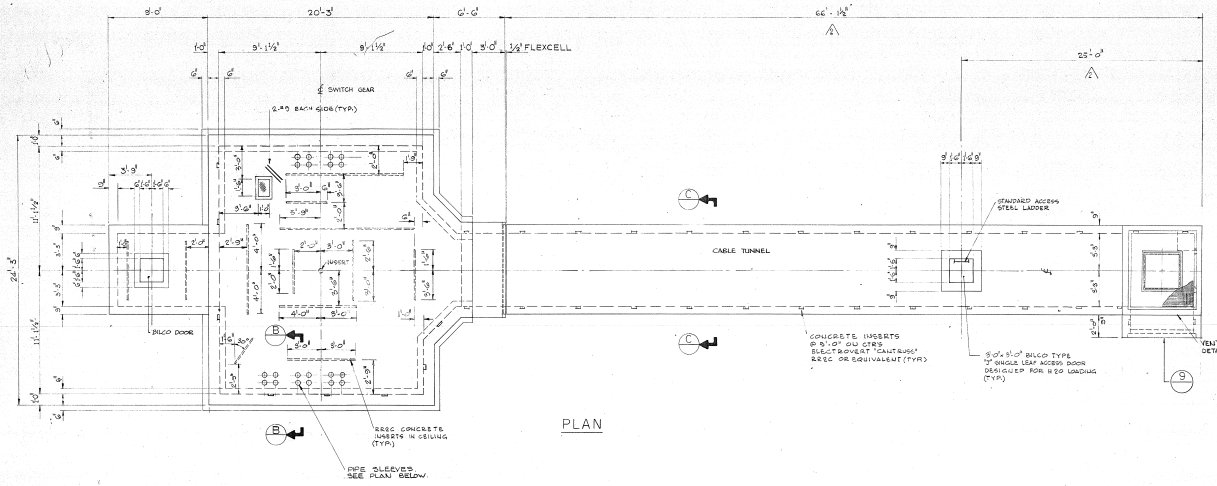
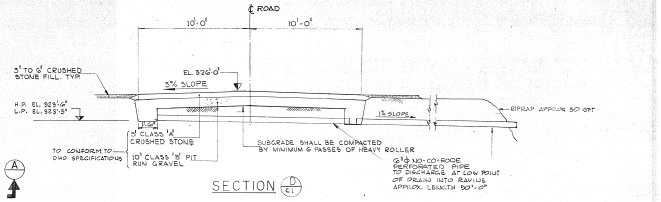
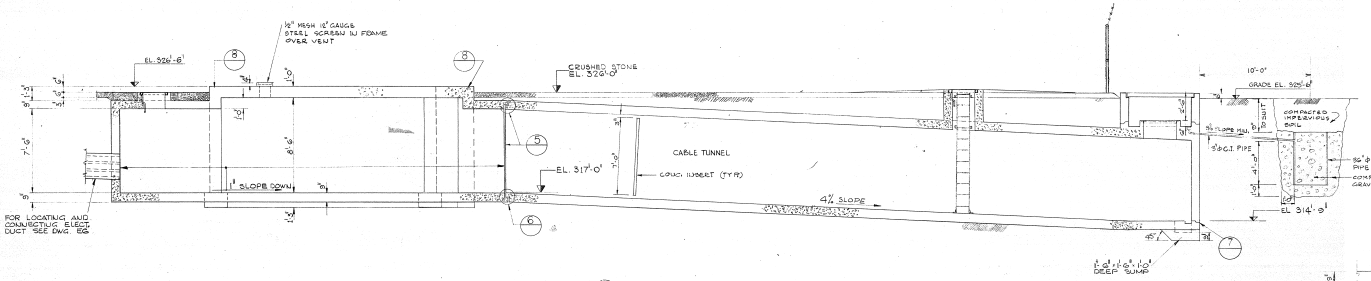
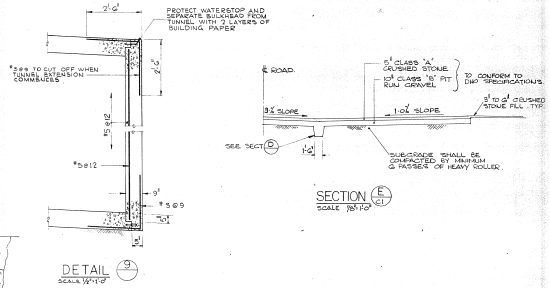
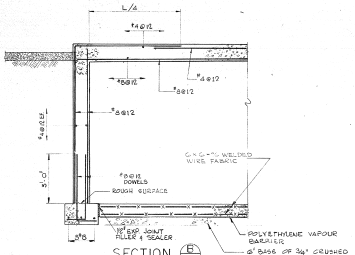
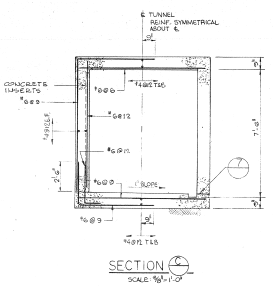


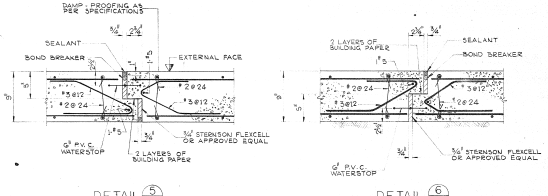


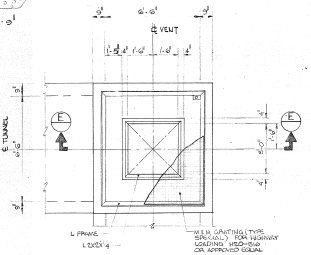


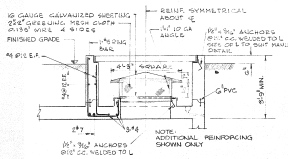


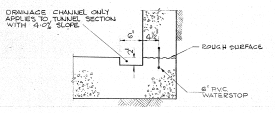


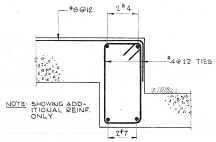


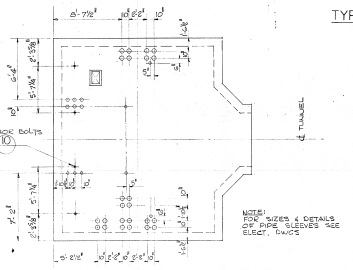


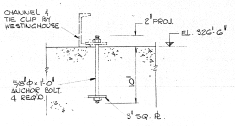












TYPICAL EXPANSION JOINTS
SCALE 1½"=1'-0"

THIS DRAWING SHALL BE USED IN CONJUNCTION WITH DRAWING 1796-D-E1

DATE	No.	ISSUE	CH.	APP.
MAR 2 '70	A	RELEASED ISSUED FOR CONSTRUCTION		
7/11/69	A	ISSUED FOR TENDER		
6/11/69	A	ISSUED FOR CLIENT'S APPROVAL		

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HAMILTON, ONTARIO

PROJECT NO. 146 — 115 KV SUBSTATION

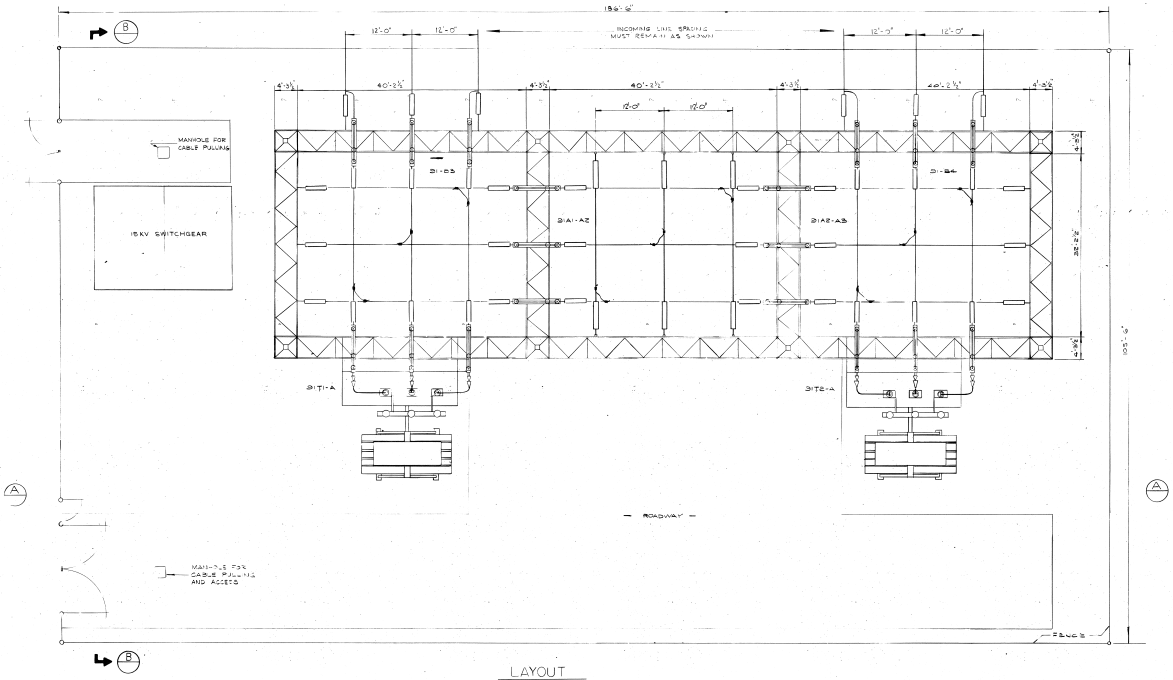
CIVIL

SWITCHGEAR FOUNDATIONS & TUNNEL PLAN, SECTIONS AND DETAILS

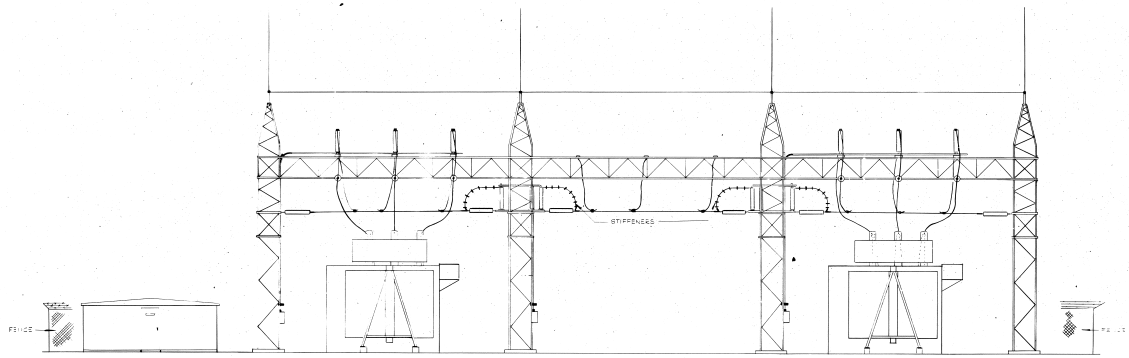
DRAWING No. 1796-D-C2 REV. A

SCALE ½"=1'-0" — DATE NOV 4 1968 — DRAWN — CHECKED — PROJECT ENGINEER — MATERIAL LIST No. — INDEX No. — DRAWING No. 1796-D-C2 — SHEET OF — REV. A

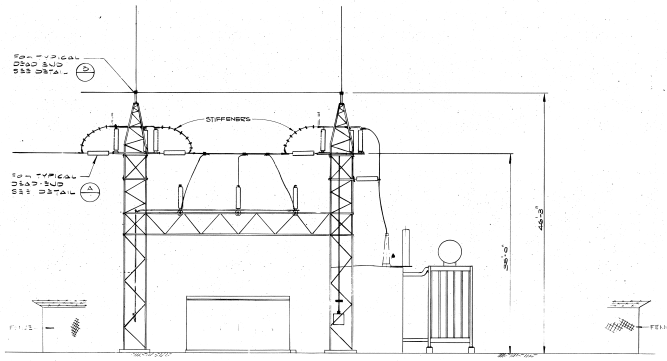
H. G. ACRES & COMPANY LIMITED



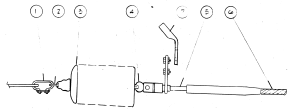
LAYOUT
SCALE 1"=10'-0"



ELEVATION (A)
SCALE 1/8"=1'-0"



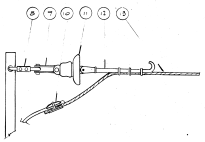
ELEVATION (B)
SCALE 1/8"=1'-0"



DETAIL (A)
NTS
TYPICAL INDOOR 115 DEAD-END

ITEM NO	DESCRIPTION
1	STRAIN LINK, 5/8"
2	BALL EYE
3	INSULATORS, 15000 LB
4	ADAPTOR, STRAIN
5	CONNECTOR, COMPRESSION
6	CONDUCTOR
7	TEMPORARY JUMPER

NOTE:
ITEMS 1, 2, 3, 4, 5, 6, WILL BE SUPPLIED BY ONTARIO HYDRO



DETAIL (B)
NTS
TYPICAL INDOOR 115 BETWEEN DEAD-END

ITEM NO	DESCRIPTION
8	STRAIN LINK, 5/8"
9	SHACKLE, STRAIGHT
10	CLAMP, PARALLEL GROOVE
11	INSULATOR
12	STRAIN CLAMP, BOLTED
13	CONDUIT, STEEL

NOTE:
ITEMS 8, 9, 10, 11, 12, 13 SHALL BE SUPPLIED BY THE CONTRACTOR, OTHER ITEMS WILL BE SUPPLIED BY ONTARIO HYDRO

DATE	No.	ISSUE	CH.	APP
	1			
	2			
	3			
	4			
SEPT. 1972	5	"AS BUILT"	KSK	
FEB. 1971	6	REVISED DURING CONSTRUCTION	KSK	WM
MARCH 1970	7	ISSUED FOR CONSTRUCTION	KSK	GB
NOV. 11/69	8	ISSUED FOR TENDER	KSK	GB
SEPT. 1/69	9	ISSUED FOR CLIENTS APPROVAL	SMB	GB
MARCH 11/69	10	ISSUED FOR TENDER (STRUCTURE ONLY) (1796-D-E4A)	SMB	GB

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HAMILTON — ONTARIO

PROJECT NO. 146 — 115 KV SUBSTATION

ELECTRICAL

LAYOUT AND ELEVATIONS

SCALE	AS NOTED	MATERIAL LIST No.
DATE	FEB. 1969	INDEX No.
DRAWN	CHECKED	PROJECT ENGINEER
SMB		GB

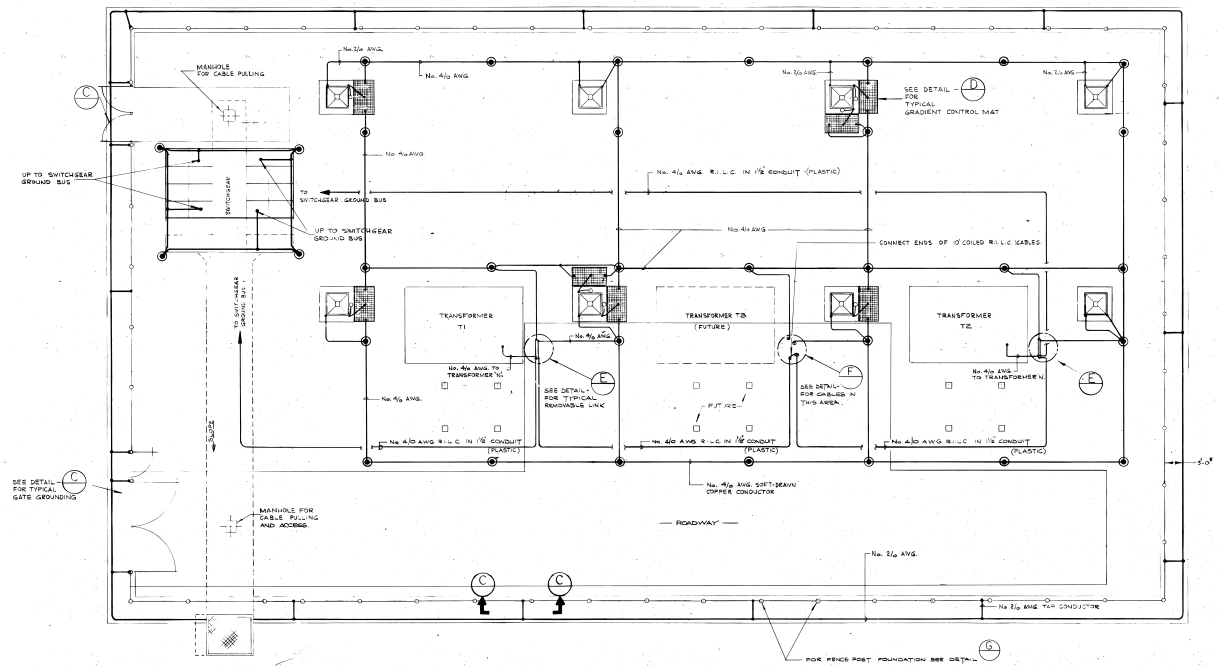
DRAWING No. 1796-D-E4 — SHEET — REV. 10

H. G. ACRES & COMPANY LIMITED

DRAWING No. 1796-D-E4 — SHEET — REV. A

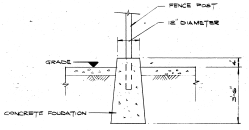
TRANSLAR 500-3-65

APPLIED MECHANICS | MINISTERIAL | CIVIL | GEOLOGY | ELECTRICAL | HYDRAULIC | MECHANICAL



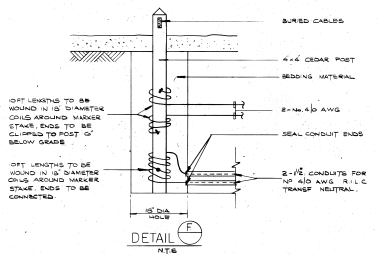
GROUNDING PLAN

SCALE: 1/8" = 1'-0"



DETAIL G

NTS



DETAIL F

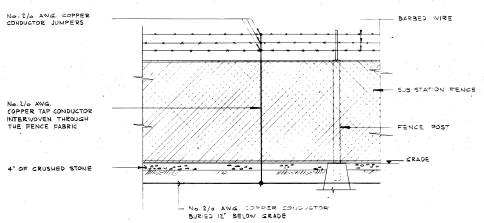
NTS

NOTES

1. ALL ELECTRICAL CONNECTIONS BELOW GROUND SHALL BE OF THE EXOTHERMIC TYPE
2. EXTRA FLEXIBLE COPPER CONDUCTORS SHALL BE USED FOR ALL BONDING.

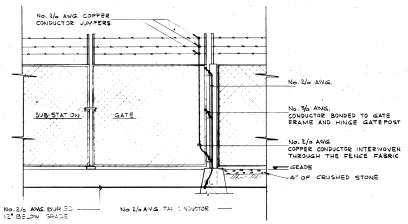
LEGEND

⊙ — ¾" & 10'-0" GROUND ROD WITH HEPC TYPE INSPECTION COVER



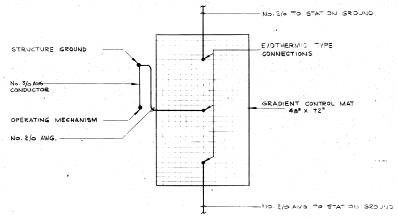
SECTION C

N.T.S.



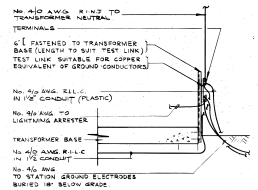
DETAIL C

N.T.S.



DETAIL D

N.T.S.



DETAIL E

N.T.S.

DATE	No.	ISSUE	CH.	APP
	1			
	2			
	3			
	4			
	5			
	6			
SEPT 1972	A	"AS BUILT"	GB	
MARCH 1970	A	ISSUED FOR CONSTRUCTION	DPM	GB
NOV 17/69	A	ISSUED FOR TENDER	DPM	GB
SEPT 19/69	A	ISSUED FOR CLIENTS APPROVAL	DPM	GB

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McMASTER UNIVERSITY

HAMILTON — ONTARIO

PROJECT NO. 146 — 115 KV SUBSTATION

ELECTRICAL

GROUNDING PLAN AND DETAILS

SCALE: AS SHOWN | DRAWN: D.P.M. | CHECKED: DPM | PROJECT ENGINEER: GB

DRAWING NO. 1796-D-E5 | SHEET 5 | REV. A

H. G. ACRES & COMPANY LIMITED

TRANSLAN 300-348

APPLIED MECHANICS | MINISTRIAL | CIVIL | GEOLOGY | ELECTRICAL | HYDRAULIC | MECHANICAL | CONSTRUCTION