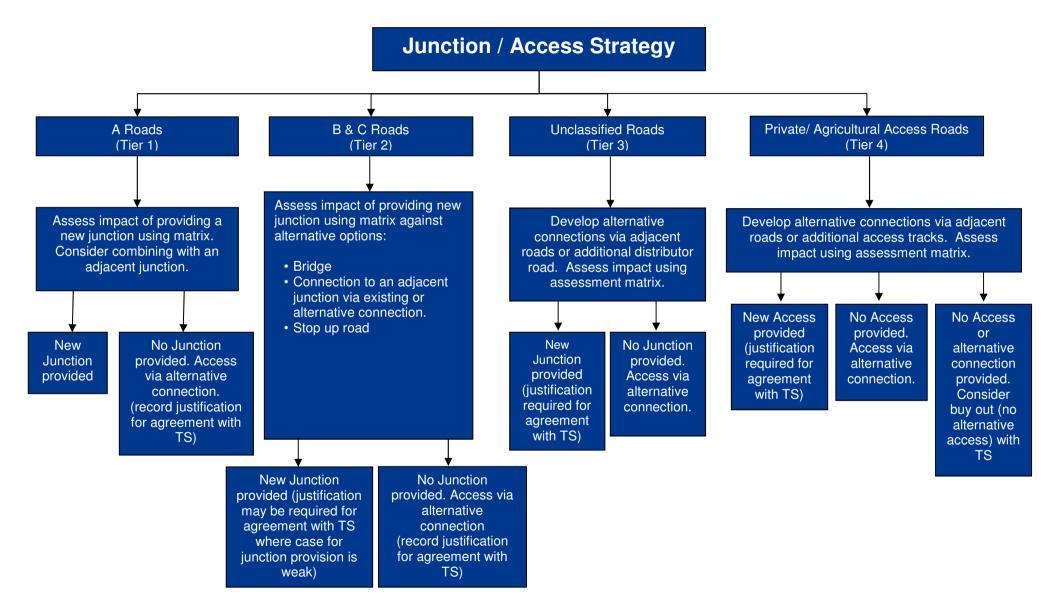


Appendix	J Junctions & Access Strategy
I	

## JACOBS





A96 Junction and Access Strategy Assessment Matri	X
TIER 1: A Class Roads	
Proposed Junction Location:	
proposed location is in proximity to another junction, asse	providing a junction at the proposed location and where the ss if these junctions can be combined. The assessment of ertaken appropriate to the level of detail available at the stage of
Description of Option:	
Engineering and Cost Issues	Assessment Comments
Length of Diversion/Journey time	
<ul> <li>Is increase in journey time acceptable? (consider desired route and change in journey time to connect to A96 - test to determine increased journey time splits)</li> </ul>	
<ul> <li>Traffic flow</li> <li>Consider traffic flows on junction and surrounding network.</li> </ul>	
<ul> <li>For junctions on bypasses consider the wider economic effect of the junction location.</li> </ul>	
Spacing	
<ul> <li>Consider the spacing of the junctions.</li> <li>Can the proposed junction be combined with an adjacent junction?</li> </ul>	
Standards	
<ul> <li>Does the proposed location impose any constraints on the geometric standard of the junction or mainline?</li> </ul>	
Cost	
<ul> <li>Are there any specific features at the proposed junction location which may lead to a significant increase in the cost of the junction?</li> <li>Is the cost of providing a diversion to an adjacent junction less than the cost of the grade separated junction?</li> <li>(Costs (at 2014 prices) listed below to be used for cost assessment: <ul> <li>£210/m2 for new road (£1.2 million for new underpass/overbridge)</li> </ul> </li> </ul>	
- £9.25 million for grade separated junction - £1.2million	
included for new structure)	
<ul> <li>Other Issues</li> <li>Are there any other engineering issues related to the provision of a junction at the proposed location for example buildability and resilience?</li> </ul>	
Summary	
<ul> <li>Provide a summary of the key engineering and economic assessment issues.</li> </ul>	
Environmental Issues	Assessment Comments
<ul> <li>Landscape and Visual</li> <li>Consider proximity to adjacent housing or other sensitive visual receptors.</li> </ul>	



Cultural Heritage	
Consider the impact of the location of the junction/	
alternative connection on recorded sites.	
Property/ Land	
• •	
<ul> <li>Consider the impact of the location of the junction/ alternative connection on land take.</li> </ul>	
Are any properties to be demolished?	
Human Impact (Air, Noise, Proximity to Settlements)	
• Consider the impact of the proximity to housing,	
settlements and sensitive receptors.	
·	
Severance	
Consider severance on NMUs, bus routes,	
community facilities and the like and the impact of	
the journey time and desire lines.	
Water Quality	
<ul> <li>Does the proposed junction or alternative</li> </ul>	
connection cross any flood plains or watercourses.	
Biodiversity	
<ul> <li>Does the proposed junction or alternative</li> </ul>	
connection impact directly or indirectly on any	
designated sites?	
Other Issues	
• Are there any other environment issues related to	
the provision of a junction at the proposed	
location?	
Summary	
Provide a summary of the key environmental	
impacts assessment.	
<ul> <li>Consider the effect of mitigation and/ or local re-</li> </ul>	
siting where environmental impacts are potentially	
unacceptable	
Stakeholder Consultation	Assessment Comments
Stakeholder Perception	
<ul> <li>Description of potential reasons for</li> </ul>	
objection/acceptance of particular junction/	
alternative connection by stakeholders	
Conclusions	Accessment Commente
	Assessment Comments
Is a junction to be provided at the proposed	
location?	
If the outcome is NO, justification of decision to be	
agreed with Transport Scotland.	



A96 Junction and Access Strategy Assessment Matri	x
TIER 2: B&C Class Roads	
Proposed Junction Location:	
options including a bridge, connection to adjacent junctio The assessment of engineering, cost and environmental available at the stage of assessment.	providing a junction at the proposed location against alternative n via existing or alternative connections or stopping up the road. issues shall be undertaken appropriate to the level of detail
Description of Option:	
For the sector sector for some sector s	
Engineering and Economic Issues Length of Diversion/Journey time	Assessment Comments
<ul> <li>Is increase in journey time acceptable? (consider desired route and change in journey time to connect to A96 - test to determine increased journey time splits)</li> </ul>	
<ul> <li>Traffic flow</li> <li>Consider traffic flows on junction and surrounding network. For junctions on bypasses consider the wider economic effect of the junction location.</li> </ul>	
Spacing	
<ul> <li>Consider the spacing of the junctions.</li> <li>Can the proposed junction be combined with an adjacent junction?</li> </ul>	
Standards	
<ul> <li>Does the proposed location impose any constraints on the geometric standard of the junction or mainline?</li> </ul>	
Cost	
<ul> <li>Are there any specific features at the proposed junction location which may lead to a significant increase in the cost of the junction or alternative connection?</li> <li>Is the cost of providing a diversion to an adjacent junction less than the cost of the grade separated junction?</li> <li>(Costs (at 2014 prices) listed below to be used for cost assessment:</li> </ul>	
- £210/m2 for new road (£1.2 million for new	
underpass/overbridge) - £9.25 million for grade separated junction - £1.2 million included for new structure)	
Other Issues	
<ul> <li>Are there any other engineering issues related to the provision of a junction/alternative connection at the proposed location for example buildability and resilience?</li> </ul>	
<ul> <li>Summary</li> <li>Provide a summary of the key engineering and economic assessment issues.</li> </ul>	
Environmental Issues	Assessment Comments
<ul> <li>Landscape and Visual</li> <li>Consider proximity to adjacent housing or other sensitive visual receptors.</li> </ul>	



<ul> <li>Cultural Heritage</li> <li>Consider the impact of the location of the junction/ alternative connection on recorded sites.</li> </ul>	
Drenerty/Lend	
<ul> <li>Property/ Land</li> <li>Consider the impact of the location of the junction/ alternative connection on land take.</li> <li>Are any properties to be demolished?</li> </ul>	
Human Impact (Air Naica, Dravinity to	
<ul> <li>Human Impact (Air, Noise, Proximity to Settlements)</li> <li>Consider the impact of the proximity to housing, settlements and sensitive receptors.</li> </ul>	
Severance	
<ul> <li>Consider severance on NMUs, bus routes, community facilities and the like and the impact of the journey time and desire lines.</li> </ul>	
Water Quality	
<ul> <li>Does the proposed junction or alternative connection cross any flood plains or watercourses?</li> </ul>	
Biodiversity	
<ul> <li>Does the proposed junction or alternative connection impact directly or indirectly on any designated sites?</li> </ul>	
Other Issues	
<ul> <li>Are there any other environmental issues related to the provision of a junction/alternative connection at the proposed location?</li> </ul>	
Summary	
<ul> <li>Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable</li> </ul>	
Stakeholder Consultation	Assessment Comments
Stakeholder Perception	
<ul> <li>Description of potential reasons for objection/acceptance of particular junction/ alternative connection by stakeholders</li> </ul>	
Conclusions	
Is a junction to be provided at the proposed	
location?	
If the outcome is NO, or where the case for providing a junction is weak, justification of decision to be agreed with Transport Scotland.	



A96 Junction and Access Strategy Assessment Matrix	
TIER 3: Unclassified Roads	
Proposed Alternative Connection Location:	
The Tier 3 Assessment matrix shall assess the impact of provid	ing an alternative connection at the proposed
location. The assessment of engineering, cost and environment level of detail available at the stage of assessment.	
Description of Option:	
Engineering and Economic Issues Asse	ssment Comments
Length of Diversion/Journey time	
Is increase in journey time acceptable? (consider	
desired route and change in journey time to	
connect to A96 - test to determine increased	
journey time splits)	
Standards	
Does the proposed location impose any	
constraints on the geometric standard of the	
alternative connection?	
Cost	
Are there any specific features at the proposed	
alternative connection which may lead to a	
significant increase in the cost?	
<ul> <li>Is the cost of providing a diversion to an adjacent</li> </ul>	
junction more expensive than the cost of the grade	
separated junction?	
(Costs (at 2014 prices) listed below to be used for cost	
assessment:	
- £210/m2 for new road (£1.2 million for new underpass/overbridge)	
- £9.25 million for grade separated junction -	
£1.2million included for new structure)	
Other Issues	
Are there any other engineering issues related to	
the provision of an alternative connection at the	
proposed location for example buildability and	
resilience?	
Summary	
<ul> <li>Provide a summary of the key engineering and</li> </ul>	
economic assessment for the alternative	
connection.	
Environmental Issues Asse	essment Comments
Landscape and Visual	
Consider proximity to adjacent housing or other	
sensitive visual receptors.	
Cultural Heritage	
<ul> <li>Consider the impact of the location of the alternative connection on recorded sites.</li> </ul>	
Property/ Land	
Consider the impact of the location of the	
alternative connection on land take.	
Are any properties to be demolished?	



	nan Impact (Air, Noise, Proximity to tlements)	
•	Consider the impact of the proximity to housing, settlements and sensitive receptors.	
Sev	verance	
•	Consider severance on NMUs, bus routes, community facilities and the like and the impact of the journey time and desire lines.	
Wa	ter Quality	
•	Does the proposed alternative connection cross any flood plains or watercourses?	
•	diversity Does the proposed alternative connection impact directly or indirectly on any designated sites?	
Oth	er Issues	
•	Are there any other environmental issues related to the provision of an alternative connection at the proposed location?	
Su	nmary	
٠	Provide a summary of the key environmental	
•	impacts assessment. Consider the effect of mitigation and/ or local re- siting where environmental impacts are potentially unacceptable	
	keholder Consultation	Assessment Comments
Sta •	keholder Perception Description of potential reasons for objection/acceptance of alternative connection by stakeholders	
0.1		
Co	nclusions	
pro If ti pro	he alternative connection to be provided at the posed location acceptable? ne outcome is NO, and a junction is therefore posed, justification of decision to be agreed h Transport Scotland.	



A96 Junction and Access Strategy Assessment Matri	X
TIER 4: Private and Agricultural Access	
Proposed Alternative Connection Location:	
The Tier 4 Assessment matrix shall assess the impact of location. The assessment of engineering, cost and enviro level of detail available at the stage of assessment. Description of Option:	
Engineering and Economic Issues	Assessment Comments
Length of Diversion/Journey time	
<ul> <li>Is increase in journey time acceptable? (consider desired route and change in journey time to connect to A96 - test to determine increased journey time splits)</li> </ul>	
<ul> <li>Standards</li> <li>Does the proposed location impose any constraints on the geometric standard of the alternative connection?</li> </ul>	
Cost	
<ul> <li>Is the cost of diversion equal or higher than cost of holding/ value of the property?</li> <li>(Costs (at 2014 prices) listed below to be used for cost assessment:</li> <li>£110/m2 for new road (£1.2 million for new underpass/overbridge)</li> </ul>	
Are there any specific features at the proposed alternative connection which may lead to a significant increase in the cost it?	
<ul> <li>Other Issues</li> <li>Are there any other engineering issues related to the provision of an alternative connection at the proposed location for example buildability and resilience?</li> </ul>	
Summary	
<ul> <li>Provide a summary of the key engineering and economic assessment for the alternative connection.</li> </ul>	
Environmental Issues	Assessment Comments
Landscape and Visual	
<ul> <li>Consider proximity to adjacent housing or other sensitive visual receptors.</li> </ul>	
<ul> <li>Cultural Heritage</li> <li>Consider the impact of the location of the alternative connection on recorded sites.</li> </ul>	
<ul> <li>Property/ Land</li> <li>Consider size of business/land holding, size of area required relative to overall size, consider area of land severed).</li> <li>Are any properties to be demolished?</li> </ul>	



	nan Impact (Air, Noise, Proximity to	
Set	tlements) Consider the impact of the proximity to housing,	
•	settlements and sensitive receptors.	
Sev	erance	
•	Consider severance on NMUs, bus routes,	
	community facilities and the like and the impact of the journey time and desire lines.	
	the journey time and desire lines.	
Wa	ter Quality	
•	Does the proposed alternative connection cross	
	any flood plains or watercourses.	
Bio	diversity	
•	Does the proposed alternative connection impact directly or indirectly on any designated sites?	
•	er Issues Are there any other environmental issues related	
	to the provision of an alternative connection at the	
	proposed location?	
•		
Sur	nmary	
•	Provide a summary of the key environmental	
•	Provide a summary of the key environmental impacts assessment. Consider the effect of	
•	Provide a summary of the key environmental	
•	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where	
•	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable	Assessment Comments
• Sta	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially	Assessment Comments
• Sta	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for	Assessment Comments
• Sta	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by	Assessment Comments
• Sta	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for	Assessment Comments
• Sta •	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by	Assessment Comments
• Sta •	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner.	Assessment Comments
• Sta • Cor	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. hclusions	Assessment Comments
• Sta • Cor	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner.	Assessment Comments
• Sta Sta • Is a pro	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. hclusions n alternative connection to be provided at the posed location?	Assessment Comments
• Sta Sta • Is a pro If th pro	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. nelusions n alternative connection to be provided at the posed location? he outcome is NO, and a new access is to be vided, justification of the decision to be agreed	Assessment Comments
• Sta Sta • Is a pro If th pro	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. nelusions n alternative connection to be provided at the posed location? he outcome is NO, and a new access is to be	Assessment Comments
• Sta Sta • Is a pro If th pro with	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. nelusions n alternative connection to be provided at the posed location? he outcome is NO, and a new access is to be vided, justification of the decision to be agreed	Assessment Comments
• Sta Sta • Is a pro lf th pro with In a acc	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. nclusions n alternative connection to be provided at the posed location? ne outcome is NO, and a new access is to be vided, justification of the decision to be agreed n Transport Scotland.	Assessment Comments
• Sta Sta • Is a pro lf th pro with In a acc	Provide a summary of the key environmental impacts assessment. Consider the effect of mitigation and/ or local re-siting where environmental impacts are potentially unacceptable keholder Consultation keholder Perception Description of potential reasons for objection/acceptance of alternative connection by landowner. nelusions n alternative connection to be provided at the posed location? ne outcome is NO, and a new access is to be vided, justification of the decision to be agreed n Transport Scotland. ddition, if the outcome is NO, and no alternative	Assessment Comments