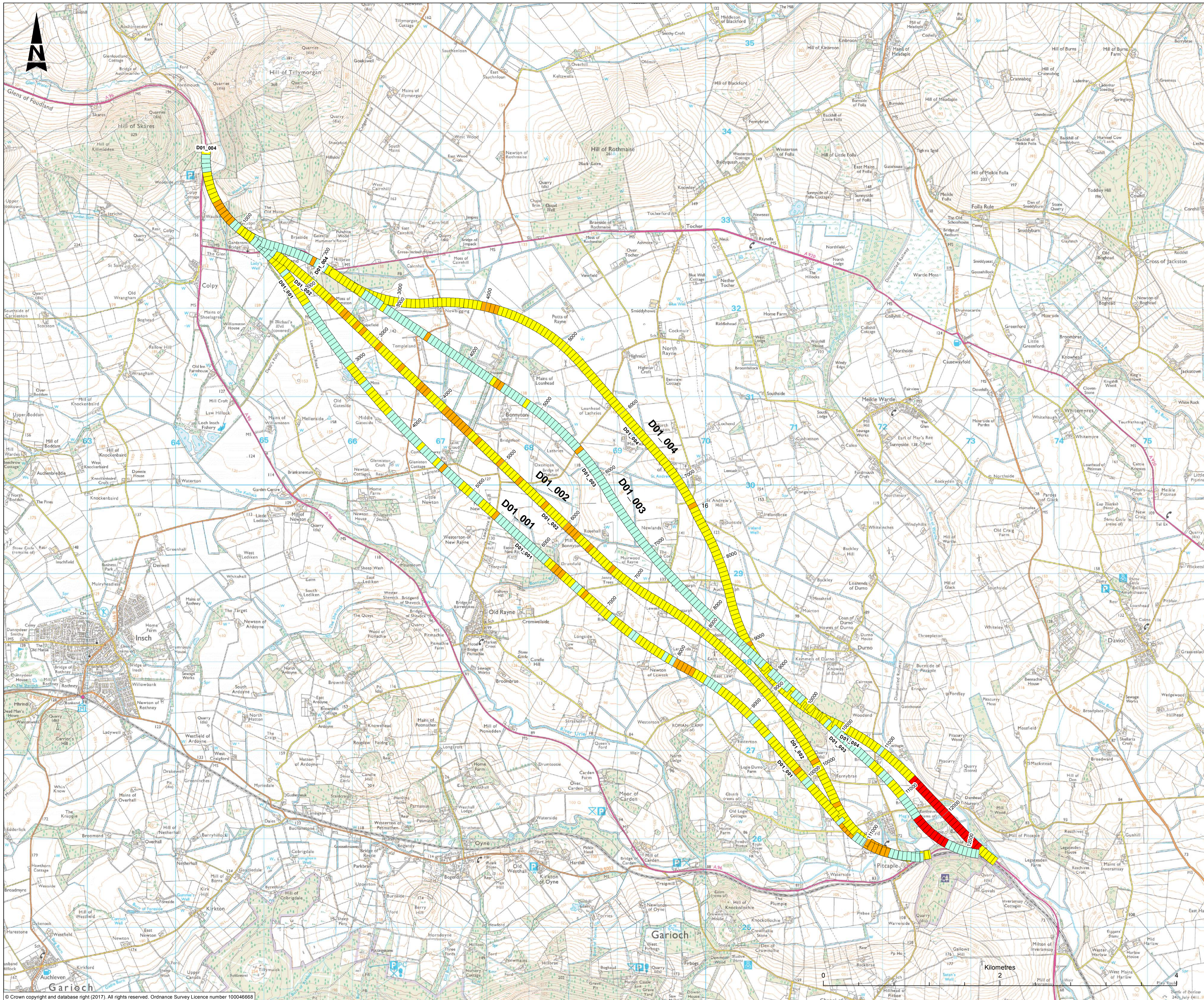


Appendix E

First Fix Alignments - Engineering Appraisal

Note: The first fix alignments will be subject to further development as the scheme progresses as will the location and form of junctions. Connections to local accesses and Non-Motorised User routes will be developed following the identification of the preferred route option.



LEGEND

Combined Engineering Appraisal

- Major Adverse
- Moderate Adverse
- Slight Adverse
- Neutral

P01	First Fix Appraisal				
	JSE	RO	JG	GW	GH
	10/04/18	18/04/18	18/04/18	18/04/18	18/04/18

Revision	Revision details				
	Created	Checked	Reviewed	Approved	Authorised
	dd/mm/yy	dd/mm/yy	dd/mm/yy	dd/mm/yy	dd/mm/yy

Precision House
 McNell Drive
 Motherwell
 ML1 4UR



Client
 58 Port Dundas Road
 Glasgow
 G4 0HF



Project Name
A96 Dualling: East of Huntly to Aberdeen

Drawing Title
D01 - Engineering Appraisal

Project Ref. No. 250002-92	Stage Stage 2	Scale : 1:20,000	@A1
		Dimensions :	

Drawing Number Project	Originator	Volume
A96PEA -AMAR - HGN -		
CD	-DR-CH-001001	
Location	Type	Role Number

Suitability S2	Suitability Description For Information	Revision P01.01
-------------------	--	--------------------

0	Neutral	Criteria
-1	Slight Adverse	
-2	Moderate Adverse	
-3	Major Adverse	

Rules
 Total Score
 = Alignment Score (Average of E, F, G, H and I) + Geo Score + Structures Score + Flooding Score (Average of L, M and N) + Utilities score + Constructability Score (Minimum value of P&Q) = Total of 6 scores for 6 categories

Then if total < or equal to -9 then should be coloured red because this represents possibility of 3 reds or 4 ambers
 If total is between -6 and -8 should be coloured amber since this could represent 2

Start Chainage	End Chainage	Alignment Length	Alignment			Geotechnics	Structures	Floodplain and Watercourse Crossings	Utilities	Constructability	Score	Adjusted Total	Comments
			Level Difference	Bendiness	Hilliness								
0	50	0	0	0	0	0	0	0	0	0	-1	-3	A structure may be required where the alignment crosses the existing A96.
50	100	0	0	0	0	0	0	0	0	0	-1	-3	
100	150	0	0	0	0	0	0	0	0	0	-1	-3	
150	200	0	0	0	0	0	0	0	0	0	-1	-3	
200	250	0	-1	0	0	0	0	0	0	0	-1	-2	
250	300	0	-1	0	0	0	-1	0	-2	0	-1	-3	Minor to moderate embankment on potentially compressible soils.
300	350	0	-1	0	0	0	-2	0	-2	0	-1	-4	Minor to moderate embankment on potentially compressible soils.
350	400	0	-2	0	0	0	-2	0	-2	0	-1	-4	Minor to moderate embankment on potentially compressible soils.
400	450	0	-2	0	0	0	-2	0	-2	0	-1	-4	Minor to moderate embankment on potentially compressible soils.
450	500	0	-1	0	0	0	-1	0	-2	0	-1	-3	Minor to moderate embankment on potentially compressible soils.
500	550	0	-1	0	0	0	-1	0	-2	0	-1	-3	Minor to moderate embankment on potentially compressible soils.
550	600	0	-1	0	0	0	-2	0	-2	0	-1	-4	Minor to moderate embankment on potentially compressible soils.
600	650	0	-2	0	0	0	-2	-2	-2	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
650	700	0	-2	0	0	0	-2	-2	-2	-3	-1	-7	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
700	750	0	-2	0	0	0	-1	-2	-3	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
750	800	0	-2	0	0	0	-1	-2	-3	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
800	850	0	-2	0	0	0	-1	-2	0	0	-1	-5	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
850	900	0	-1	0	0	0	-2	0	0	0	-1	-4	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
900	950	0	-1	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
950	1000	0	-2	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
1000	1050	0	-2	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
1050	1100	0	-2	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
1100	1150	0	-2	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
1150	1200	0	-2	0	0	0	-1	0	0	0	-1	-3	Cutting up to 16m high in non-identified ground.
1200	1250	0	-1	0	0	0	0	0	0	0	-1	-2	
1250	1300	0	-1	0	0	0	0	0	0	0	-1	-2	
1300	1350	0	0	0	0	0	0	0	0	0	-1	-1	
1350	1400	0	-1	0	0	0	0	0	0	0	-1	-2	
1400	1450	0	-1	0	0	0	0	0	0	0	-1	-2	
1450	1500	0	-1	0	0	0	0	0	0	0	-1	-2	
1500	1550	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
1550	1600	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
1600	1650	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
1650	1700	0	-1	0	0	0	0	0	0	-2	-2	-5	SEE Pylon within 100m of alignment.
1700	1750	0	0	0	0	0	0	0	0	0	-2	-2	
1750	1800	0	0	0	0	0	0	0	0	-2	-2	-4	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
1800	1850	0	0	0	0	0	0	0	0	-2	-2	-4	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
1850	1900	0	0	0	0	0	0	0	0	-2	-2	-4	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
1900	1950	0	0	0	0	0	0	0	0	-2	-2	-4	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
1950	2000	0	0	0	0	0	0	0	0	-2	-2	-4	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
2000	2050	0	-1	0	0	0	0	0	0	-2	-2	-5	SEE 275kV crossing. Pylon at edge of 100m alignment ch 1980.
2050	2100	0	-1	0	0	0	0	0	0	0	-2	-3	Minor cutting - some local disruption during construction.
2100	2150	0	-1	0	0	0	0	0	0	0	-2	-3	Minor cutting - some local disruption during construction.
2150	2200	0	0	0	0	0	0	0	0	0	-2	-2	
2200	2250	0	0	0	0	0	0	0	0	0	-2	-2	
2250	2300	0	0	0	0	0	0	0	0	0	-2	-2	
2300	2350	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
2350	2400	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
2400	2450	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
2450	2500	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
2500	2550	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment - some local disruption during construction.
2550	2600	0	0	0	0	0	0	0	0	0	-2	-2	
2600	2650	0	0	0	0	0	0	0	0	0	-2	-2	
2650	2700	0	0	0	0	0	0	0	0	0	-2	-2	
2700	2750	0	-1	0	0	0	0	0	0	0	-2	-3	
2750	2800	0	0	0	0	0	0	0	0	0	-2	-2	
2800	2850	0	0	0	0	0	0	0	0	0	-2	-2	
2850	2900	0	0	0	0	0	0	0	0	0	-2	-2	
2900	2950	0	0	0	0	0	0	0	0	0	-2	-2	
2950	3000	0	0	0	0	0	0	0	0	0	-2	-2	
3000	3050	0	-1	0	0	0	-2	-2	0	0	-1	-5	4.5m embankment on peat.
3050	3100	0	-1	0	0	0	-2	-2	0	0	-1	-5	4.5m embankment on peat.
3100	3150	0	-1	0	0	0	-2	-2	0	0	-1	-5	4.5m embankment on peat.
3150	3200	0	-1	0	0	0	-2	-2	0	0	-1	-5	4.5m embankment on peat.
3200	3250	0	-1	0	0	0	-2	-2	0	0	-1	-5	4.5m embankment on peat.
3250	3300	0	0	0	0	0	0	0	0	0	-2	-2	
3300	3350	0	0	0	0	0	0	0	0	0	-2	-2	
3350	3400	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3400	3450	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3450	3500	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3500	3550	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3550	3600	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3600	3650	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3650	3700	0	-1	0	0	0	0	0	0	0	-2	-3	Minor embankment up to 6m. Difficult construction access.
3700	3750	0	0	0	0	0	0	0	0	0	-2	-2	
3750	3800	0	0	0	0	0	0	0	0	0	-2	-2	
3800	3850	0	0	0	0	0	0	0	0	0	-2	-2	

0	Neutral	Criteria
-1	Slight Adverse	
-2	Moderate Adverse	
-3	Major Adverse	

Rules
 Total Score
 = Alignment Score (Average of E, F, G, H and I) + Geo Score + Structures Score + Flooding Score (Average of L, M and N) + Utilities score + Constructability Score (Minimum value of P&Q) = Total of 6 scores for 6 categories

Then if total < or equal to -9 then should be coloured red because this represents possibility of 3 reds or 4 ambers
 If total is between -6 and -8 should be coloured amber since this could represent 2

Chainage	Start Chainage	End Chainage	Alignment Length	Alignment					Structures	Geotechnics	Floodin g and Drainage	Utilities	Constructability	Score	Adjusted Total	Comments
				Level Difference	Bendiness	Hilliness	Earthworks	Geotechnics								
0	50			0	0	0	0	0	0	0	0	0	0	-1	-3	A structure may be required where the alignment crosses the existing A&E.
50	100			0	0	-1	0	0	0	0	0	0	0	-1	-1	
100	150			0	0	-1	0	0	0	0	0	0	0	-1	-1	
150	200			0	0	-1	0	0	0	0	0	0	0	-1	-1	
200	250			0	-1	-1	0	-1	0	0	0	0	0	-1	-2	
250	300			0	-1	-1	0	-1	0	-2	0	0	0	-1	-3	Minor to moderate embankment (up to 12m) on potentially compressible soils.
300	350			0	-1	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
350	400			0	-1	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
400	450			0	-2	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
450	500			0	-1	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
500	550			0	-1	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
550	600			0	-1	-1	0	-2	0	-2	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
600	650			0	-2	-1	0	-2	-2	-2	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
650	700			0	-2	-1	0	-1	-2	-3	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
700	750			0	-2	-1	0	-1	-2	-3	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
750	800			0	-2	-1	0	-1	-2	-3	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
800	850			0	-2	-1	0	-1	-2	-3	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
850	900			0	-1	-1	0	0	-2	0	0	0	0	-1	-3	
900	950			0	0	-1	0	0	0	0	0	0	0	-1	-1	
950	1000			0	-1	-1	0	0	-1	0	0	0	0	-1	-2	
1000	1050			0	-2	-1	0	0	-1	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1050	1100			0	-2	-1	0	0	-1	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1100	1150			0	-2	-1	0	0	-1	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1150	1200			0	-2	-1	0	0	-1	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1200	1250			0	-1	-1	0	0	0	0	0	0	0	-1	-1	
1250	1300			0	-1	-1	0	0	0	0	0	0	0	-1	-1	
1300	1350			0	-1	-1	0	0	0	0	0	0	0	-1	-1	
1350	1400			0	0	-1	0	0	0	0	0	0	0	-1	-1	
1400	1450			0	0	-1	0	0	0	0	0	0	-1	-1	-2	
1450	1500			0	0	-1	0	0	0	0	0	0	0	-1	-1	
1500	1550			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
1550	1600			0	0	-1	0	0	0	0	0	0	0	-2	-2	
1600	1650			0	0	-1	0	0	0	0	0	0	0	-2	-2	
1650	1700			0	0	-1	0	0	0	0	0	0	0	-2	-2	
1700	1750			0	0	-1	0	0	0	0	0	0	0	-2	-2	
1750	1800			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
1800	1850			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
1850	1900			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
1900	1950			0	-1	-1	0	0	0	-2	0	0	0	-2	-4	Structure for Farm Access.
1950	2000			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2000	2050			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
2050	2100			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
2100	2150			0	-1	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2150	2200			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2200	2250			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2250	2300			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2300	2350			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2350	2400			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2400	2450			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2450	2500			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2500	2550			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2550	2600			0	0	-1	0	0	-1	0	0	0	0	-2	-3	Potentially compressible ground. Difficult construction access.
2600	2650			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2650	2700			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2700	2750			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2750	2800			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2800	2850			0	0	-1	0	0	0	0	0	0	0	-2	-2	
2850	2900			0	-1	-1	0	0	0	0	0	0	-1	-3	-3	Water supply crossing.
2900	2950			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
2950	3000			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3000	3050			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3050	3100			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3100	3150			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3150	3200			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3200	3250			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3250	3300			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3300	3350			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3350	3400			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3400	3450			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3450	3500			0	-1	-1	0	0	0	-2	0	0	0	-2	-4	Structure required for B977. Difficult construction access.
3500	3550			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3550	3600			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3600	3650			0	-1	-1	0	0	0	0	0	0	0	-2	-2	
3650	3700			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3700	3750			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3750	3800			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3800	3850			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3850	3900			0	0	-1	0	0	0	0	0	0	0	-2	-2	
3900	3950			0	0	-1	0	0	0	0	0	0	0	-2	-2	

0	Neutral	Criteria
-1	Slight Adverse	
-2	Moderate Adverse	
-3	Major Adverse	

Rules
Total Score
 = Alignment Score (Average of E, F, G, H and I) + Geo Score + Structures Score + Flooding Score (Average of L, M and N) + Utilities score + Constructability Score (Minimum value of P&Q) = Total of 6 scores for 6 categories

Then if total < or equal to -9 then should be coloured red because this represents possibility of 3 reds or 4 ambers
 If total is between -6 and -8 should be coloured amber since this could represent 2

Start Changeage	End Changeage	Alignment Length	Alignment			Geotechnics			Structures			Floodin'g and Drainage			Utilities			Constructability		Comments
			Level Difference	Bendiness	Hilliness	Earthworks	Geotechnics	Structures	Flood Plan	Watercourse Crossings	Attenuation requirement	Construction access	Temp disruption	Adjusted Total	Score					
0	50	-1	0	-2	-1	0	0	-1	0	0	0	0	0	0	0	0	0	-1	-3	A structure may be required where the alignment crosses the existing A96.
50	100	-1	0	-2	-1	0	0	-1	0	0	0	0	0	0	0	0	0	-1	-2	
100	150	-1	0	-2	-1	0	0	-1	0	0	0	0	0	0	0	0	0	-1	-2	
150	200	-1	0	-2	-1	0	0	-1	0	0	0	0	0	0	0	0	0	-1	-2	
200	250	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
250	300	-1	-1	-2	-1	0	-1	0	-2	0	0	0	0	0	0	0	0	-1	-4	Minor to moderate embankment (up to 12m) on potentially compressible soils.
300	350	-1	-1	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
350	400	-1	-2	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
400	450	-1	-2	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
450	500	-1	-1	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
500	550	-1	-1	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
550	600	-1	-1	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-5	Minor to moderate embankment (up to 12m) on potentially compressible soils.
600	650	-1	-2	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-7	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
650	700	-1	-2	-2	-1	0	-2	0	-2	0	0	0	0	0	0	0	0	-1	-7	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
700	750	-1	-2	-2	-1	0	-1	0	-2	0	0	0	0	0	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
750	800	-1	-2	-2	-1	0	-1	0	-2	0	0	0	0	0	0	0	0	-1	-6	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
800	850	-1	-2	-2	-1	0	-1	0	-2	0	0	0	0	0	0	0	0	-1	-5	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
850	900	-1	-1	-2	-1	0	0	0	-2	0	0	0	0	0	0	0	0	-1	-4	Structure over River Line and Wood Burn. Impact assessed as Moderate for the structure and associated engineering works.
900	950	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
950	1000	-1	-1	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1000	1050	-1	-2	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1050	1100	-1	-2	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1100	1150	-1	-2	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1150	1200	-1	-2	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1200	1250	-1	-1	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-1	-3	Cutting up to 14m in non-identified ground.
1250	1300	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
1300	1350	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
1350	1400	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
1400	1450	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-3	Minor embankments/ cuttings.
1450	1500	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-1	-2	
1500	1550	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor embankments/ cuttings.
1550	1600	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor embankments/ cuttings.
1600	1650	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor embankments/ cuttings.
1650	1700	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor embankments/ cuttings.
1700	1750	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor embankments/ cuttings.
1750	1800	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
1800	1850	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
1850	1900	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
1900	1950	-1	-1	-2	-1	0	0	0	-2	0	0	0	0	0	0	0	0	-2	-5	Structure for Farm Access.
1950	2000	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
2000	2050	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
2050	2100	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Minor cutting combined with local disruption during construction.
2100	2150	-1	-1	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2150	2200	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2200	2250	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2250	2300	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2300	2350	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2350	2400	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2400	2450	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2450	2500	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2500	2550	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2550	2600	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2600	2650	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2650	2700	-1	0	-2	-1	0	-1	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2700	2750	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-4	Potentially compressible ground. Difficult construction access.
2750	2800	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
2800	2850	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
2850	2900	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
2900	2950	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
2950	3000	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3000	3050	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3050	3100	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3100	3150	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3150	3200	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3200	3250	-1	-1	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3250	3300	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3300	3350	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3350	3400	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3400	3450	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3450	3500	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3500	3550	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3550	3600	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3600	3650	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.
3650	3700	-1	0	-2	-1	0	0	0	0	0	0	0	0	0	0	0	0	-2	-3	Combination of hilliness, bendiness, minor level difference and difficult construction access.

