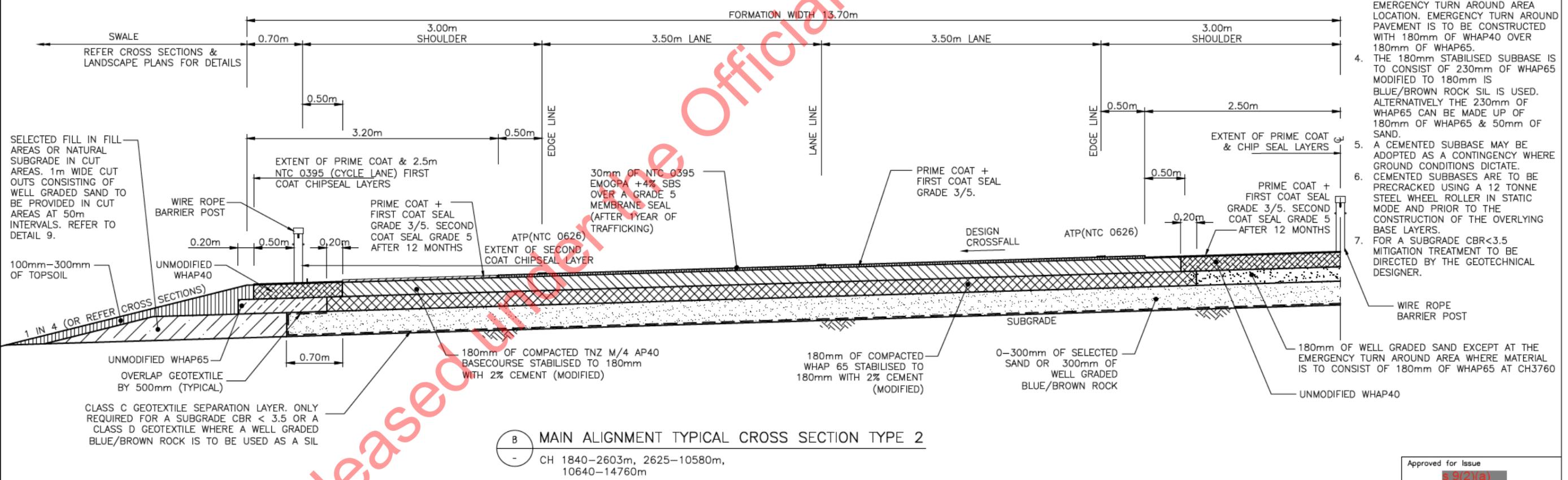
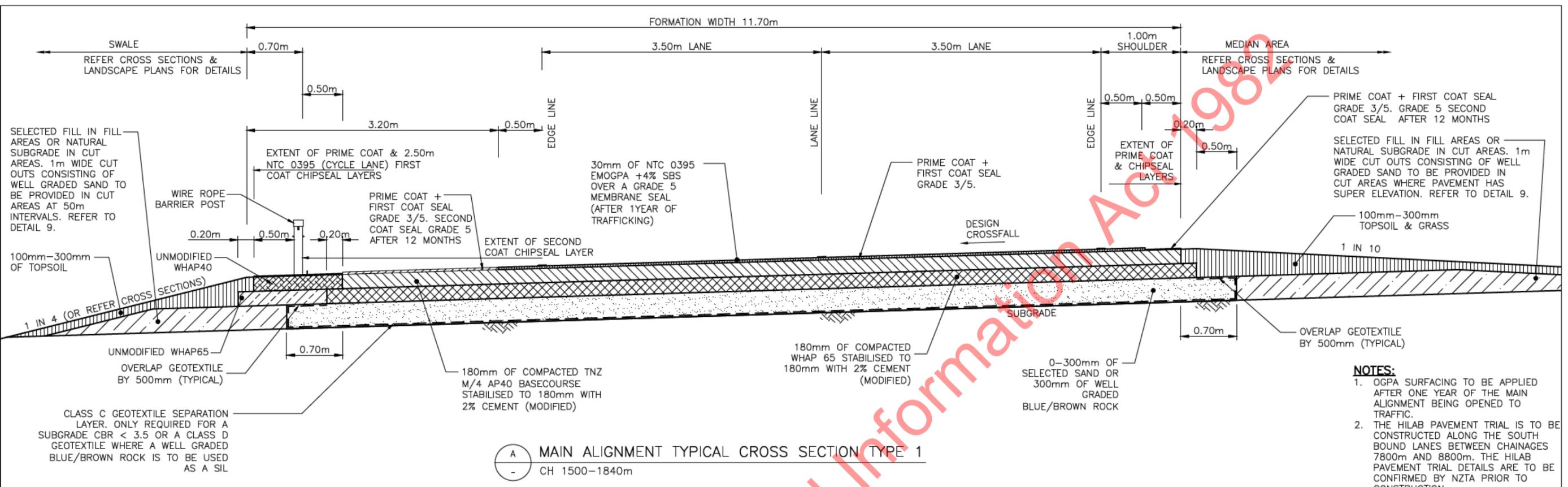


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- NOTES:**
- OGPA SURFACING TO BE APPLIED AFTER ONE YEAR OF THE MAIN ALIGNMENT BEING OPENED TO TRAFFIC.
 - THE HILAB PAVEMENT TRIAL IS TO BE CONSTRUCTED ALONG THE SOUTH BOUND LANES BETWEEN CHAINAGES 7800m AND 8800m. THE HILAB PAVEMENT TRIAL DETAILS ARE TO BE CONFIRMED BY NZTA PRIOR TO CONSTRUCTION.
 - REFER TO PLANS C-115-035 FOR EMERGENCY TURN AROUND AREA LOCATION. EMERGENCY TURN AROUND PAVEMENT IS TO BE CONSTRUCTED WITH 180mm OF WHAP40 OVER 180mm OF WHAP65.
 - THE 180mm STABILISED SUBBASE IS TO CONSIST OF 230mm OF WHAP65 MODIFIED TO 180mm IS BLUE/BROWN ROCK SIL IS USED. ALTERNATIVELY THE 230mm OF WHAP65 CAN BE MADE UP OF 180mm OF WHAP65 & 50mm OF SAND.
 - A CEMENTED SUBBASE MAY BE ADOPTED AS A CONTINGENCY WHERE GROUND CONDITIONS DICTATE.
 - CEMENTED SUBBASES ARE TO BE PRECRACKED USING A 12 TONNE STEEL WHEEL ROLLER IN STATIC MODE AND PRIOR TO THE CONSTRUCTION OF THE OVERLYING BASE LAYERS.
 - FOR A SUBGRADE CBR<3.5 MITIGATION TREATMENT TO BE DIRECTED BY THE GEOTECHNICAL DESIGNER.

Rev	Revision Description	Drawn	Checked	Designed	Design Checked	Approved	Date
01	AS-BUILT AMENDED						12.06.17
AB	AS-BUILT						11.12.15

Tob 041

Scales 1:25 A1, 1:50 A3

Original Size A1

Approved for Issue **S 9(2)(a)**

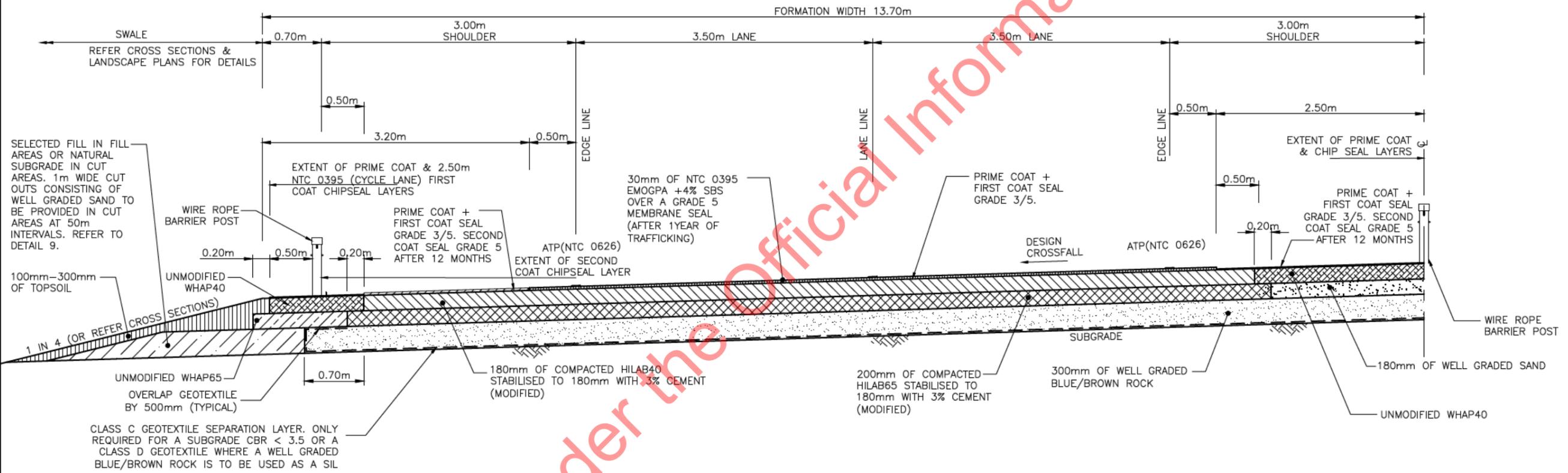
WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

MAIN ALIGNMENT TYPICAL CROSS SECTIONS SHEET 1 OF 6

Status **AS-BUILT**

Drawing Number **C-115-041** Revision **AB**

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B MAIN ALIGNMENT TYPICAL CROSS SECTION TYPE 2
- CH 7800-8800

- NOTES:**
- OGPA SURFACING TO BE APPLIED AFTER ONE YEAR OF THE MAIN ALIGNMENT BEING OPENED TO TRAFFIC.
 - THE HILAB PAVEMENT TRIAL IS TO BE CONSTRUCTED ALONG THE SOUTH BOUND LANES BETWEEN CHAINAGES 8000m AND 8800m. THE HILAB PAVEMENT TRIAL DETAILS ARE TO BE CONFIRMED BY NZTA PRIOR TO CONSTRUCTION.

Approved for Issue
S 9(2)(a)

Rev	Revision Description	Drawn	Checked	Designed	Design Checked	Approved	Date
01	AS-BUILT AMENDED	S 9(2)(a)		S 9(2)(a)			12.06.17
AB	AS-BUILT						11.12.15

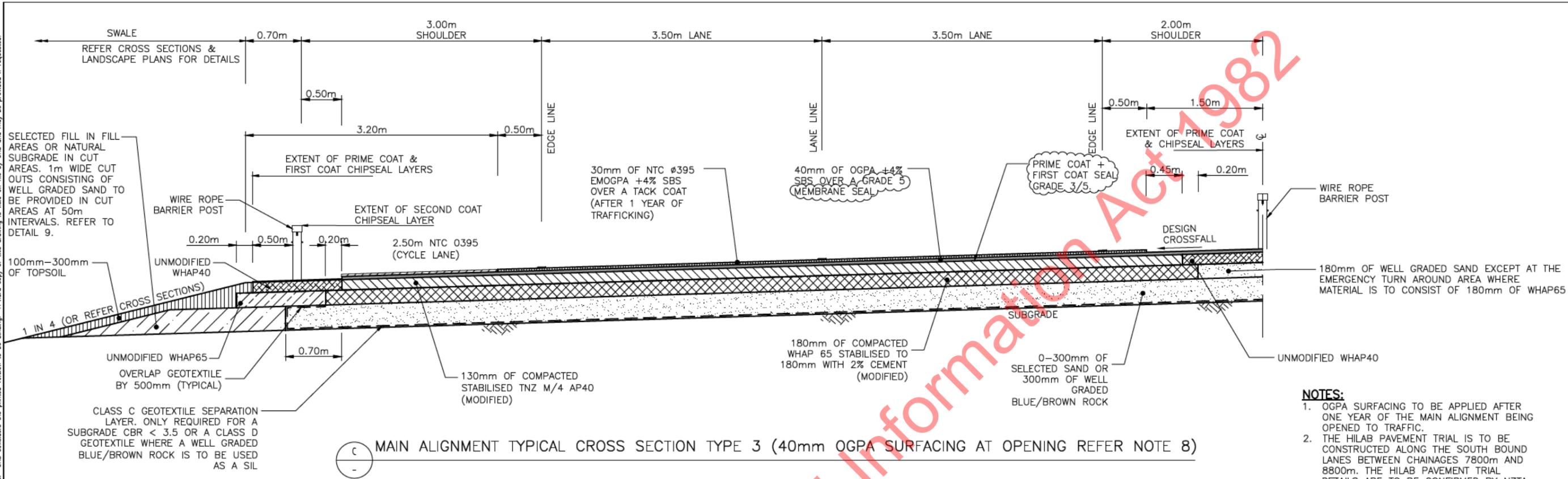
Tab	041-1
Scales	1:25 A1 1:50 A3
Original Size	A1

WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

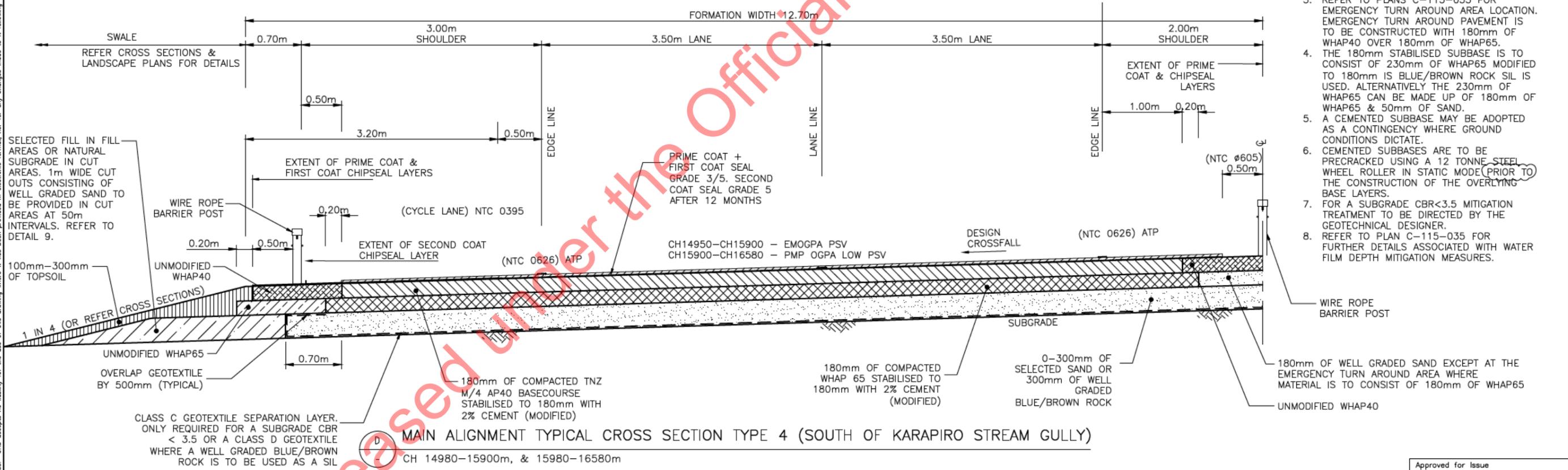
MAIN ALIGNMENT TYPICAL CROSS SECTIONS SHEET 1 OF 6

Status	AS-BUILT
Drawing Number	C-115-041-1
Revision	AB

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(C) MAIN ALIGNMENT TYPICAL CROSS SECTION TYPE 3 (40mm OGPA SURFACING AT OPENING REFER NOTE 8)



(D) MAIN ALIGNMENT TYPICAL CROSS SECTION TYPE 4 (SOUTH OF KARAPIRO STREAM GULLY)
CH 14980-15900m, & 15980-16580m

- NOTES:**
- OGPA SURFACING TO BE APPLIED AFTER ONE YEAR OF THE MAIN ALIGNMENT BEING OPENED TO TRAFFIC.
 - THE HILAB PAVEMENT TRIAL IS TO BE CONSTRUCTED ALONG THE SOUTH BOUND LANES BETWEEN CHAINAGES 7800m AND 8800m. THE HILAB PAVEMENT TRIAL DETAILS ARE TO BE CONFIRMED BY NZTA PRIOR TO CONSTRUCTION.
 - REFER TO PLANS C-115-035 FOR EMERGENCY TURN AROUND AREA LOCATION. EMERGENCY TURN AROUND PAVEMENT IS TO BE CONSTRUCTED WITH 180mm OF WHAP40 OVER 180mm OF WHAP65.
 - THE 180mm STABILISED SUBBASE IS TO CONSIST OF 230mm OF WHAP65 MODIFIED TO 180mm IS BLUE/BROWN ROCK SIL IS USED. ALTERNATIVELY THE 230mm OF WHAP65 CAN BE MADE UP OF 180mm OF WHAP65 & 50mm OF SAND.
 - A CEMENTED SUBBASE MAY BE ADOPTED AS A CONTINGENCY WHERE GROUND CONDITIONS DICTATE.
 - CEMENTED SUBBASES ARE TO BE PRECRACKED USING A 12 TONNE STEEL WHEEL ROLLER IN STATIC MODE (PRIOR TO THE CONSTRUCTION OF THE OVERLYING BASE LAYERS).
 - FOR A SUBGRADE CBR<3.5 MITIGATION TREATMENT TO BE DIRECTED BY THE GEOTECHNICAL DESIGNER.
 - REFER TO PLAN C-115-035 FOR FURTHER DETAILS ASSOCIATED WITH WATER FILM DEPTH MITIGATION MEASURES.

01	AS-BUILT AMENDED	12.06.17	1:25 A1 1:50 A3
AB	AS-BUILT	11.12.15	Original Size

042
Scales

HEB Construction

URS

TDG

Jasmax

GAIA ENGINEERS

NZ TRANSPORT AGENCY
WAKA KOTAHU

Approved for Issue
S 9(2)(a)

WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

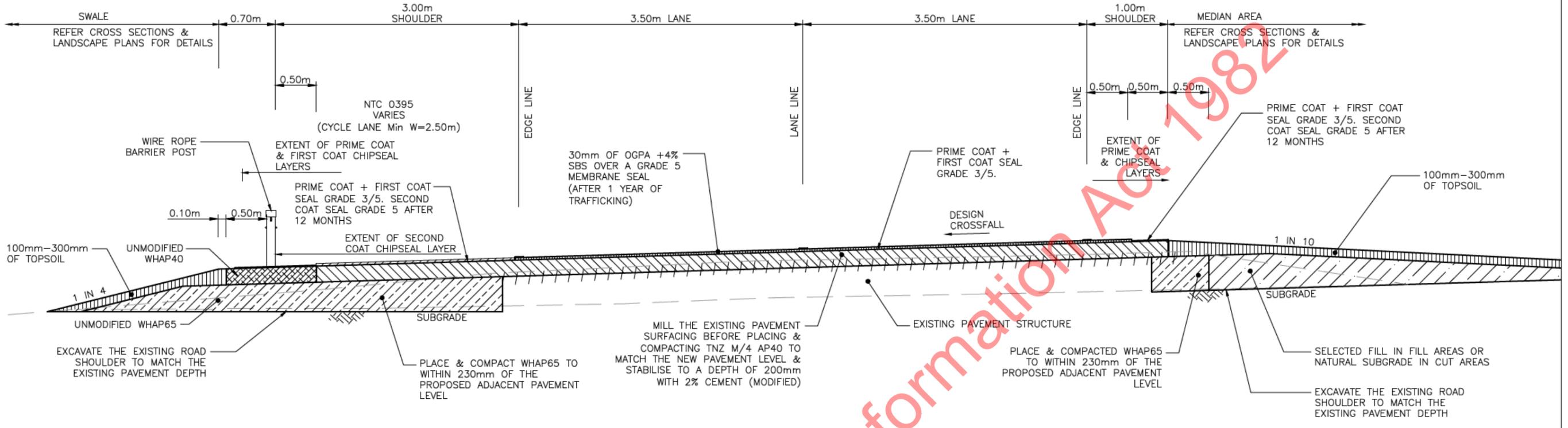
MAIN ALIGNMENT
TYPICAL CROSS SECTIONS
SHEET 2 OF 6

Status: AS-BUILT

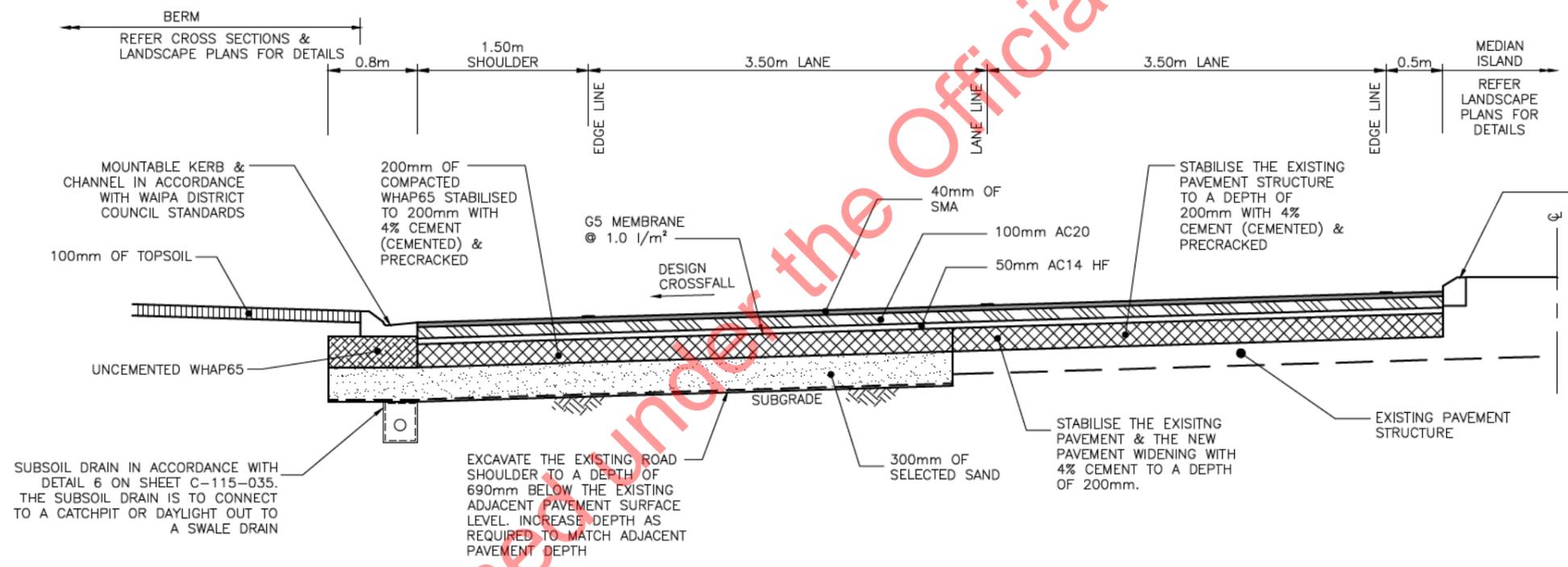
Drawing Number: C-115-042

Revision: AB

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(E) MAIN ALIGNMENT TYPICAL CROSS SECTION TYPE 5 NORTHERN TIE IN
CH 986-1500m



(F) TYPICAL CROSS SECTION VICTORIA ROAD

- NOTES:**
1. A TACK COAT IS TO BE APPLIED BETWEEN THE AC14HF & AC20 AT AN APPLICATION RATE OF 0.3 l/m².
 2. A TACK COAT IS TO BE APPLIED BETWEEN THE AC20 & SMA10 AT AN APPLICATION RATE OF 0.3 l/m².
 3. EXISTING PAVEMENT MATERIALS WILL BE ASSESSED FOR SUITABILITY FOR IN-SITU STABILISATION AS CTSB SUBBASE.
 4. CEMENTED SUBBASES ARE TO BE PREPACKED USING A 12 TONNE STEEL WHEEL ROLLER IN STATIC MODE PRIOR TO THE CONSTRUCTION OF THE OVERLYING BASE LAYERS.
 5. FOR A SUBGRADE CBR<3.5 MITIGATION TREATMENT TO BE DIRECTED BY THE GEOTECHNICAL DESIGNER.

Approved for Issue
S 9(2)(a)

01	AS-BUILT AMENDED	S 9(2)(a)	S 9(2)(a)	12.06.17	1:25 A1 1:50 A3			
AB	AS-BUILT			11.12.15	Original Size			
Rev	Revision Description	Drawn	Checked	Designed	Design Checked	Approved	Date	Original Size

Tob 043

Scales

HEB Construction

URS

TDG

Jasmax

GAIA ENGINEERS

NZ TRANSPORT AGENCY WAKA KOTAHU

WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

MAIN ALIGNMENT/ VICTORIA ROAD

TYPICAL CROSS SECTIONS

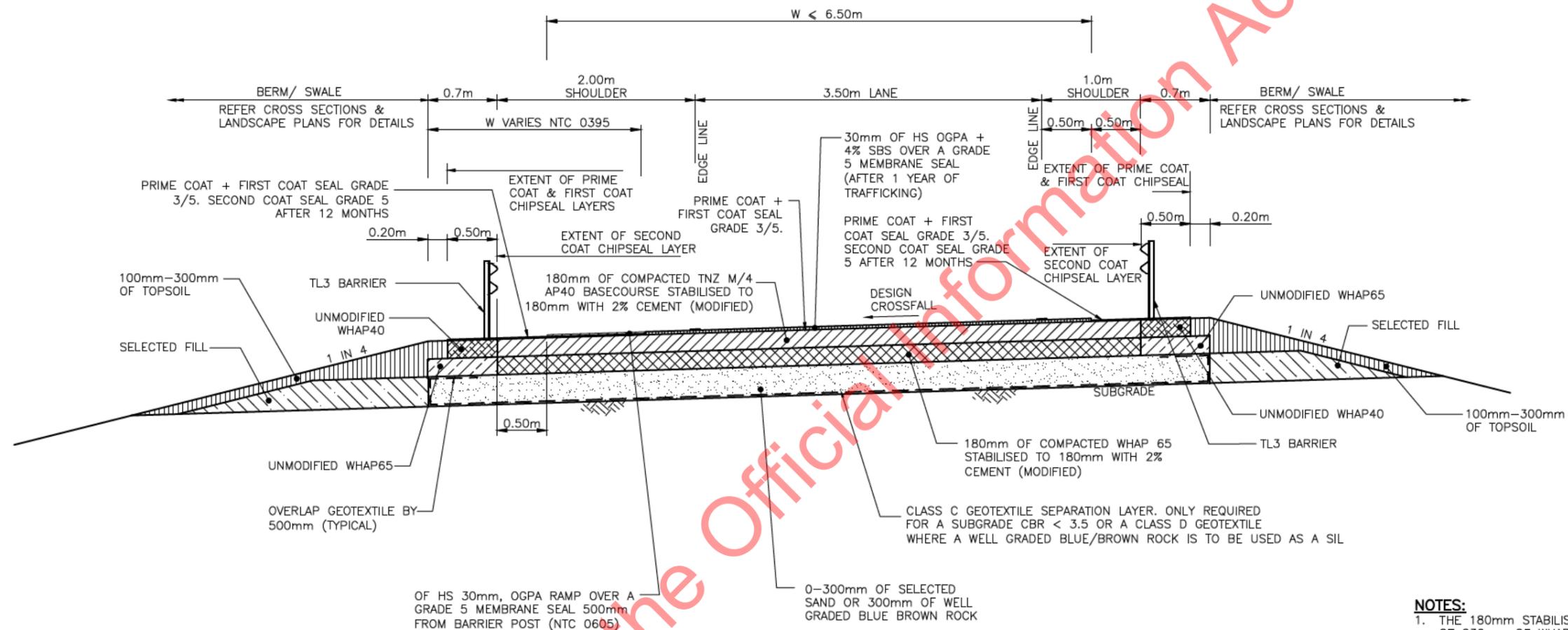
SHEET 3 OF 6

Status AS-BUILT

Drawing Number C-115-043

Revision AB

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OF HS 30mm, OGPA RAMP OVER A GRADE 5 MEMBRANE SEAL 500mm FROM BARRIER POST (NTC 0605)

0-300mm OF SELECTED SAND OR 300mm OF WELL GRADED BLUE BROWN ROCK

ⓐ TYPICAL MOTORWAY RAMP CROSS SECTION

NOTES:

1. THE 180mm STABILISED SUBBASE IS TO CONSIST OF 230mm OF WHAP65 MODIFIED TO 180mm IF BLUE/BROWN ROCK SIL IS USED. ALTERNATIVELY THE 230mm OF WHAP6 CAN BE MADE UP OF 180mm OF WHAP65 & 50mm OF SAND.
2. A CEMENTED SUBBASE MAY BE ADOPTED AS A CONTINGENCY WHERE GROUND CONDITIONS DICTATE.
3. CEMENTED SUBBASES ARE TO BE PRECRACKED USING A 12 TONNE ROLLER IN STATIC MODE PRIOR TO THE CONSTRUCTION OF THE OVERLYING BASE LAYERS.
4. FOR A SUBGRADE CBR<3.5 MITIGATION TREATMENT TO BE DIRECTED BY THE GEOTECHNICAL DESIGNER.

Approved for Issue
§ 9(2)(a)

01	AS-BUILT AMENDED	§ 9(2)(a)	§ 9(2)(a)	12.06.17	1:25 A1 1:50 A3	
AB	AS-BUILT			11.12.15	Original Size	
Rev	Revision Description	Drawn	Designed	Design Checked	Approved	Date

Top: 044

Scales: 1:25 A1, 1:50 A3

Original Size: A1

WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

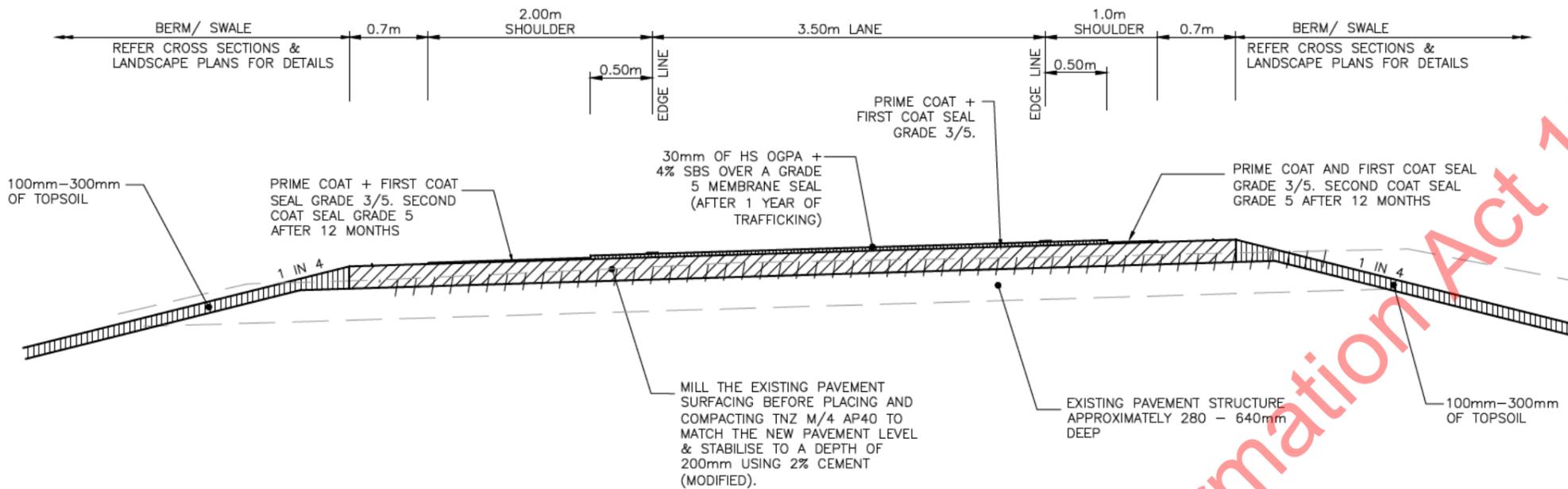
MOTORWAY RAMP
TYPICAL CROSS SECTIONS
SHEET 4 OF 6

Status: AS-BUILT

Drawing Number: C-115-044

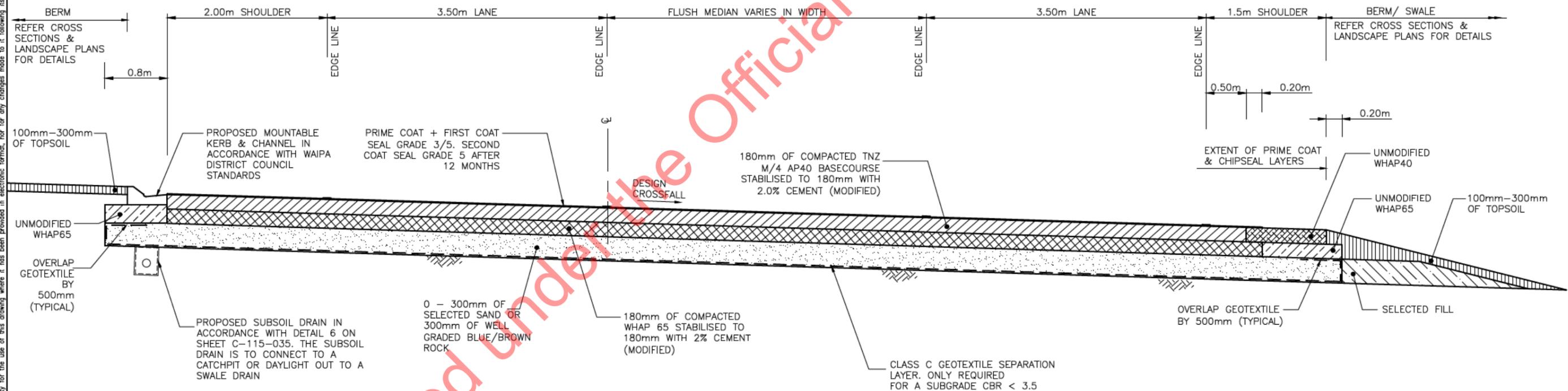
Revision: AB

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- NOTES:**
1. THE 180mm STABILISED SUBBASE IS TO CONSIST OF 230mm OF WHAP65 MODIFIED TO 180mm IF BLUE/BROWN ROCK SIL IS USED. ALTERNATIVELY THE 230mm OF WHAP6 CAN BE MADE UP OF 180mm OF WHAP65 & 50mm OF SAND.
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 3. CEMENTED SUBBASES ARE TO BE PRECRACKED USING A 12 TONNE ROLLER IN STATIC MODE PRIOR TO THE CONSTRUCTION OF THE OVERLYING BASE LAYERS.
 4. FOR A SUBGRADE CBR<3.5 MITIGATION TREATMENT TO BE DIRECTED BY THE GEOTECHNICAL DESIGNER.

(I) TYPICAL NORTHERN INTERCHANGE NORTHBOUND ON RAMP CROSS SECTION



(J) TYPICAL CROSS SECTION TIRAU ROAD

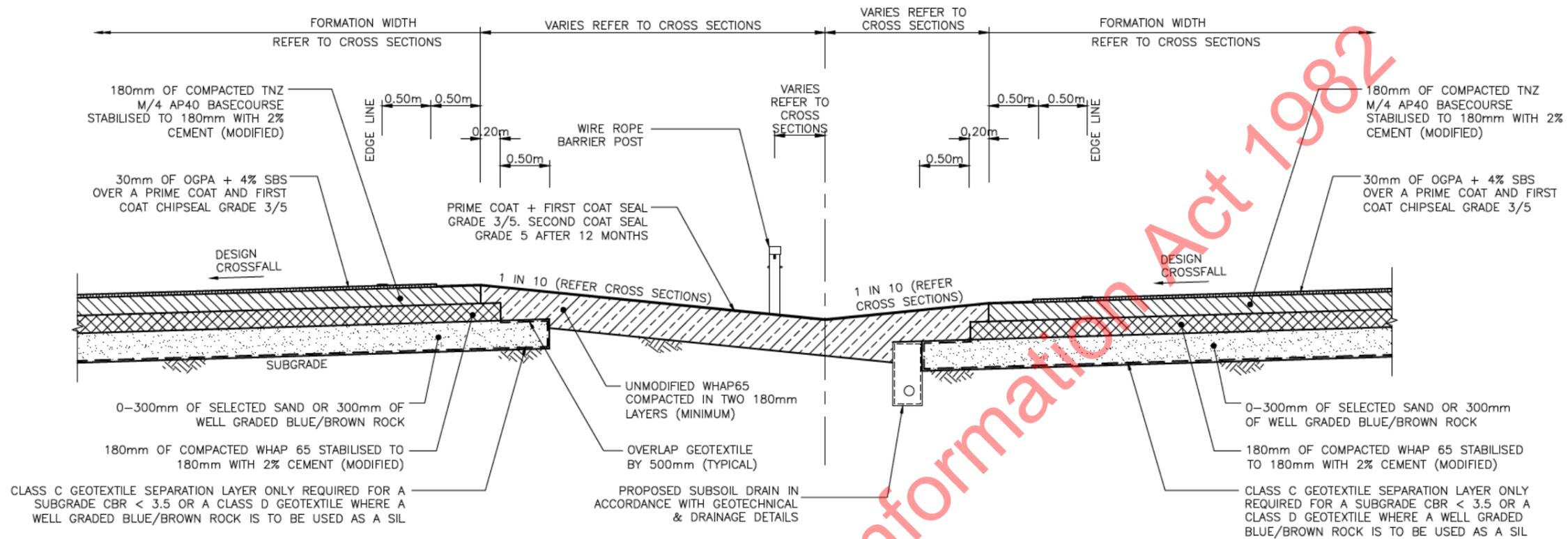
Approved for Issue
S 9(2)(a)

01	AS-BUILT AMENDED	S 9(2)(a)	S 9(2)(a)	12.06.17	1:25 A1 1:50 A3			
AB	AS-BUILT			11.12.15				
Rev	Revision Description	Drawn	Checked	Designed	Design Checked	Approved	Date	Original Size
								A1

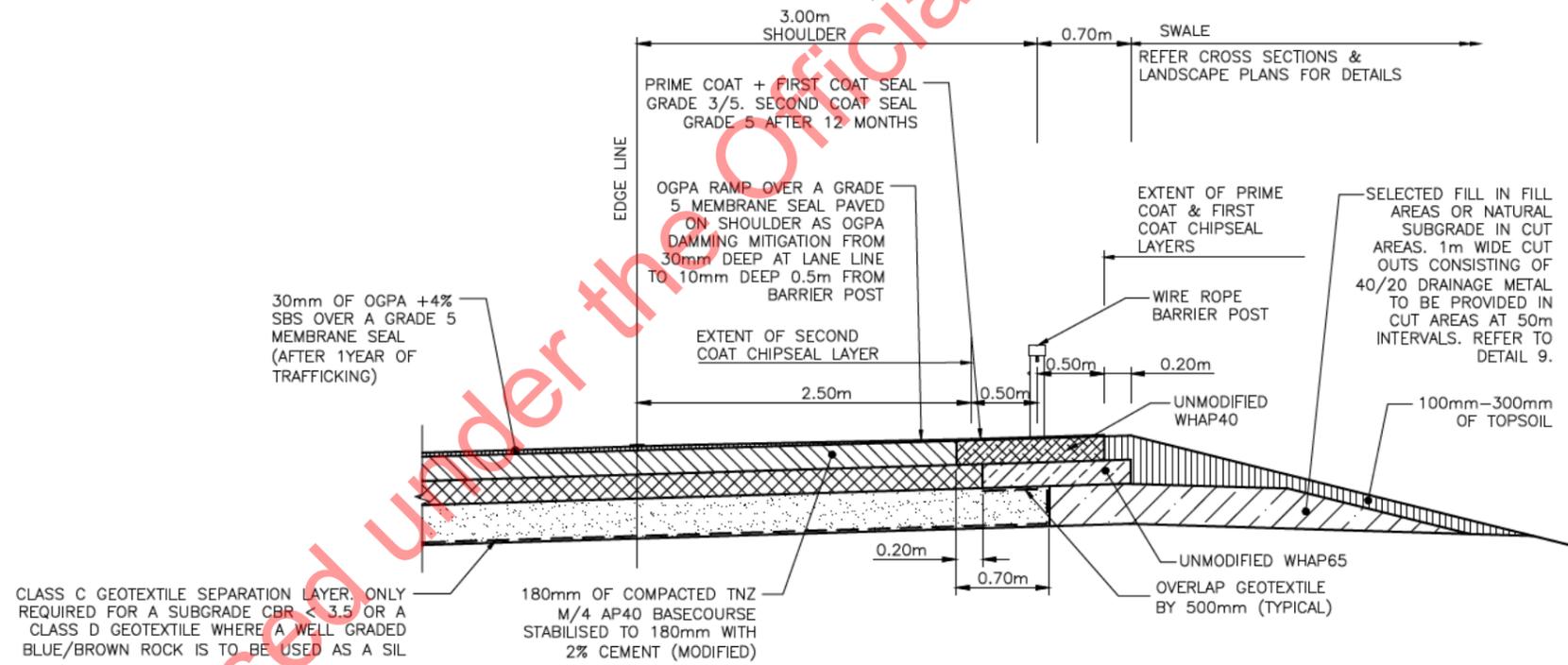
WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION
MOTORWAY RAMP/TIRAU ROAD
TYPICAL CROSS SECTIONS
SHEET 5 OF 6

Status: **AS-BUILT**
 Drawing Number: **C-115-045**
 Revision: **AB**

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(K) TYPICAL CROSS SECTION – MAIN ALIGNMENT SEALED MEDIAN SPLIT CARRIAGEWAY



(L) PROPOSED OGPA DAMMING MITIGATION ON SHOULDERS AS INSTRUCTED BY HEB CONSTRUCTION

Approved for Issue
S 9(2)(a)

Rev	Revision Description	Drawn	Checked	Designed	Design Checked	Approved	Date
01	AS-BUILT AMENDED						12.06.17
AB	AS-BUILT						11.12.15

Tob	046
Scales	1:2500 A1 1:5000 A3
Original Size	A1

WAIKATO EXPRESSWAY: TAMAHERE TO CAMBRIDGE SECTION

MAIN ALIGNMENT
TYPICAL CROSS SECTIONS
SHEET 6 OF 6

Status: AS-BUILT
Drawing Number: C-115-046
Revision: AB