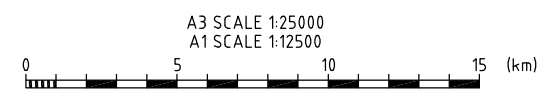


**LEGEND**

- EXISTING AND NEW OUTFALL
- EXISTING & NEW STREAM STRUCTURES INCLUDING CULVERTS
- PROPOSED SW OUTLET PIPE
- PROPOSED SW MANHOLE
- EXISTING STREAM
- EXISTING STREAM TO BE FILLED
- STREAM WORKS, CHANNEL REALIGNMENT, REHABILITATION & SWALES
- NEW BRIDGE
- STORMWATER WETLAND



**FOR APPROVAL  
NOT FOR CONSTRUCTION**

Base level:	MSL AUCK. VERT. DATUM 1946
Grid Reference:	MT EDEN 2000
Originator No.	
Project No.	20.1.11-3-D-N-931-100
Rev.	B

No.	Revision	By	Chk	Appd	Date
B	ISSUE FOR STATUTORY APPROVAL	BNRB			22.07.10
A	ISSUE FOR SRT / NZTA REVIEW	BNRB			25.06.10

Drawing Originator:

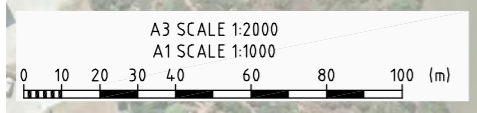
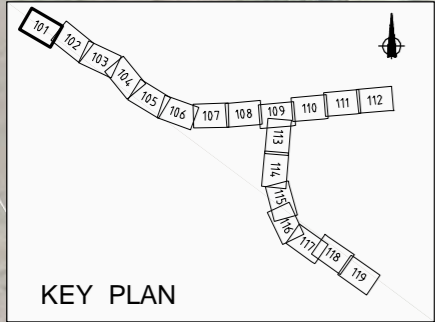
**Tonkin & Taylor**  
Environmental and Engineering Consultants

Original Scale (A1)	1:12500	Designer	TF
Reduced Scale (A3)	1:25000	Reviewer	BM
		Drafting Checked	-
		Consultant Approval	AL
		Received by	Beca

**NZ TRANSPORT AGENCY**  
WAKA KOTAHI

Project: **WATERVIEW CONNECTION PROJECT**  
SH16 / SH20

Title: **STREAMWORKS & SW DISCHARGE**  
KEY PLAN



**FOR APPROVAL**  
**NOT FOR CONSTRUCTION**

Base Level:  
MSL AUCK. VERT. DATUM 1946  
Grid Reference:  
MT EDEN 2000  
Originator No.  
Project No.  
20.1.11-3-D-N-931-101  
Rev.  
B

No.	Revision	By	Chk	Appd	Date
B	ISSUE FOR STATUTORY APPROVAL	AG	COB	JH	02.08.10
A	ISSUED FOR SRT/NZTA REVIEW	AG	COB	JH	23.06.10

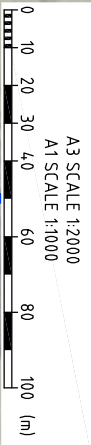
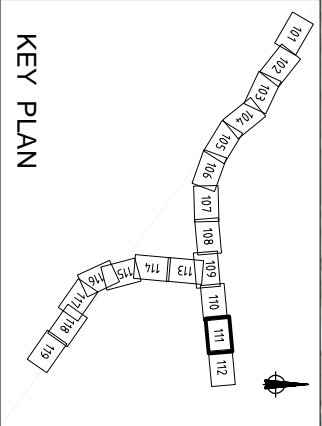
Drawing Originator:  
**aurecon**  
Aurecon New Zealand Limited  
139 Carlton Gore Road (PO Box 9762) Newmarket, Auckland New Zealand  
Telephone: +64 9 520-8019  
Facsimile: +61 9 524-7816  
Email: auckland@aurecongroup.com

Original Scale (A1)	1:1000	Designer	AG
Reduced Scale (A3)	1:2000	Reviewer	COB
		Drafting Checked	WC
		Consultant Approval	JH
		Received by Beca	---



Project: **WATERVIEW CONNECTION PROJECT**  
**SH16 / SH20**

Title: **STREAMWORKS AND SW DISCHARGE**  
**SHEET 1**



No.	Revision	By	Chk	Appl	Date
A	ISSUED FOR SRT / NZTA REVIEW	BMB			22.07.10
B	ISSUE FOR STATUTORY APPROVAL	BMB			25.04.10

Drawing Originator:		Original Scale (A1)	1:1000
Becca		Reduced Scale (A3)	1:2000
Designer	TF	Reviewer	BH
Drafting Checked	AL	Consultant Approval	AL
Received By		Received By	



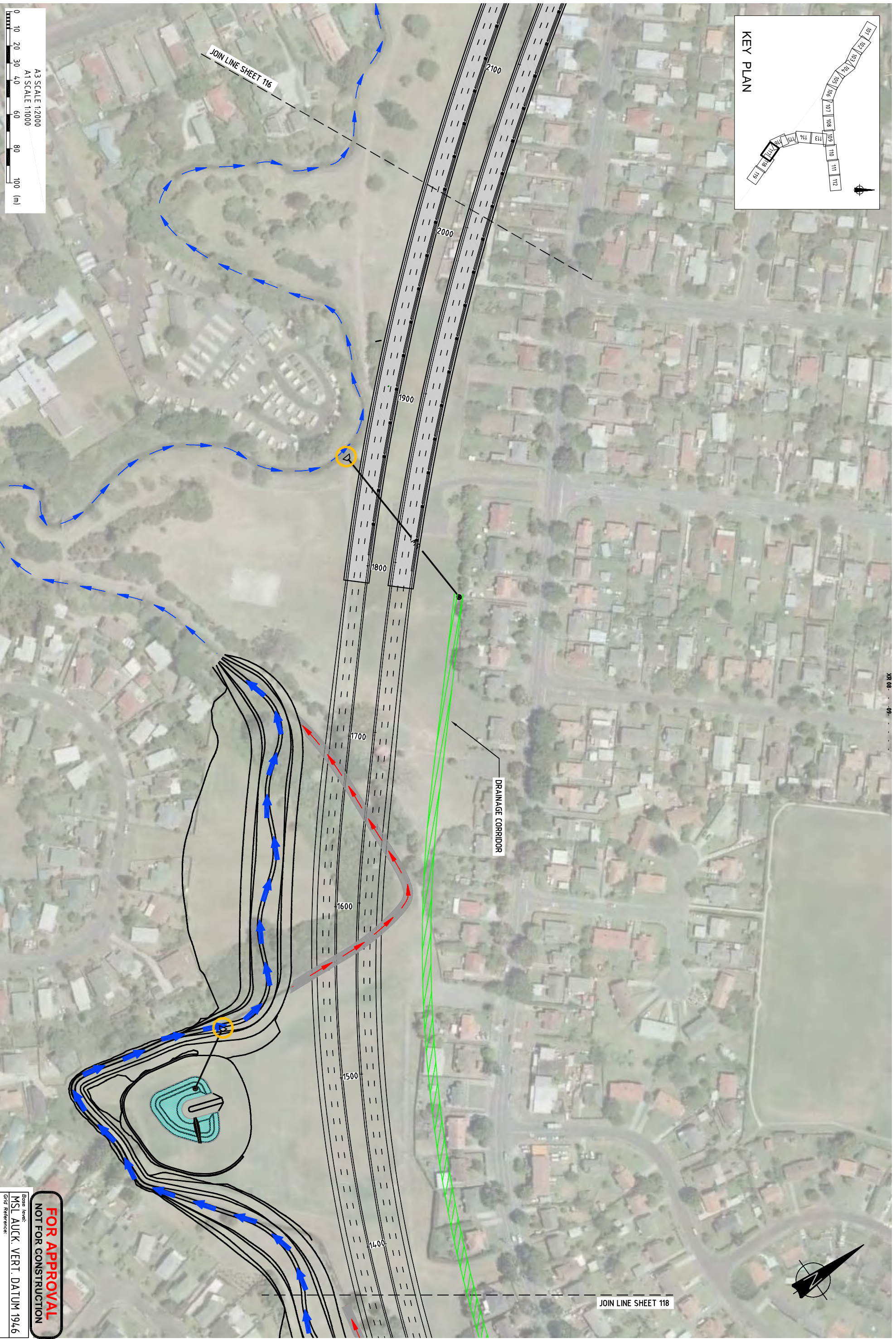
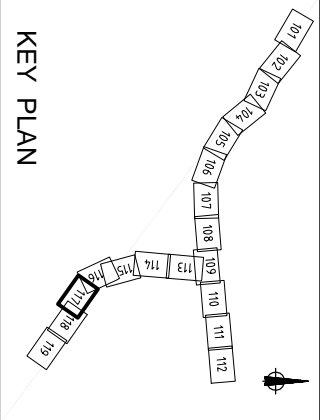
Project: WATERVIEW CONNECTION  
PROJECT SH16 / SH20

Title: STREAMWORKS & SW DISCHARGE  
SHEET 11

Originator No. MT EDEN 2000  
Project No. 20.111-3--D-N-931-111  
Rev. B

**FOR APPROVAL**  
NOT FOR CONSTRUCTION

Band level: MSL  
AUCK. VERT. DATUM 1946  
Grid Reference:



No.	Revision	By	Chk	Appl	Date
A	ISSUED FOR SRT / NZTA REVIEW	BMB			22.07.10
B	ISSUE FOR STATUTORY APPROVAL	BMB			25.04.10

Drawing Originator:		Original Scale (A1)	Designer	TF
<b>Becca</b>		1:1000	Reviewer	BH
		Reduced Scale (A3)	Drafting Checked	-
		1:2000	Consultant Approval	AL
			Received by Becca	



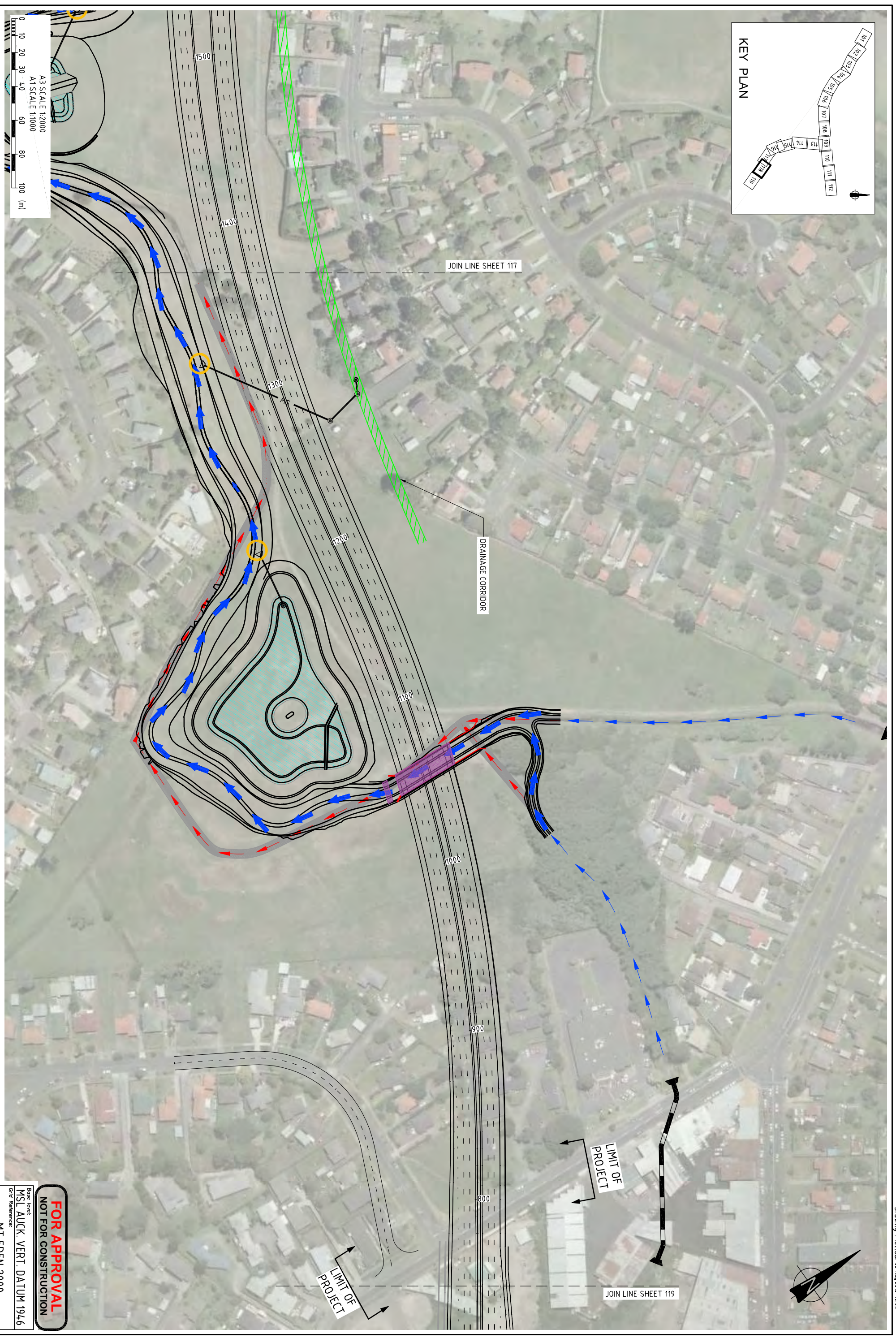
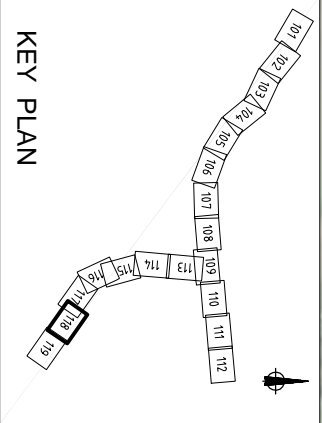
Project: WATERVIEW CONNECTION  
PROJECT SH16 / SH20

Title: STREAMWORKS & SW DISCHARGE  
SHEET 17

Project No.	20.111-3-D-N-931-117	Rev.	B
Originator No.	MT EDEN 2000		

**FOR APPROVAL**  
NOT FOR CONSTRUCTION

Board level:  
MSL AUCK. VERT. DATUM 1946  
Grid Reference:



A3 SCALE 1:2000  
 A1 SCALE 1:1000  
 0 10 20 30 40 60 80 100 (m)

No.	Revision	By	CHK	Appd	Date
B	ISSUE FOR STATUTORY APPROVAL	BMB			22.07.10
A	ISSUED FOR SRT / NZTA REVIEW	BMB			25.04.10

Drawing Originator:		Original Scale (A1)	1:1000	Designer	TF
Beca		Reduced Scale (A3)	1:2000	Reviewer	BH
				Drafting Checked	-
				Consultant Approval	AL
				Received by Beca	



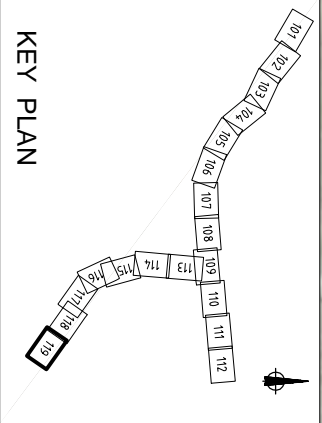
Project: WATERVIEW CONNECTION  
 PROJECT SH16 / SH20

Title: STREAMWORKS & SW DISCHARGE  
 SHEET 18

Originator No.	MT EDEN 2000
Project No.	20.111-3-D-N-931-118
Rev.	B

**FOR APPROVAL**  
 NOT FOR CONSTRUCTION

Base Level: MSL  
 MSL AUCK VERT. DATUM 1946  
 Grid Reference:



No.	Revision	By	CHK	Appd	Date
A	ISSUED FOR SRT / NZTA REVIEW	BMB			22.07.10
B	ISSUE FOR STATUTORY APPROVAL	BMB			25.06.10

Drawing Originator:	
<b>Becca</b>	
Original Scale (A1)	1:1000
Reduced Scale (A3)	1:2000
Designer	TF
Reviewer	BH
Drafting Checked	-
Consultant Approval	AL
Received by Becca	



Project: WATERVIEW CONNECTION PROJECT  
SH16 / SH20

Title: STREAMWORKS & SW DISCHARGE  
SHEET 19

**FOR APPROVAL**  
NOT FOR CONSTRUCTION

Base Level: MSL  
M.S.L. AUCK. VERT. DATUM 1946

Grid Reference: MT EDEN 2000

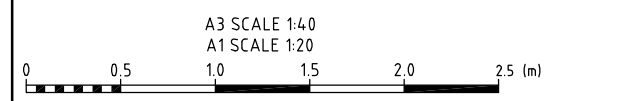
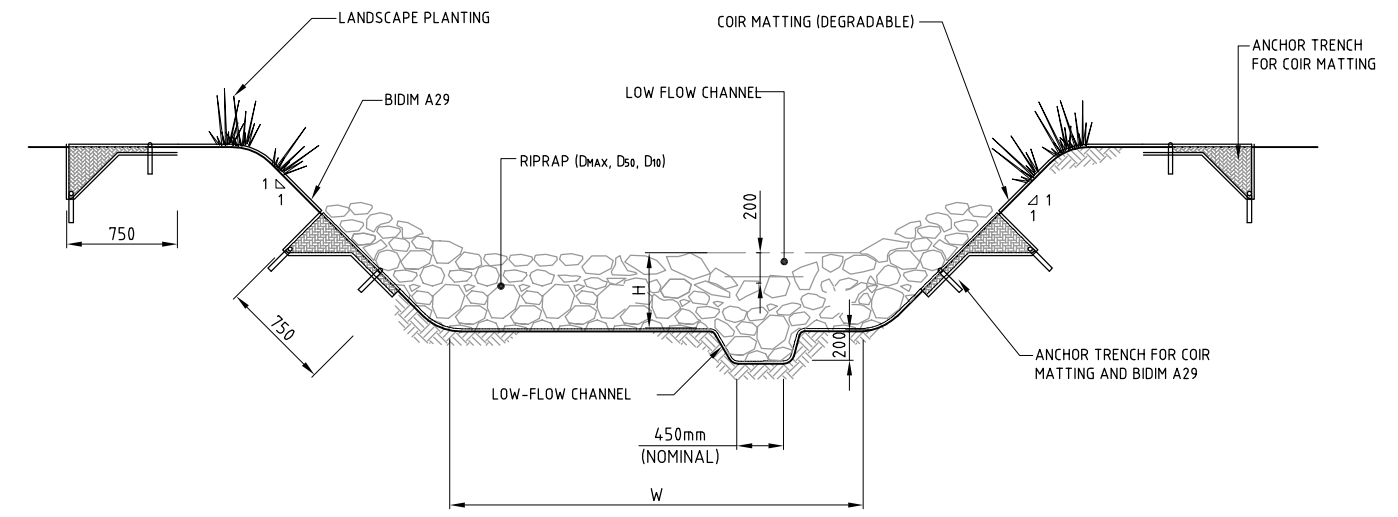
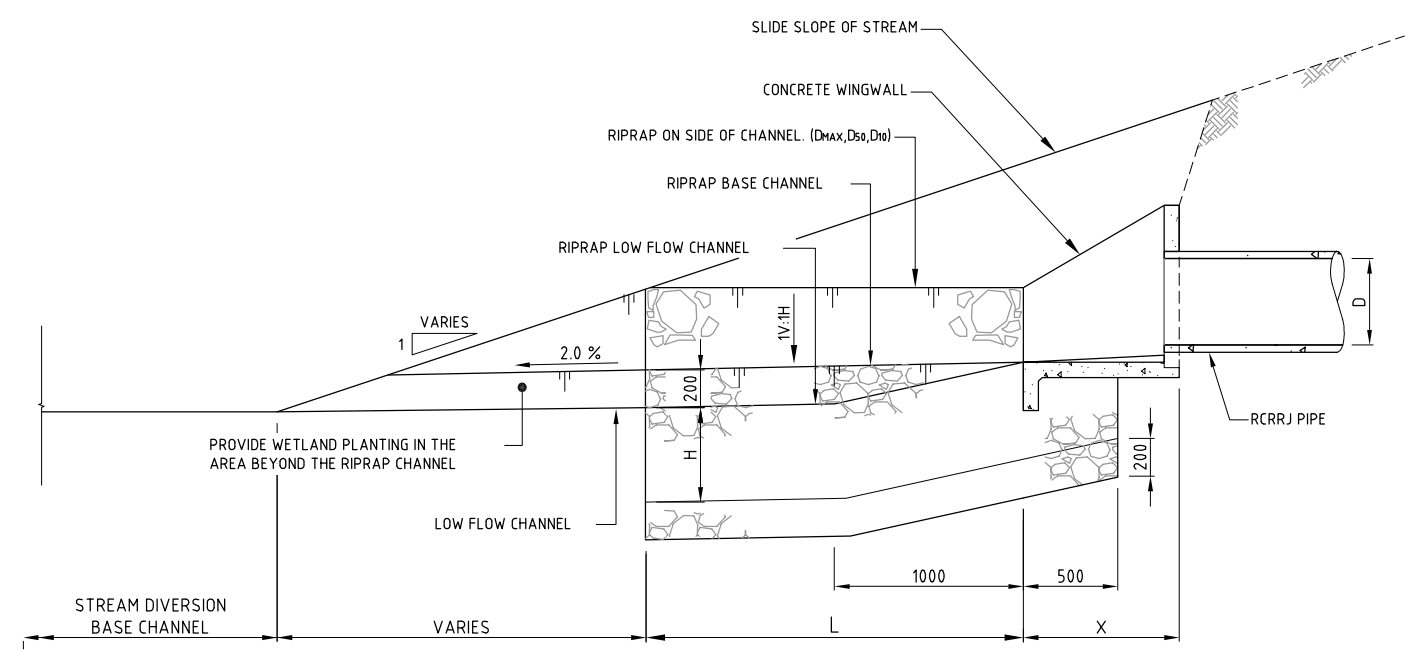
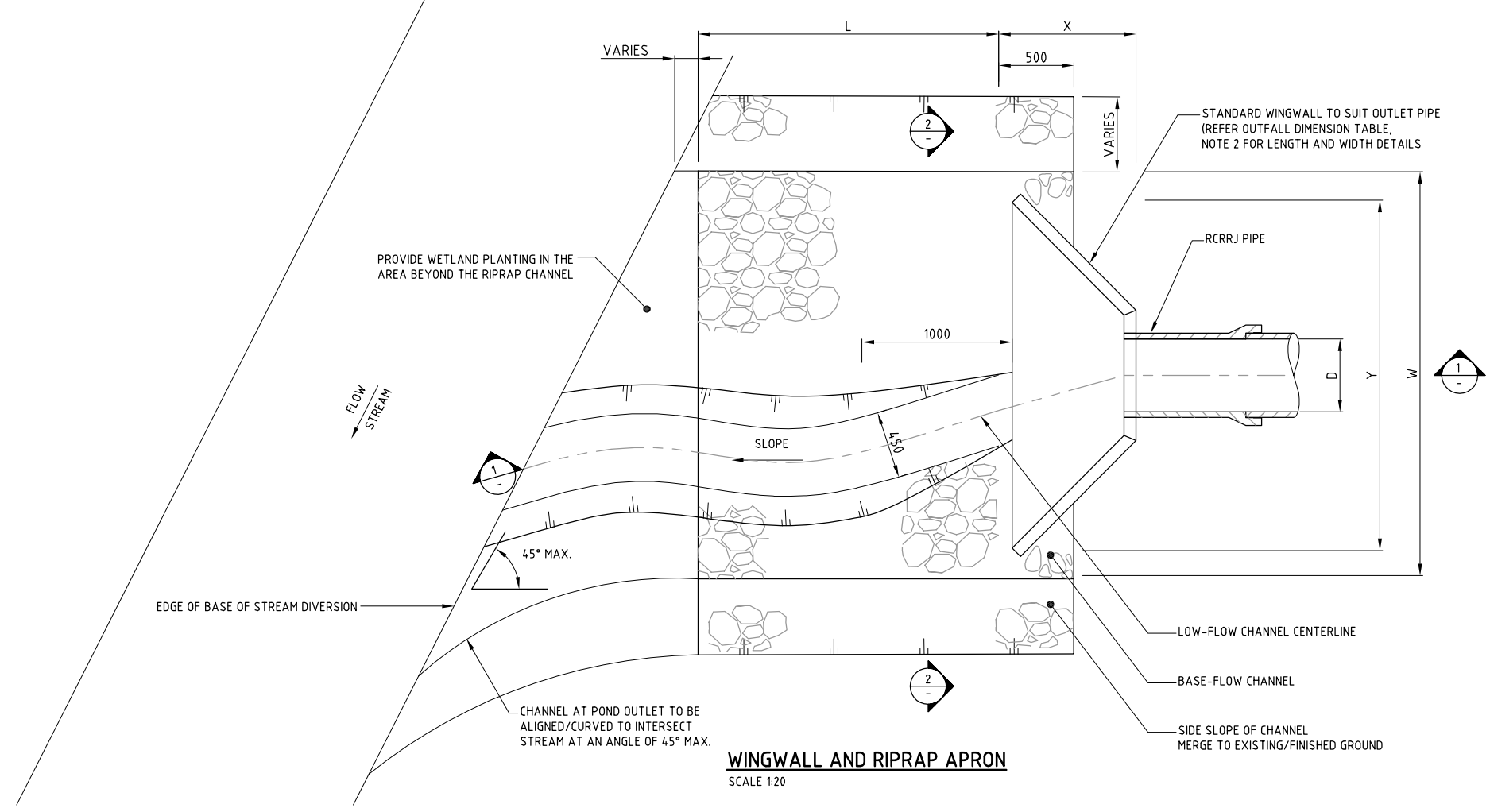
Project No. 20.111-3-D-N-931-119

Rev. B

NOTES  
 1. DIMENSION IN MILLIMETER UNLESS NOTED OTHERWISE.  
 2. OUTFALL DIMENSION

ITEM	TD9A/CD9C	TD9B/CD9D	HENDON SWALE (CH1320)
D	450	600	1050
L <sub>MIN</sub>	2000	4200	4200
W	3000	3000	4000
H	500	1000	350
D <sub>50</sub>	200±40	500	100
X#	825	825	2200
Y#	2300	2300	3800

# - DIMENSIONS FROM HUMES CATALOGUE



No.	Revision	By	Chk	Appd	Date
B	FOR STATUTORY APPROVAL	BNRB			22.07.10
A	FOR REVIEW	JATG			30.03.10

Drawing Originator:  
**Tonkin & Taylor**  
 Environmental and Engineering Consultants

Original Scale (A1) AS SHOWN	Design Engineer	SBW
Reduced Scale (A3) AS SHOWN	Review Engineer	TSRF
	Drafting Checked	-
	Consultant Approval	-
	Received by	Beca AL

**NZ TRANSPORT AGENCY**  
 WAKA KOTAHĪ

Project: **WATERVIEW CONNECTION PROJECT**  
 SH16 / SH20

Title: **STORMWATER RETICULATION OUTFALL DETAILS WINGWALL AND RIPRAP APRON**

**FOR APPROVAL NOT FOR CONSTRUCTION**

Base level: **MSL AUCK. VERT. DATUM 1946**  
 Grid Reference: **MT EDEN 2000**

Originator No. \_\_\_\_\_  
 Project No. **20.1.11-3-D-N-931-301** Rev. **B**