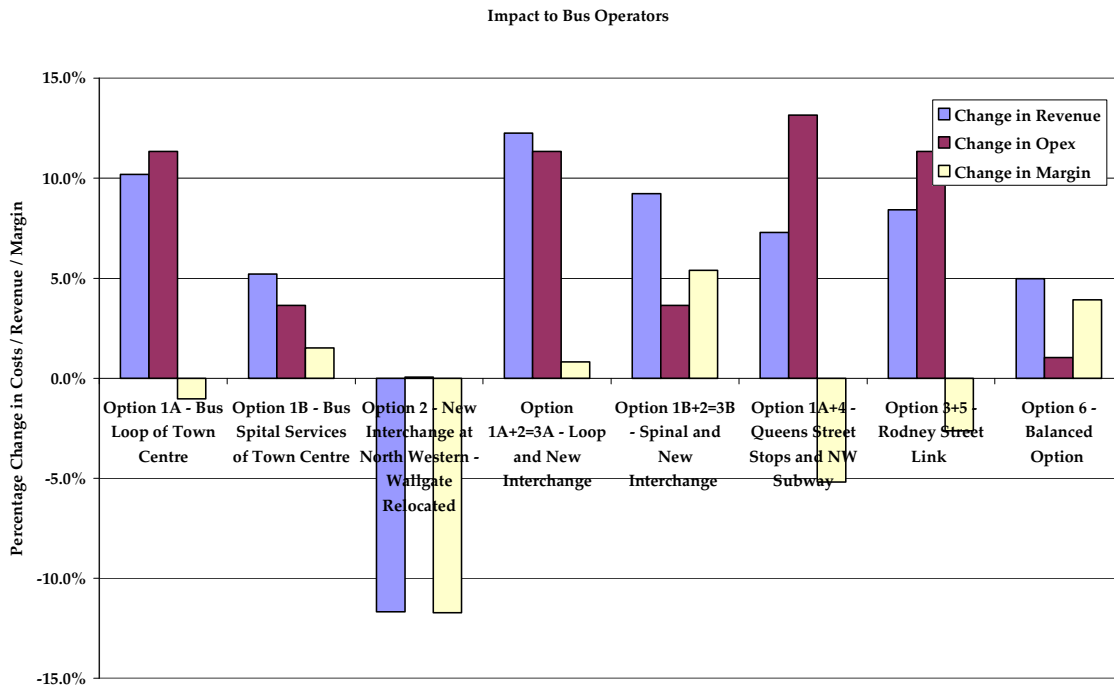


Figure 6.5: Revenue and Operator Impacts



6.3 Facility Benefits

The following benefits have been applied for the facility improvements proposed in each option. The values are based on values from TfGM research and the DfT’s “The Role of Soft Factors and the Impact of Demand” report.

Table 6.1: Facility Benefits for Options

Option	Bus Passengers	Rail Passengers	Interchange Rail / Bus and Rail / Rail Passengers
1A – Bus Loop and Super Stops	10.0	6.6	18.0
1B – Bus Spinal Services through Town Centre	10.0	6.6	18.0
2 – New Rail and Bus Interchange at North Western	24.0	9.0	18.0
3A – Combining Options 1A and 2.	14.0	9.0	18.0
3B – Combining Options 1B and 2, with relocation of Wallgate railway station	14.0	9.0	18.0
4 – North Western Access and Queen Street Super Stops	10.0	16.4	27.0
5 – Rodney Street Link to Interchange at North Western	14.0	9.0	18.0
6 - Balanced Option	12.0	6.9	15.0

Note: All values in pence per trip

6.4 Economic Appraisal

The value for money of each scheme is expressed by the Benefit to Cost Ratio (BCR). The calculation of the BCR is based on the TfGM appraisal template used to assess a range of schemes. The benefits of the scheme include time savings offered to passengers as a result of the proposed rail route and service, and the decongestion on the highway network from car users switching to use rail, and the impacts on public transport revenues of each option. Revenue changes from trips switching from existing rail and bus to new rail services and stations are included in the appraisal, as is the net change in Government tax from changes in fuel and ticket revenues. The costs cover capital, operating and maintenance costs of each Metrolink route.

Two BCR values are reported in the appraisal:

- **BCR TfGM Capital Cost** – ratio of net benefits (allowing for changes in fares revenue and operating costs) to the TfGM capital costs. This ratio is reported with optimism bias on capital costs at 66%.
- **BCR DfT – DfT’s Approach** – private sector benefits (time and decongestion, plus bus operator revenues) to public sector costs (capital, operating, renewals, Metrolink revenue, rail revenue equating to change in subsidy and indirect tax from fuel and revenues).

A BCR value, after allowing for optimism bias, of over 1.5 is required by the DfT for a scheme to be considered as “good” value for money. Values below 1.5 are seen as “low” and values between 2.0 and 4.0 are “high”. Values over 4.0 are “very high”.

6.5 Economic Appraisal Results

The economic appraisal results are provided in Table 6.2. The key measures from results are summarised in the following table.

- Options 2, 4 and 5 have a negative Net Present Value (NPV) and the benefits fail to exceed costs. BCR values for the options are all less than 1.0. This demonstrates that the disbenefits of terminating Wallgate bus services short at a new Interchange, or routing them away from Wallgate, are not value for money.
- Option 1A, the bus loop, will generate a TfGM BCR of 2.4. The NPV for the scheme is £77.0m. If the interchange at North western station is combined with the loop, the BCR will be 1.9, with a NPV of £81.7m. Increased public transport revenue for Options 1A and 3A is a total of £17.0m and £20.2m, respectively. The targeting service changes on the spinal north-south corridor, the BCR is 6.5, with benefits achieved at low costs.
- Option 6 will generate a TfGM BCR of 3.4 and NPV of £64.7m. The increase in bus revenue will be £7.7m and rail revenue will be £4.0m.

Table 6.2: Economic Appraisal - Headline Results

	Option 1A - Bus Loop of Town Centre	Option 1B - Bus Spital Services of Town Centre	Option 2 - New Interchange at North Western - Wallgate Relocated	Option 1A+2=3A - Loop and New Interchange	Option 1B+2=3B - Spinal and New Interchange	Option 1A+4 - Queens Street Stops and NW Subway	Option 3+5 - Rodney Street Link	Option 6 - Balanced Option
NPV £ms	77.0	69.7	-272.0	81.7	116.5	-10.6	-32.3	64.7
TFGM BCR	2.4	6.5	n/a	1.9	3.6	n/a	n/a	3.4
DFT BCR	3.1	13.4	n/a	2.4	5.1	n/a	n/a	4.9
Bus Revenue £ms	17.0	8.2	-22.0	20.2	14.9	10.3	13.5	7.7
Rail Revenue £ms	4.6	4.6	6.4	6.4	6.4	6.4	6.4	4.9

Note: All monetary values in 2008 prices and values over a 60 year appraisal period.

Table 6.3: Economic Appraisal – Full Results

		Option 1A - Bus Loop of Town Centre	Option 1B - Bus Spital Services of Town Centre	Option 2 - New Interchange at North Western - Wallgate Relocated	Option 1A+2=3A - Loop and New Interchange	Option 1B+2=3B - Spinal and New Interchange	Option 1A+4 - Queens Street Stops and NW Subway	Option 3+5 - Rodney Street Link	Option 6 - Balanced Option
1. Capital Cost	Construction	686	686	-28,797	-30,359	-30,359	-3,742	-51,671	-20,504
2. Renewal and Refurbishment costs	Renewal of Units	-182	-182	-2,898	-3,062	-2,310	-639	-7,254	-2,017
3. Operating cost	Operating & Maintenance	-47,185	-10,920	-22,110	-43,918	-4,190	-63,826	-50,687	0
4. Revenue	Change in Metrolink Revenue	0	0	0	0	0	0	0	0
	Change in BRT Fares Revenue	0	0	0	0	0	0	0	0
5. Financial Net Present Value		-46,681	-10,416	-53,805	-77,339	-36,859	-68,207	-109,612	-22,521
6. Financial Net Present Value at Market Prices		-56,437	-12,593	-65,050	-93,503	-44,563	-82,462	-132,521	-27,228
Impact on Other Government Bodies (at Market Prices)									
7. Central Government	Rail Operating								
	Indirect Tax Revenues	-5,270	-2,897	4,984	-6,409	-4,969	-4,507	-4,582	-2,809
8. Other Government	Change in Rail Fares Revenue	4,644	4,644	6,364	6,364	6,364	11,563	6,364	4,877
9. Total Impact on Other Government at Market Prices		-626	1,747	11,348	-45	1,395	7,056	1,782	2,068
10. Total Impact on Government		-57,063	-10,846	-53,702	-93,548	-43,168	-75,406	-130,739	-25,160
Impact on Public									
11. Public Transport Users	Benefit to Existing & New Public Transport Users.	123,703	62,038	-130,244	149,908	111,697	87,484	101,559	59,272
12. Impact of Change in Car Use	Reductions in Congestion, Accidents, Pollution & Noise	57,562	29,407	-65,900	69,230	52,158	41,147	47,567	28,120
13. Other Impacts	Change in Bus / BT Fares Revenue	-47,185	-10,920	-22,110	-43,918	-4,190	-63,826	-50,687	2,454
14. Total Impact on Public		134,080	80,525	-218,254	175,220	159,665	64,805	98,439	89,846
Summary Statistics									
15. Net Present Value of Project		77,017	69,679	-271,956	81,672	116,497	-10,601	-32,300	64,686
16. Benefit to TfGM Capital Cost Ratio		-91.9	-83.0	-6.8	3.2	4.2	-1.3	0.5	3.6
15A. Net Present Value of Project with 66% Optimism Bias (OB)		77,335	69,997	-285,302	67,602	102,428	-12,335	-56,247	55,184
16A. Benefit to TfGM Capital Cost Ratio with 66% OB		-66.4	-60.0	-4.9	2.3	3.0	-1.0	0.3	2.6
17. Benefit to Total TfGM Cost Ratio		2.4	6.5	-3.2	1.9	3.6	0.9	0.8	3.4
18. Private Benefit / Public Sector Cost Ratio (Only Required for Schemes Potentially requiring DfT Support).		2.3	7.4	-4.1	1.9	3.7	0.9	0.8	3.6

6.6 Sensitivity Tests

The following sensitivity tests have been completed as below, with the results presented in Table 6.4. Each of the tests was completed on Option 3B, the preferred option for a major new interchange scheme in the town centre given the high BCR of 3.6 and the wider economy benefits.

- ST1 - Capital cost increase of 20%
- ST2 – Benefits reduced by 10%
- ST3 – Revenues reduced by 10%
- ST4 – Demand growth reduced to no growth in public transport demand without the scheme (i.e. generated demand effects)
- ST5 – combined impacts of ST1 to ST4.

Table 6.4: Economic Appraisal – Sensitivity Test Results

		Option 3B	ST1 - Cost +20%	ST2 - Benefits - 10%	ST3 - Revenue - 10%	ST4 - Growth	ST5 - Combined
1. Capital Cost	Construction	-30,359	-36,431	-30,359	-30,359	-30,359	-36,431
2. Renewal and Refurbishment Costs	Renewal of Units	-2,310	-2,772	-2,310	-2,310	-2,310	-2,772
3. Operating Cost	Operating & Maintenance	-4,190	-4,190	-4,190	-4,190	-4,190	-4,190
4. Revenue	Change in Metrolink Revenue	0	0	0	0	0	0
	Change in BRT Fares Revenue	0	0	0	0	0	0
5. Financial Net Present Value		-36,859	-43,393	-36,859	-36,859	-36,859	-43,393
6. Financial Net Present Value at Market Prices		-44,563	-52,462	-44,563	-44,563	-44,563	-52,462
Impact on Other Government Bodies (at Market Prices)							
7. Central Government	Rail Operating						
	Indirect Tax Revenues	-4,969	-4,969	-4,472	-4,969	-4,571	-4,114
8. Other Government	Change in Rail Fares Revenue	6,364	6,364	5,728	5,728	5,855	4,742
9. Total Impact on Other Government at Market Prices		1,395	1,395	1,256	759	1,283	628
10. Total Impact on Government		-43,168	-51,067	-43,307	-43,804	-43,279	-51,834
Impact on Public							
11. Public Transport Users	Benefit to Existing & New Public Transport Users.	111,697	111,697	100,527	111,697	102,761	92,485
12. Impact of Change in Car Use	Reductions in Congestion, Accidents, Pollution & Noise	52,158	52,158	46,942	52,158	47,985	43,187
13. Other Impacts	Change in Bus / BT Fares Revenue	-4,190	-4,190	-3,771	-3,771	-3,855	-3,122
14. Total Impact on Public		159,665	159,665	143,699	160,084	146,892	132,550
Summary Statistics							
15. Net Present Value of Project		116,497	108,598	100,391	116,280	103,613	80,716
16. Benefit to TfGM Capital Cost Ratio		4.17	3.47	3.74	4.17	3.82	2.83
15A. Net Present Value of Project with 66% Optimism Bias (OB)		102,428	91,714	86,322	102,210	89,543	63,832
16A. Benefit to TfGM Capital Cost Ratio with 66% OB		3.02	2.51	2.70	3.01	2.76	2.05
17. Benefit to Total TfGM Cost Ratio		3.6	3.1	3.3	3.6	3.3	2.5
18. Private Benefit / Public Sector Cost Ratio (Only Required for Schemes Potentially Requiring DfT support).		3.7	3.1	3.3	3.7	3.4	2.6