



A51 Tarvin-Chester Improvements Scheme

Outline Business Case Independent Review

Cheshire West and Chester Council

March 2018

Quality information

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Revision History

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1. Summary

AECOM has been commissioned by Cheshire West and Chester (CWaC) Council to undertake an independent review of the Outline Business Case (OBC) for the proposed A51 – Tarvin Chester Improvements scheme. The review is a requirement of the Cheshire and Warrington Enterprise Partnership (C&W LEP) for the release of monies devolved to the LEP under the Local Growth Fund.

The proposed A51 – Tarvin Chester Improvements scheme is being promoted by CWaC – the OBC has been prepared by consultants Mott MacDonald. The review of the business case documentation has been undertaken based on a RAG appraisal template, which has been adopted by the C&W LEP as part of their Growth Programme Assurance and Accountability Framework. The RAG appraisal criteria are outlined within the summary sheet below and the following chapters assess the information supplied in relation to the five transport cases.

Table 1: Scheme Details

Project Title	A51 Tarvin-Chester Improvements Scheme
Scheme Promoter	Cheshire West and Chester Council
Document Reviewed	Outline Business Case
Permission Sought	Conditional Approval
Date of Submission	21/03/2018 (P&I Committee Meeting)
Date of Review	27/02/2018
Scheme Description	<p>Series of highway improvements along the A51 corridor including:</p> <ul style="list-style-type: none"> - An additional left turn lane at Tarvin roundabout from the A51 South to the A51 West; - Signal and line marking changes at Stamford Bridge to provide 2 lanes straight ahead for eastbound traffic; - Provision of an extra westbound lane through the Stamford Bridge junction, with a long merge for westbound traffic exiting the junction; - Removal of some of the existing right turn movements at the Hare Lane/Littleton Lane junction; and - Modifications to the westbound approach and eastbound merge on the A51 at the A51/ A55 junction.

Table 2: Summary Sheet

Overall Score		Requirements substantially met.
Overall AECOM Comments	<p>The Strategic Case and Economic Case largely meet the identified requirements, with the outstanding issues identified being relatively minor. The overall approach taken to the assessment work is considered to be proportionate to the size of the scheme.</p> <p>The Financial Case sets out the funding requirement for the scheme. The costs have been considered in some level of detail, including a Quantified Risk Assessment. Going forward, it is important that the costs are subject to an ongoing review including the assumptions and identified exclusions. Consideration should be given to including an allowance for a Compulsory Purchase Order (CPO) process within the cost estimate given that the work programme builds in time for this.</p> <p>The Commercial Case identifies a range of potential procurement options for the delivery of the scheme. Whilst it is identified that procuring a design consultant and then a separate contractor for the construction of the scheme is the preferred option, it is also proposed to consider the SCAPE framework as a potential option. Further work is</p>	

	<p>required in order to understand which option best meets the requirements of before a robust procurement strategy can be defined.</p> <p>The Management Case sets out the arrangements for the delivery of the scheme, including proposals regarding governance, project management and monitoring and evaluation. Aspects that require further development relate to obtaining the necessary consents/powers required to implement the scheme, identification of dependencies within the work programme, and the development of a Communications Plan, including specific proposals for future consultation.</p>
Benefit to Cost Ratio (BCR)	<p>When the Present Value Benefits (PVB) of £13.78m over the standard appraisal period of 60 years, is taken together with the present value of scheme costs (PVC) of £4.48m, the initial BCR is calculated as 3.1. According to Department for Transport guidance, the BCR of 3.1 represents High Value for Money.</p>

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

2. Strategic Case

Table 3: Strategic Case Review Summary

Overall Score		Requirements substantially met
AECOM Comments	<p>The Strategic Case includes a review of the existing policies and evidence that supports the case for change. It considers the scheme within the wider policy-fit alongside its ability to overcome existing problems identified in the area. 4 key objectives have been identified for the scheme and the intended outcomes are clearly expressed through a logic map.</p> <p>A comprehensive option assessment process has been undertaken from a long list of 17 options to short list of 4 options and then to a preferred scheme option. The assessment shows how the options align with the objectives of the scheme and how they address the issues identified.</p> <p>Outstanding issues to be addressed include:</p> <ul style="list-style-type: none"> • Constraints relating to land acquisition and potential environmental approvals required to enable the delivery of the scheme. • Development of the Stakeholder Engagement Plan to include specific proposals for future engagement including the type of engagement proposed with each stakeholder and the public, communication mechanisms and timescales. • It is recommended that the section relating to problems and opportunities is condensed as some of the information and supporting analysis has a limited impact on the case for change and scheme objectives. 	

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

Table 4: Strategic Case Review

Ref	Item	Status	Comments
S1	Is there a clear description of the components of the scheme and how it fits with the aims and objectives of the LEP, Local Authorities and DfT?	Requirements fully met.	<p>The Business Case provides a clear a thorough description of each component of the scheme in section 3.3 (The Scheme) of the Option Appraisal and Preferred Option chapter. The scheme will deliver a number of improvements on the A51 corridor including:</p> <ul style="list-style-type: none"> • an additional left turn lane at Tarvin roundabout; • signal and line-marking changes at Stamford Bridge; • provision of an extra westbound lane through Stamford Bridge junction; • widening of the existing bridge of the River Gowy; • removal of some of the existing right turn movements at the Hare Lane/Littleton Lane junction; • modification to the westbound approach and eastbound merge on the A51 at the A51/A55 junction; and • new crossing points and footpath provision for pedestrians, bus users and cyclists. <p>The scope is illustrated through concept designs in Figure 37 to Figure 40.</p> <p>Section 2.13 (Policy Review) details how the scheme fits with the aims and objectives of local, regional, sub-national and national policy. Call out boxes draw attention to how the scheme will contribute towards the DfT's objectives, as set out in the Transport Investment Strategy – for example the scheme will assist in terms of creating a more reliable and less congested transport network. It also considers the policy fit with Transport for the North's draft Strategic Transport Plan. The policy review also considers the contribution towards the Cheshire and Warrington Strategic Economic Plan and Growth Plan by supporting Chester (which is identified as a key location for growth), together with support for major growth areas in Crewe, the Atlantic Gateway and Cheshire Science Corridor. At the local authority level the contribution of the scheme in relation to the Cheshire West and Chester Local Plan, Local Transport Plan 2 and the Chester One City Plan is also considered. .</p>
S2	Have the problem(s) the scheme will be addressing been clearly identified – including evidence of the extent of the problem(s), specific barriers / challenges, and how the scheme will overcome them (including the scale of impact)	Requirements fully met.	<p>The Strategic Case provides a detailed 'Problems and Opportunities' section. This includes a range of evidence including consideration of the strategic socio-economic conditions (including population growth, employment, deprivation, education and skills), transport highways network and traffic conditions (including road safety) and land use and development considerations. At the conclusion of each section, the key issues and opportunities are summarised, together with a further summary presented at section 2.11 (Review of Problems and Opportunities). These are linked to the emerging scheme objectives to demonstrate how the anticipated outcomes are linked.</p> <p>As part of the option assessment process, both qualitative and quantitative assessments of the options has been undertaken, including use of Mott MacDonald's in house Investment Sifting and Evaluation</p>

Ref	Item	Status	Comments
			<p>Tool, ARCADY3 and LINSIG3 to assess the extent to which the scheme will overcome the problems identified.</p> <p>It is recommended that sections of the Strategic Case relating to problems and opportunities is condensed as some of the information and supporting analysis has a limited impact on the case for change and scheme objectives. The chapter could also be re-structured to make it easier to navigate.</p>
S3	Has the impact of not progressing the scheme been set out, including supporting evidence? Is there adequate rationale to support why the scheme is needed now?	Requirements fully met.	Section 3.4 identifies the impact of the scheme not progressing, including increased congestion on this section of the corridor, impacting on the attractiveness of the area for future investment and reduced access to opportunities to residents. Road safety and air quality issues are also referenced, which could be exacerbated in the absence of the intervention.
S4	Are there a clearly defined set of objectives for the scheme to address the problem(s) identified?	Requirements fully met.	<p>Section 2.12 (Scheme Objectives) sets out the four objectives for the scheme including:</p> <ul style="list-style-type: none"> • Economic Growth: To achieve improved accessibility to facilitate economic growth and job creation; • Strategic Connectivity: To deliver transport network improvements that deliver enhanced connectivity between Chester, Tarvin and key regional centres such as Crewe, Northwich, Winsford and Manchester Airport; • Local Connectivity: To reduce levels of highway congestion and secure enhanced local connectivity and encourage and facilitate transport between Chester and Tarvin, current and future housing sites, employment an mixed-use developments; and • Wider Social Impacts: To ensure local residents enjoy a good quality of life and that the area between Tarvin and Chester remains an attractive plan to live work and play. <p>The objectives have been identified in response to the key problems and opportunities set out in the Strategic Case, and are aligned to the policy analysis set out in section 2.13. The objectives have been used to guide the development of the scheme components. The objectives are supported by a number of sub-objectives.</p> <p>The Benefit Realisation Plan and Monitoring and Evaluation Report provides further detail to ensure the objectives are in line with the SMART framework setting out the objectives against the outcomes, the proposed methodology for measuring the performance indicators, and the timing following completion of the scheme.</p>

Ref	Item	Status	Comments		
S5	Are the expected outcomes clear - How will it be possible to know when the objectives have been met, and what will 'success' actually mean?	Requirements fully met.	Successful delivery of the scheme will be monitored against the objectives/sub-objectives. The Benefit Realisation Plan and Monitoring and Evaluation Report (appendices) clearly sets out the outcomes and what will constitute success for the project, an example is provided below:		
			<table border="1"> <tr> <td>Sub-objective: Reduce the number of rear-ending accidents occurring at junctions along the A51 corridor between Chester and Tarvin, by increasing capacity and improving junction operation</td> <td>Outcome: Enhanced highways safety along the A51 corridor with fewer road traffic collisions occurring</td> <td>Performance Indicator: Decrease in the annual number of road traffic collisions and incidents occurring along the A51 corridor</td> <td>Methodology: ATC counter; and analysis of highways incident data</td> <td>Timing: Prior to or during delivery to assess baseline data and 1 year / post completion</td> </tr> </table>	Sub-objective: Reduce the number of rear-ending accidents occurring at junctions along the A51 corridor between Chester and Tarvin, by increasing capacity and improving junction operation	Outcome: Enhanced highways safety along the A51 corridor with fewer road traffic collisions occurring
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S6	Are there any remaining high level internal/external constraints or other factors that present a material risk to the delivery of this scheme?	Requirements partially met.	<p>Risks, constraints and dependencies are set out in section 2.14 of the Strategic Case. Risks have been identified across a number of themes including strategic, funding and infrastructure; while constraints primarily relate to environmental considerations.</p> <p>The key environmental constraints relates to the majority of the A51/B5132 junction falling within Flood Zone 3. The crossing of the Rover Gowy and bridging structure requires further development in consultation with the Environment Agency to detail the constraints. Further detail for the environmental constraints is appended to the Business Case within the Environmental Constraints report (Appendix G).</p> <p>Land acquisition also remains a key constraint. Cheshire West and Chester Council is progressing this with relevant land owners. A Compulsory Purchase Order may be required to facilitate delivery of the scheme. The programme allows 18 months to resolve land negotiation, acquisition and associated legal constraints for land required to deliver the scheme.</p>		
S7	Have any inter-dependencies which may affect the success of the scheme been identified?	Requirements fully met.	The development of the A51 Tarvin Road capacity improvement scheme is not dependent on any other transport or regeneration scheme. Following consultation with Highways England and local Parish Councils, no other dependencies or influences were identified.		
S8	Are any links with other schemes clear?	Requirements fully met.	The Strategic Case highlights that the scheme is on an important strategic route providing connectivity to a number of key upcoming developments in Chester. Whilst there is potential for the A51 corridor improvements to support nearby housing development opportunities, there are no specific planning conditions linked to the scheme.		

Ref	Item	Status	Comments
S9	Have the main stakeholder groups and their contribution to the project been clearly defined? This should include any potential constraints or conflicts between stakeholders groups.	Requirements substantially met.	The key stakeholder groups and their project input/role responsibilities with reference to the scheme are set out in Table 25 (Strategic Case section 2.14.5) and section 7.5 (Communications and Stakeholder Management). The key stakeholders include Highways England, Parish Councils. Ward Members, bus operators, cycling groups, emergency services, utility companies, Chester Growth Partnership, North Wales local authorities, Cheshire East Council, local residents and landowners. The Business Case highlights no conflicts between stakeholders groups have been identified.
S10	Is there a robust assessment of different scheme options, including the reasons for any options being discounted?	Requirements fully met.	<p>Chapter 3 (Option Appraisal and Preferred Option) sets out a robust assessment of options. This is supported by an appended option assessment report (OAR) (Appendix A). A long list of 17 scheme options was assessed including Do nothing, Do Minimum, Do Something and high cost scenarios. These are reported in detail in section 5.2 of the OAR.</p> <p>Mott MacDonald used their in house Investment Sifting and Evaluation Tool to assess the long list of options. This included the identification of sub-criteria under each of the objectives which were used to assess the options, in addition to assessment criteria relating to deliverability. This facilitated a comparison and ranking of all design options. The initial assessment led to four options being taken forward for a more detailed level of assessment in terms of costs the wider economic benefits they can produce and quantitatively determines how junctions will operate in the future with regard to queue lengths and delays to journey times. This included assessment using junction models including ARCADY and LINSIG. As there was no differentiation regarding the performance of options in terms of wider economic benefits, the preferred option (Do Something 3) was taken forward to the Economic and Financial Case based on the traffic modelling assessment.</p> <p>A clear rationale for the preferred option and why other options have been discounted is presented both in the main OBC and supporting OAR. Whilst the OBC reports scores of the preferred against the objectives overall (Table 30), the section would be strengthened by including a narrative/summary of its performance against each individual scheme objective.</p>
S11	Have details of stakeholder and public consultation been provided?	Requirements partially met.	<p>Section 2.12.5 highlights that the scheme was identified following public consultation on the Chester Transport Strategy in 2014, which identified a series of pinch points.</p> <p>The level of public consultation undertaken to date on the specific proposals is less than would normally be expected at the OBC stage. Stakeholder engagement has been carried out with Highways England, Christleton Parish Council, Littleton Parish Council, Guilden Sutton Parish Council, and Tarvin Parish Council. The consultation included those groups identified as having significant interest and influence. Section 2.14.5.1 sets out the key outcomes of this engagement, for instance Highways England has expressed support for the scheme proposals due to the anticipated benefits attributable to reducing</p>

Ref	Item	Status	Comments
			<p>queuing on the A55 roundabout southbound exit slip at the junction with the A51.</p> <p>Formal consultation with other key stakeholders, residents and members of the public has yet to occur. This will be a key activity as the project moves forward, particularly for land owners adjacent the scheme. This will be a specific statutory obligation should the scheme progress through Compulsory Purchase Order process and for the introduction of Traffic Regulation Orders. Further consultation will also be required with the Environment Agency regarding the amended structure over the River Gowy.</p> <p>Section 2.14.5.1 identifies the stakeholders to be engaged through to Full Business Case – their roles and influence and interest are set out in Appendix P (Stakeholder Engagement Strategy). This strategy requires further development to identify specific proposals for future engagement including the type of engagement proposed, communication mechanisms and timescales.</p>

3. Economic Case

Table 5: Economic Case Review Summary

Overall Score		Requirements substantially met - the Economic Case has been prepared in line with recommended approaches and guidance, and a proportionate approach has been adopted in the assessment of scheme impacts.
AECOM Comments	<p>The Economic Case has demonstrated that the scheme represents high value for money, with a BCR over 3.0. The approach to deriving the BCR is in line with appropriate guidance and is represented by a proportionate approach to demand forecasting and economic appraisal. The review of the Economic Case and supporting documentation has highlighted a number of areas where additional information would help to further confirm the robustness of the case for the scheme.</p> <p>It is recommended that the following issues are addressed:</p> <ul style="list-style-type: none"> • Add future maintenance costs to the economic appraisal to ensure that the whole life costs of the scheme are reflected. • Review issues identified below in relation to the Appraisal Summary Table. • Clarify the timescales the identified GVA benefits relate to (per annum or total over the construction period). • Undertake a Distributional Impact Assessment of noise, air quality and accidents (at the Full Business Case stage). 	

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

Table 6: Economic Case Review

Ref	Item	Status	Comments
E1	Has a Value for Money Statement been provided, including a BCR?	Requirements fully met	<p>The Value for Money (VfM) of the scheme presented within the Economic Case reports an initial BCR of 3.1, which equates to high Value for Money, according to the DfT's WebTAG guidance – the C&W LEP Growth Programme Assurance and Accountability Framework includes an expectation that schemes have a BCR of over 2. An adjusted BCR of 3.2, including reliability benefits is also reported. In parts of the Economic Case it is unclear as to whether the initial or adjusted BCR is the core value – it is understood that the 3.1 is the core value but this should be clarified throughout the Economic Case, particularly for the sensitivity tests.</p> <p>A VfM Statement is included within the main Economic Case and includes TEE, PA and AMCB tables. This is reported in more detail within Appendix E Economic Appraisal Report.</p> <p>There is no additional narrative to the VfM statement to explain if there are any currently non monetised benefits which, if quantified could further strengthen the case - additional explanation of further benefits which would add to the robustness of the VfM case would be useful.</p>
E2	Are there any key assumptions relating to how the BCR has been derived?	Requirements fully met	<p>The approach to calculating the BCR is standard with assumptions in line with WebTAG guidance - User Time benefits are the largest overall benefit, derived from SATURN and TUBA appraisal. Appendix C and D provide an overview of the modelling approach - which considers the assumptions which have greatest impact on the overall BCR - additional benefits, including reliability impacts are discussed.</p>
E3	Is the basis for the calculation of the Present Value of Benefits (PVB) sufficiently robust?	Requirements fully met	<p>The generation of the Present Value of Benefits, has been prepared following a standard approach. This involves outputs from demand forecasting, which input into a TUBA appraisal. TUBA has been undertaken in line with appropriate guidance and demonstrates the core appraisal benefits. Additional benefits, such as reliability benefits have also been captured.</p>
E4	Is the basis for the calculation of the Present Value of Cost (PVC) sufficiently robust?	Requirements substantially met	<p>Base scheme costs (prior to including QRA and Optimism bias) of £4,488,926 for the scheme. Table 35 confirms that these are in 2017 prices – it is recommended that this is also referenced in Table 34. The Economic Case does not incorporate any costs for maintenance and renewals. The Financial Case identifies that maintenance costs are estimated to be £35,000 over 20 years and will be covered by the council's own maintenance budget. It is recommended that these costs are included in the appraisal as it is understood that they represent additional costs. Given the scale of costs quoted it is unlikely that they would have a material impact on the VfM case for the scheme.</p>
E5	Has an appropriate level of optimism bias been applied?	Requirements	<p>An optimism bias adjustment of 15% has been applied within the appraisal, in line with cost</p>

Ref	Item	Status	Comments
		fully met	development to Stage 2 - the 15% has been applied to the scheme costs including QRA, in line with WebTAG guidance (A1.2).
E6	Has an appropriate level of risk cost been included?	Requirements fully met	A Quantified Risk Assessment (QRA) has been undertaken for the scheme, this has placed a risk value of £633,183. This represents around 14% of the base cost.
E7	Is the traffic modelling and forecasting approach / tools sufficiently robust? Has relevant supporting documentation been provided to substantiate that modelling undertaken is fit for purpose?	Requirements fully met	<p>Base model update – The SATURN base model has been updated to represent 2017 conditions. The focus of the update has been within the study area of the A51 corridor. Appendix C provides a comprehensive record of the updates to the model. The model updates seem reasonable and the resultant calibration and validation results are acceptable.</p> <p>Forecasting Modelling - A forecasting report has been provided (Appendix D), which documents the development of the future year model scenarios, and the scheme testing. This included the derivation of 2020 and 2030 forecast years. Future year models have included relevant committed developments within the study area, of which housing developments are particularly significant. Growth has been constrained to the current version of TEMPro (v7.2), across Cheshire West and Chester.</p>
E8	Have all other modelling assumptions been made clear?	Requirements fully met	Modelling assumptions have been documented within the supporting Appendices - the modelling approach and assumptions are reasonable and in line with a proportionate approach. It should be noted however that the first modelling year does not reflect the scheme opening year defined within the business case document – correcting this is not likely to a significant impact on the appraisal.
E10	Are TUBA outputs robust?	Requirements fully met	<p>TUBA output files are provided within Appendix B of the Economic Appraisal Report. This provides details of the full report, including a documentation of TUBA warning records. TUBA has been run through an appropriate version 1.9.9. The sectoring of TUBA benefits is also provided within Appendix C of this document.</p> <p>The sectored benefits shows key benefits between the study area and the wider area. A small level of disbenefits were identified - these typically cover minor movements within the corridor and represent circa 1% reduction in total benefits and seem realistic given the proposed measures.</p> <p>TUBA presents outputs in terms of user time, vehicle operating costs, indirect tax, greenhouse gases and scheme Investment costs.</p>
E11	Have all relevant options been modelled / appraised?	Requirements substantially	The assessment of options in the Economic Case is limited to the preferred option – at the OBC stage it would normally be expected that a short list of options would be included in the economic appraisal. It is however understood that it was agreed with the LEP that the appraisal could be

Ref	Item	Status	Comments
		met	limited to the preferred option given the relatively small scale of the scheme. Following the assessment of the long list of options, the four shortlisted options were assessed using junction models (ARCADY and LINSIG) – results from these assessments were used to determine the preferred option selected.
E12	Have appropriate sensitivity tests been undertaken?	Requirements fully met	Three sensitivity tests are included, which identify the impact on the BCR following a 25% increase to the scheme costs (Test 1), a reduction to the benefits of 25% and an increase to the costs of 25% and a reduction of the benefits of 25% (Test 3) against the adjusted BCR. With the exception of Test 3 (BCR 1.9), all of the tests demonstrate that the BCR is still over 2.
E13	Has a completed AST been provided (with supporting worksheets where relevant)?	Requirements partially met	A completed Appraisal Summary Table (AST) is provided within Appendix O - a summary is provided in Table 48 within the Economic Case of the OBC. A number of the impacts which will have a smaller impact on the overall case, such as noise, air quality, landscape - have been described as not assessed (N/A). Whilst the quantification of these impacts may not be appropriate, a qualitative assessment is recommended. Where no impact is expected, the impact should be identified as neutral. It is recommended that a +7 to -7 scale is used (in line with WebTAG) where +3 equates to 'Large Beneficial', +2 is 'Moderate Beneficial' – the qualitative assessment currently identifies impacts as 'Low' or Medium, without an indication of whether they are positive or negative. The AST also refers to negative impacts in relation to Greenhouse Gases, but the figures would suggest a positive impact.
E14	Are forecast housing, jobs and GVA impacts provided robust / realistic?	Requirements partially met	The scheme is not expected to directly unlock particular housing or development sites for employment i.e. through a planning condition that requires the implementation of the scheme. It is however anticipated that the scheme will help contribute towards housing sites coming forward for development. The Land Use and Economic Development Assessment Report (Appendix F) includes an assessment of the GVA benefits that would result from the construction of additional housing, assuming a 5% to 10% level of attribution from the scheme. There is not specific evidence to support the selection of the 5% to 10% attribution value, but it appears to be a relatively conservative assumption. This assessment identified the scheme has the potential to provide 10 to 20 jobs and £433,800 to £864,500 GVA benefits relating to construction. It is not clear whether this value is per annum or over a given time period – clarification should be provided within the OBC regarding the period over which these benefits would pertain.
E15	Has dependent development been accounted for?	Requirements fully met	The development of the A51 Tarvin Road Capacity Improvements scheme is not dependent on any other transport or regeneration schemes. Following consultation with key stakeholders such as Highways England and local Parish Councils, there are also no dependencies or influences were

Ref	Item	Status	Comments
			identified and all were supportive of the improvements identified within this scheme
E16	Have all (relevant) Environmental & Social Impacts been adequately assessed?	Requirements substantially met	A Social Impact Appraisal has been carried out for the preferred option. This provides a qualitative assessment of the key environmental and social impacts. The assessment shows that the scheme could offer some further beneficial impacts in terms of journey quality and severance reduction. The assessment covers both the construction and operational phase. A number of the environmental criteria such as noise, air quality, landscape - have been described as not assessed (N/A). Whilst the quantification of these impacts may not be appropriate, a qualitative assessment is recommended. Where no impact is expected, the impact should be identified as neutral.
E17	Have Distributional Impacts been assessed in a robust manner?	Requirements substantially met	A Distributional Impacts Appraisal (DIA) has been carried out for the preferred option (a proportionate assessment has been carried out). The DIA assesses the distribution of social groups within the scheme impact area – including completion of GIS mapping and WebTAG tables for social group and amenities indicators and IMD income domain distribution. It is noted that many of the sub impacts were either 'not possible to assess', or 'not appraised'. The assessment highlights a full DIA of noise, air quality and accidents will be assessed at the Full Business Case.

4. Financial Case

Table 7: Financial Case Review Summary

Overall Score		Requirements substantially met
AECOM Comments	<p>The total cost estimate for the scheme is £5,398,839 including risk and inflation. The cost estimate was prepared by Mott MacDonald - CWaC Council proposes to review the costs as part of further scheme development work.</p> <p>The C&W LEP is set to provide 67% via the Local Growth Fund, CWaC Council is to provide 32.2% with 0.8% of the costs being from a Section 106 contribution. The funding from the C&W LEP is dependent upon the successful outcome from the submission of the Outline and Full Business Case.</p> <p>It is recommended that the following issues are addressed:</p> <ul style="list-style-type: none"> • CWaC Council to undertake a detailed review of the scheme costs on an ongoing basis, including the assumptions identified in the Scheme Costs Report (Appendix L). • Clarify that the maintenance costs identified relate to additional costs resulting from the scheme. • Adjust the profile for monitoring and evaluation costs so reflect that budget will be required 1 and 4 years after opening. • Review the scheme cost estimate if it is concluded that a CPO is required. • Ahead of the FBC submission, documentation should be provided to confirm that the local contribution is confirmed based on the final target costs. This should include sign-off from the Section 151 officer. 	

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

Table 8: Financial Case Review

Ref	Item	Status	Comments
F1	Is the expected whole life cost of the scheme robust, including the base cost and risk allowance in outturn prices drawn from industry forecasts?	Requirements partially met	<p>The construction costs for the scheme have been estimated at £5,398,839 – this includes and allowance for inflation and a Quantified Risk Assessment (QRA) and monitoring and evaluations costs. Scheme costs have been prepared by Mott MacDonald – a Scheme Costs Report (Appendix L) is provided. This identified that costs were derived using rates from similar sized projects and SPONS 2017, which is an industry price guide for highways projects. The Scheme Costs Report identified the assumptions made and exclusions that apply to the cost estimate. For example it is assumed that normal working hours apply and the subbase under existing carriageway is acceptable and will not require replacement.</p> <p>Section 5.5 identifies that a potential CPO process for the scheme could add an additional £50,000 to £100,000 the scheme costs. These costs have not been added to the cost estimate, but the work programme (Appendix N) allows time for the CPO process.</p> <p>An independent review of the scheme costs has not been undertaken. Whilst such a review is not a critical requirement for a scheme of this size, it is recommended that CWaC council undertakes a detailed review of the costs going forward, including the assumptions and exclusions identified in the Scheme Costs Report.</p> <p>Target costs will be required prior to submission of the Full Business Case.</p>
F2	Has a cost profile been provided showing year on year costs, and breakdown by cost type and parties on whom they fall?	Requirements fully met.	<p>A cost profile for the scheme is provided in Table 54, which splits the total costs by year and by funding source (i.e. LGF, Local contribution and Section 106). This is further broken down in the Scheme Costs Report (Appendix L). Of the total cost (£5,398,839), £3,617,222 (67%) is to be funded by the LEP, with £1,741,000 (32.2%) from CWaC and £40,617 (0.8%) from a Section 106 developer contribution.</p> <p>A budget of £52,000 has been identified for monitoring and evaluation – this will take place at one and four years past completion so this budget should be distributed (excluding baseline costs) across 2021/22 and 2024/2025.</p>
F3	Have details of key financial risks been provided and is the risk cost allowance robust?	Requirements fully met.	<p>A QRA has been undertaken which calculated risk to be £633,183 or approximately 14% of the total scheme costs. Further commentary relating to funding risks (financial) are reported in section 7.8 (Risk Management and Mitigation) of the Management Case. The QRA is included in Appendix K – this includes a risk register which sets out the key risks and proposed mitigation measures.</p>

Ref	Item	Status	Comments
F4	Are funding sources to cover the full scheme cost clearly set out?	Requirements fully met.	Funding sources to cover the full scheme costs (£5,398,839) are clearly set out in section 5.6. C&W LEP is set to provide 67% via the Local Growth Fund, CWaC Council is to provide 32.2% with 0.8% of the costs being from a Section 106 contribution.
F5	Is there sufficient evidence to support third party / alternative funding contributions?	Requirements substantially met.	<p>It is understood that the £40,617 Section 106 contribution from the Saughton Camp Housing Development has already been secured from the developer – it is recommended that evidence of this should be provided. With regard to the contribution from CWaC Council, a number of cabinet papers are attached at Appendix M. A paper entitled 'Bid for Local Growth Fund 3 and Local Transport Majors' (July 2016) provides approval for the submission of the Local Growth Fund 3 (LGF) funding bid via the Cheshire and Warrington Local Enterprise Partnership (CWLEP). It also approved the use of Council funding as match to draw down the Local Growth Fund 3 monies and ring fence the identified funding for delivery of the proposed schemes. The A51 scheme is listed as a forming part of the bid and the local contribution required is identified based on the original budget allocation (£3,686,000 from the C&W LEP, plus £1,741,000 from CWaC).</p> <p>In advance of the FBC submission, is it recommended that a further Cabinet paper is prepared confirming the apportionment between the funding sources based on the target cost.</p>
F6	Have the impacts of third party / alternative funding not coming forward been considered?	Requirements substantially met.	<p>The OBC submission does not include the impact of the funding not coming forward from the C&W LEP. However there is a high level of certainty about the contribution by C&W LEP subject to successful submission of the OBC to the P&I Committee. Whilst the local contribution is not considered to be at risk, the risk register in the QRA identifies that a change in the political administration at CWaC could result in the scheme becoming a lower priority and potentially result in it not being delivered. In order to mitigate this risk it is recommended that a cabinet paper is prepared to identify a specific financial commitment to the scheme based on the scheme cost – this should be prepared in advance of the FBC submission. It is understood that the £40,617 Section 106 contribution from the Saughton Camp Housing Development has already been secured from the developer – it is recommended that evidence of this should be provided. Any increase in the scheme costs would require the CWaC contribution to increase to cover any cost increases as the C&W LEP contribution cannot exceed the allocation (£3,686,000).</p> <p>It is recommended that the approach to handling any increase in the scheme costs should be set out e.g. whether an additional local contribution would be sought or whether the scheme</p>

Ref	Item	Status	Comments
			specification would be changed or reduced e.g. through value engineering?
F7	Has the long-term financial sustainability of the scheme been demonstrated, including robust plans to ensure the affordability of any ongoing costs for operation, maintenance and major capital renewals?	Requirements substantially met.	Maintenance costs are estimated to be £35k over 20 years and will be covered by the Council's own maintenance budget. These costs have been prepared by CWaC Council. It is understood that these are additional costs, but this should be clarified within the OBC.
F8	Has evidence of appropriate S151 Officer sign-off been provided?	Requirements partially met	A signature from the S151 officer has not been provided, but a number of CWaC Council cabinet papers are attached at Appendix M to highlight that the council agree to ring fence monies for the local contribution match funding as part of submission to Local Growth Fund for their schemes. At FBC stage, evidence of approval by the Section 151 officer for the local contribution based on the target cost will be required.

5. Commercial Case

Table 9: Commercial Case Review Summary

Overall Score		Requirements partially met
AECOM Comments	<p>The Commercial Case identifies a range of potential procurement options for the delivery of the scheme. Whilst it is identified that procuring a design consultant and then a separate contractor for the construction of the scheme is the preferred option, it is also proposed to consider the SCAPE framework further as a potential option.</p> <p>Further work is required in order to understand which option best meets the requirements of before a robust procurement strategy can be defined.</p> <p>It is recommended that the following issues are addressed:</p> <ul style="list-style-type: none"> • CWaC Council to undertake a thorough review of the available procurement options, including an assessment of the respective advantages and disadvantages of each option. • Determine and set out proposed payment mechanisms / pricing framework once the contract has been determined. • Further clarify risk allocation/transfer, including allocation of risks within the QRA. • Provide further details of proposed arrangements for contract management based on the contract type. • Provide evidence of approval for the selected procurement route from the Head of Procurement at CWaC. 	

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

Table 10: Commercial Case Review

Ref	Item	Status	Comments
C1	Has a robust procurement strategy been clearly set out?	Requirements partially met	<p>The Commercial Case considers a number of options for the procurement of the scheme. It identifies that the preferred procurement route will utilise two sourcing pathways – this will include procuring a design consultant and then a separate contractor for the construction of the scheme.</p> <p>It is proposed that the design consultant will be procured via a mini competition through the Warrington Borough Council, Transportation and Public Realm Consultancy Services Framework with the contractor being procured via an Open Procedure using The Chest North West Portal. Whilst this approach is identified as the preferred option, the Commercial Case also states that the CWaC will continue to consider SCAPE as an option for delivering the scheme.</p> <p>Consideration of the options is only provided in outline form and further analysis is required in order to understand which option best meets the requirements of CWaC before it can be concluded that a robust procurement strategy has been defined.</p>
C2	Has consideration of different procurement options been demonstrated, including justification for selection of the preferred option?	Requirements partially met	<p>Section 6.3 (Procurement Options) relates to the criteria to be considered in identifying the preferred procurement mechanism – it is recommended that the title for this section is reviewed as it does not consider options. Section 6.3.2 identifies that the key procurement options are either open tender, restricted tender or an approved framework that negates the requirement for an OJEU notice to be advertised. Some information is provided on each option, but there is limited discussion and analysis regarding these options. Information is provided on the merits of SCAPE (as an approved framework), but there is not an equivalent analysis of the open tender/restricted tender options. It is recommended that a table is included where the respective advantages and disadvantages of each option is explored in detail in order to provide justification for the selection of the preferred option.</p>
C3	Have the proposed payment mechanisms / pricing framework been identified?	Requirements partially met	<p>The Commercial Case identifies that payment mechanisms to the Principal Contractor will be set out in the contract schedule. It is anticipated that the contractor will be paid monthly and will be required to submit detailed invoices in accordance with the terms and conditions of the contract. The Council, once satisfied, will pay the contractor for the agreed services. The Council will reserve the right to withhold final payments, until an agreed period to allow for a maintenance period /defects correction period to be reviewed, after which final retention monies will be released.</p>
C4	Have the procurement timescales been set out, and are they	Requirements	<p>The Commercial Case and work programme (Appendix N) identifies that procurement is expected to</p>

Ref	Item	Status	Comments
	realistic?	fully met	take place between August 2019 and January 2020. Tender documents would be issued in August/September 2019, with the tender period covering October/November 2019 and tender evaluation during December 2019/January 2020. It is understood that this version of the programme allows time for a potential Compulsory Purchase Order (CPO) for the acquisition of the land, but timescales could be shortened if a CPO is not required.
C5	Have details of the proposed risk transfer / allocation been provided?	Requirements partially met	Risks have been recorded as part of the QRA (Appendix K) – whilst owners are assigned to the key risks identified in the Management Case, this should be extended to the individual risks in the QRA. It is identified that CWaC will be responsible for risks associated with land, planning and environmental permissions. Clarification is required regarding the risks that would be borne by the contractor.
C6	Have details of contract management been provided, including contract timescales?	Requirements partially met	Section 6.6.3 identifies that the Project Board including the Commissioning Lead and Strategy Lead will primarily manage the contracts with both the Design Consultant and Principal Contractor. Contract management arrangements are likely to be a function of the type of contract e.g. NEC3 contract. Prior to the submission of the Full Business Case it is recommended that the contract management requirements are considered and outlined with respect to the proposed type of contract.
C7	Has evidence of relevant approval been provided from Head of Procurement?	Requirements not met	Approval regarding the procurement approach has not yet been secured by the Head of Procurement at CWaC Council.

6. Management Case

Table 11: Management Case Review Summary

Overall Score		Requirements partially met.
AECOM Comments	<p>The Management Case sets out the high level governance arrangements to oversee the delivery of the project. This includes the strategic governance for the C&W LEP and for the project itself. A work programme has been provided and the statutory powers and consents required to deliver the project are identified. An approach to risk management is set out and key risks emerging from the QRA are identified, including mitigation measures. Proposals for the monitoring and evaluation of the scheme are defined.</p> <p>It is recommended that the following issues are addressed:</p> <ul style="list-style-type: none"> • Identify the critical path and dependencies between activities in the work programme. • Additional narrative should be provided regarding the strategy for managing risks relating to statutory powers and consents e.g. option to acquire parcels of land through a CPO progress should an agreement not be reached following initial negotiations. • Individual risks identified within the risk register should be assigned to individual personnel within the QRA document. • A Communications Plan, including the scope and timescales for future consultation activities should be developed in advance of the Full Business Case. 	

Assessment Scale

	Requirements fully met - No issues of note with the submission.
	Requirements substantially met - Minor issues exist with the submission.
	Requirements partially met - Medium issues exist with the submission.
	Requirements not met - Critical issues exist with the submission.

Table 12: Management Case Review

Ref	Item	Status	Comments
M1	Has the proposed governance / organisational structure been provided? Does it provide a robust means of overseeing project delivery with appropriate skills / experience?	Requirements fully met.	The Management Case sets out the high level governance arrangements for the delivery of the scheme. This includes a Project Board, Delivery Team and Client Team, with named personnel assigned to key roles e.g. Senior Responsible Officer, Director of Finance, Commissioning Lead, and Strategy Lead. The key responsibilities relating to each of the key positions is set out in Table 52 and Table 53. The Project Manager for the scheme is Sue Begley and personnel have been assigned to key supporting roles, including Chief Structural Engineer, Principal Engineer, and Street Lighting and Signal Control. A range of support services role have also been allocated including those relating to environment, procurement, communications and marketing and estates.
M2	Does the project programme demonstrate realistic delivery timescales? Does it provide an appropriate level of detail? Have critical path items and dependencies been clearly identified?	Requirements substantially met.	A work programme for the scheme has been developed and included as Appendix N to the business case. The programme includes a breakdown of the key activities under stages including land acquisition, ecology, engineering investigation, highway design, structural design, contract procurement and construction. The timescales appear realistic, but the programme does not include information regarding the critical path or dependencies between activities. The programme includes an allowance to complete a potential CPO process, although this is not specifically identified within the programme. It should be noted that the Financial Case does not include the additional costs relating to a potential CPO.
M3	Have required statutory powers and consents been obtained? Are there any conditions to the powers, consents or funding and do they pose any additional risks? Is a plan in place to demonstrate how these conditions will be met?	Requirements partially met.	In terms of consents, the scheme requires parcels of land which have not yet been secured in addition to Traffic Regulation Orders and the potential for consents from the Environment Agency regarding adjusting the structure over the River Gowy. It is understood that planning permission for the scheme is not required, but it is recommended that this is clarified in the business case. As the consents have not been agreed it is not possible to comment on any conditions attached. These issues are reflected in Table 57 which identifies the key risks in addition to proposed management and mitigation measures. It is recommended that additional narrative is provided regarding the strategy for managing risks relating to statutory powers and consents e.g. option to acquire parcels of land through a CPO progress should an agreement not be reached following initial negotiations.
M4	Have details of the reporting, assurance and approval process been provided (including gateways in scheme development)	Requirements substantially met.	The scheme is being progressed in line with the LEP Growth Programme Assurance and Accountability Framework, which applies to all schemes funded through the Local Growth Fund programme. Table 55 sets out milestones in terms of approvals going forward, but the timescales

Ref	Item	Status	Comments
	/ delivery)?		relating to these are still to be defined. Information is provided relating to the monthly reporting to the LEP on progress in delivering the scheme, in addition to monitoring and evaluation requirements, which is a requirement of the LEP's Assurance Framework.
M5	Has evidence of scheme delivery been provided, to demonstrate that the delivery body has the capability and means to successfully implement the scheme?	Requirements fully met.	The Management Case sets out a selection of case studies of other projects delivered or in the process of being delivered by CWaC council – this includes Northwich Town Centre Gyrotory and Leicester Street Roundabout, which was completed in September 2016 and the Chester Bus Interchange scheme, which opened in June 2017. It should be clarified that the A556 Gadbrook Park Junction upgrade scheme has secured funding through the National Productivity Investment Fund but is still in the development stage.
M6	Has a Risk Management Strategy been provided, setting out how risks have been identified, their likely impact, appropriate mitigation, and how the risks will be managed (and by whom)?	Requirements substantially met.	A general approach to the management of risk is set out in section 7.8.1. This includes a summary of the key risks that were identified from the QRA, in addition to the consequences and proposed mitigation measures. Respective owners of each key risk are identified for the key risk identified in the OBC, but this should also be extended to the QRA (Appendix K). It is also recommended that a process for escalation of risks is outlined. It would also be expected that the owner of the overall Risk Management Strategy would be identified as the SRO.
M7	Does the Risk Register cover all foreseeable risks with no obvious omissions? Are suitable mitigation measures proposed? Is the Risk Register updated on a regular basis?	Requirements substantially met.	The risk register includes most of the general risks that could be expected to occur for a project of this type. Mitigation measures are proposed, but could be made more specific in relation to this project – for example, with respect to third party land acquisition, the mitigation measure is 'ensure land acquisition is completed in good time prior to works commencing'. This could be developed further to outline the specific work that is being undertaken to address this key risk. It is recommended that a commitment is made to update the risk register at regular intervals e.g. monthly through to the completion of the project.
M8	Is an appropriate time-based plan in place for proactive communications and media enquiries?	Requirements not met	The Management Case sets out the work undertaken to date in relation to stakeholder consultation, which has been limited to key stakeholders likely to have a specific interest in the scheme. It is recommended that a Communications Plan, including the scope and timescales for future consultation activities is developed in advance of the Full Business Case. The stakeholders to be engaged through to Full Business Case and their roles and influence and interest are set out in Appendix P (Stakeholder Engagement Strategy). This strategy requires further development to identify specific proposals for future engagement including the type of engagement proposed, communication mechanisms and timescales.

Ref	Item	Status	Comments
			Section 7.5 states that public consultation will however be undertaken at the full business case stage once the scheme is finalised and conditional funding for approval obtained. It is important that the consultation takes place before the scheme is finalised to ensure that there is scope for the detailed design to reflect any issues identified.
M9	Is there a clear intervention logic for how the outcomes will be achieved? (e.g. logic map)	Requirements fully met.	The Management Case includes a logic map which shows how the outputs of the scheme are expected to lead to specific outcomes on the A51 corridor and impacts across the wider area. The logic map is also included in the Benefit Realisation and Monitoring and Evaluation Plan to align the outcomes with future reporting requirements.
M10	Has a Monitoring & Evaluation Plan been provided that identifies proposed data / performance indicators to monitor against the scheme objectives?	Requirements fully met.	<p>A Monitoring and Evaluation Plan has been developed with reference to the DfT guidance and is included as Appendix J to the business case. The plan proposes monitoring at the baseline stage and 1 and 4 years after opening. For each objective, the plan identifies a set of performance indicators. Consideration should also be given to whether data regarding jobs and business start ups will be of value given the likely difficulty of attributing impacts to the scheme.</p> <p>A budget of 52,000 has been allocated to deliver work associated with the Monitoring and Evaluation Plan – this is equivalent to approximately 1% of the total scheme cost. It is recommended that the data collection activities are costed prior to the Full Business Case submission to ensure that sufficient budget has been allocated.</p>
M11	Are there clear proposals to undertake evaluation of the overall effectiveness of the scheme?	Requirements fully met.	In addition to the impact of the scheme in relation to the objectives, the Monitoring and Evaluation plan includes proposals to monitor the success of the scheme in relation to budget, timescales and specification.

