

BA 1456

Represented in all principal cities throughout Canada, the United States and Europe

OUR FILE NO.	
OUR ORDER NO.	TD-116
CLIENT'S ORDER NO.	

DONALD INSPECTION LIMITED

INSPECTING AND TESTING ENGINEERS

1189 GUY STREET
MONTREAL, QUE.340 RICHMOND ST. W.
TORONTO, ONT.

REPORT NO.	
	T62-6017
SHEET	OF

62-7-2861

May 31st, 1962

REPORT OF

SOIL TEST BORINGS

For Duncan Hopper and Associates Limited,

Address 1885 Wilson Avenue, Weston, Ontario.

LOCATION: Proposed Site for Culvert, Township of Albion.

REPORTED TO: Duncan Hopper and Associates Limited, Attention: Mr. R. G. Crawford, P. Eng.

We report herein results of two soil test borings made at the above site during the week of May 21st, 1962.

Location of borings are shown on the accompanying sketch No.1 and details of soil stratification are shown on the boring logs (enclosure No.2).

Description of Field Work

Due to the hard nature of the sub-soil it was necessary to employ the wash boring method. BX casing was used to maintain the holes clean and open above the sampling and testing levels.

At shallow intervals through the soil profile, standard penetration tests were made and soil samples were taken. The penetration test consisted in determining the number of blows required to drive a 2" O.D. split-spoon soil sampler for a depth of 1'-0" into the sub-soil by the impact of a 140 lb. hammer dropping freely through a height of 30 inches.

Results of strength and penetration tests are given under columns "Q" and "N" respectively in the boring logs.

Description of Sub-Soil

Sub-surface conditions were found to be very similar at the 2 points investigated.

At the surface a shallow layer of granular soil was present to depths of 1'-0" (No.1) and 1'-4" (No.2).

The above granular layer was followed by hard grey silt with some clay extending to the final depths penetrated (21').

Conclusion

The boring results reveal that the sub-soil (silt) underlying the surface granular layer has excellent physical characteristics to provide safe foundation support. We consider an allowable soil bearing value of 3 tons/sq. ft. to be a conservative figure for determining footing areas founded in the grey silt stratum.

STRUCTURE SITE No. 25-206

DONALD INSPECTION LIMITED

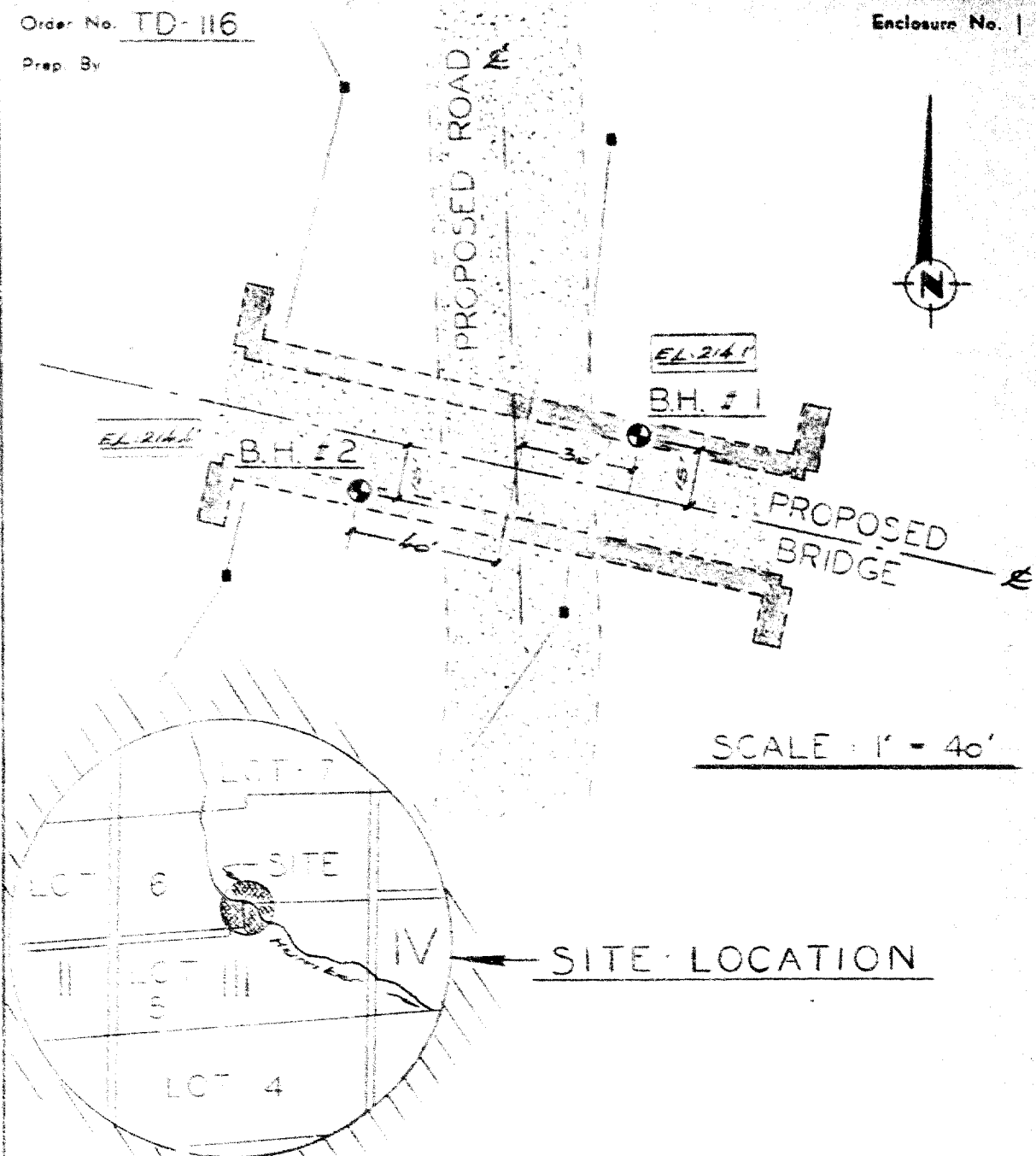
S. Nowski, P. Eng.

SW/am.
ENCLOS.

Order No. TD-116

Prep. By

Enclosure No. 1

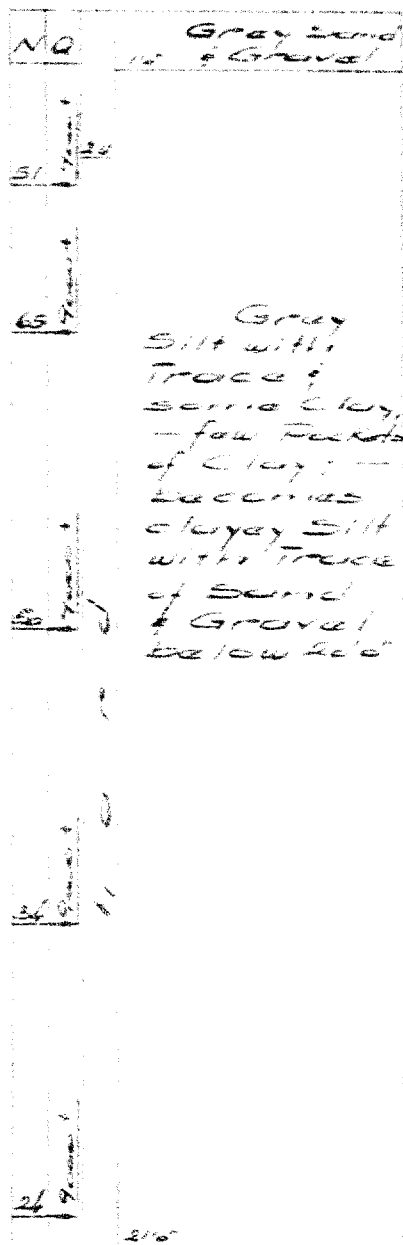


BORE HOLE LOCATIONS
ON SITE OF
PROPOSED BRIDGE
LOT 5/6 - CONC. 3
ALBION TOWNSHIP
COUNTY OF PEEL / ONTARIO

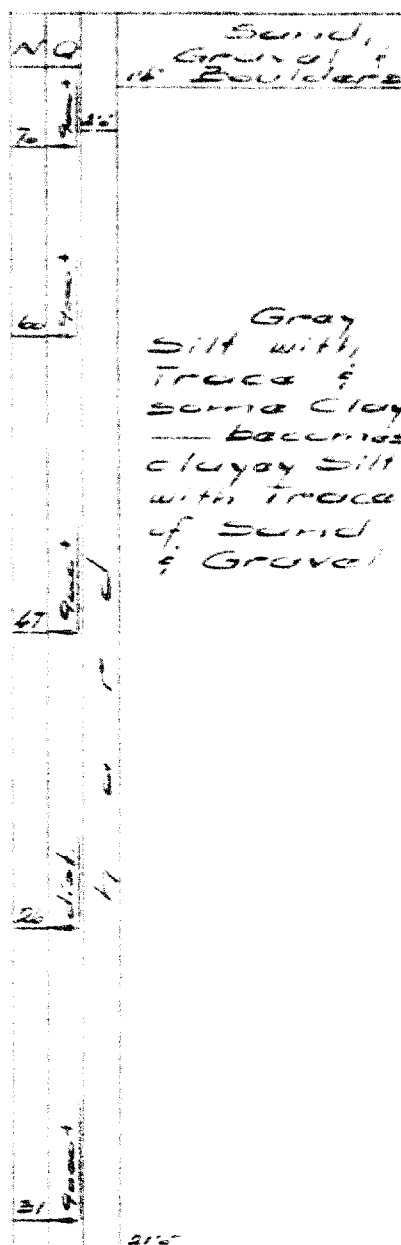
Prep. By

B.H. #1

ELEV. : 214.1

B.H. #2

ELEV. : 214.4

SECTIONSVERT. SCALE : 1" = 3'

#

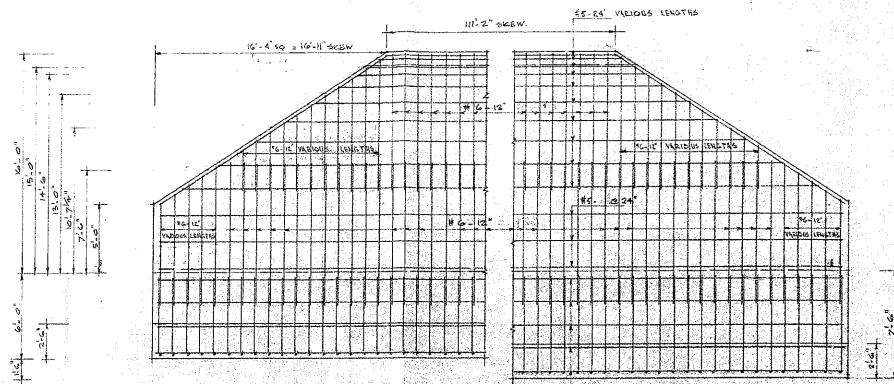
62-F-286 m

CULVERT

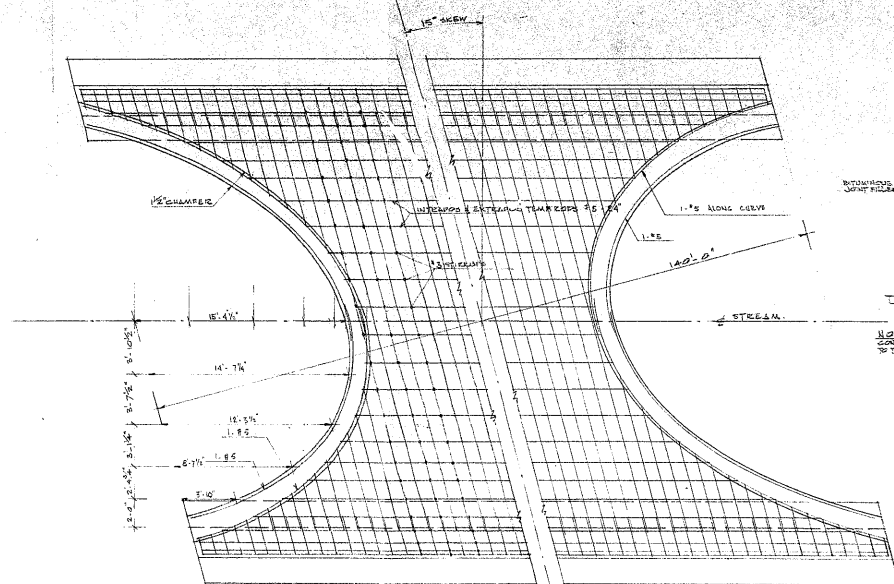
LOT 5/6 CON. 3

ALBION

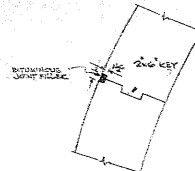
TWP.



ELEVATION



PLAN



TYPICAL CONSTRUCTION JOINT DETAIL
SCALE 3/4" = 1'-0"

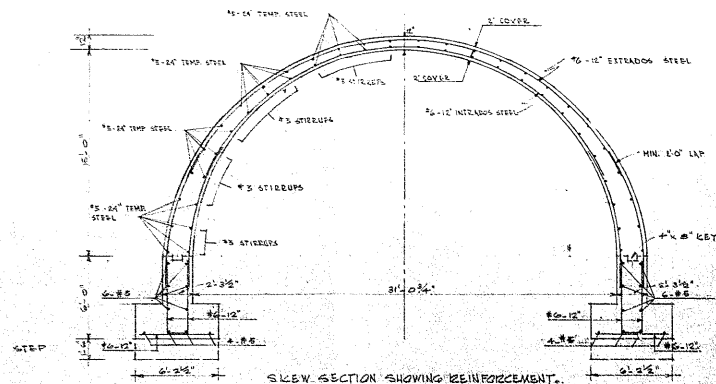
NOTE: CONSTRUCTION JOINTS TO BE LOCATED TO THE APPROACH OF THE BRIDGE.

NOTES

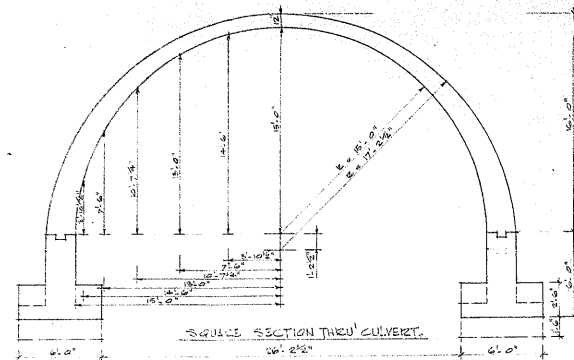
ALL EXPOSED CORNERS TO BE CHAMFERED 1/2". NO CONCRETE IS TO BE PLACED FOR ANY FOOTING UNTIL THE DEPTH OF EXCAVATION AND CHARACTER OF THE FOUNDATION MATERIAL HAVE BEEN APPROVED BY THE ENGINEER. ALL WORK TO BE MARKED AT BOTH SIDES OF THE CULVERT SIMULTANEOUSLY. EXCAVATIONS IN CHALK FOR FOOTING TO BE BACKFILLED WITH 1500 PSI CONCRETE. OUTSIDE NEAT LINE OF FOOTING. CONCRETE STRENGTH 1.5000 PSI & 2.50 DAYS FOR FOOTING. 3000 PSI & 28 DAYS FOR ARCH.

ALL REINFORCING STEEL TO BE A1. BOND HARD GRADE STEEL. WORK CULVERT TO BE RIVULED SEPARATELY AND MARKED WITH SIZE AND NUMBER.

CONCRETE REQUIRED: FOOTING - 108 CY
BARKED ARCH - 398 CY
WINGWALL FOOTING - 11 CY
WING WALLS - 15 CY
TOTAL = 522 CY

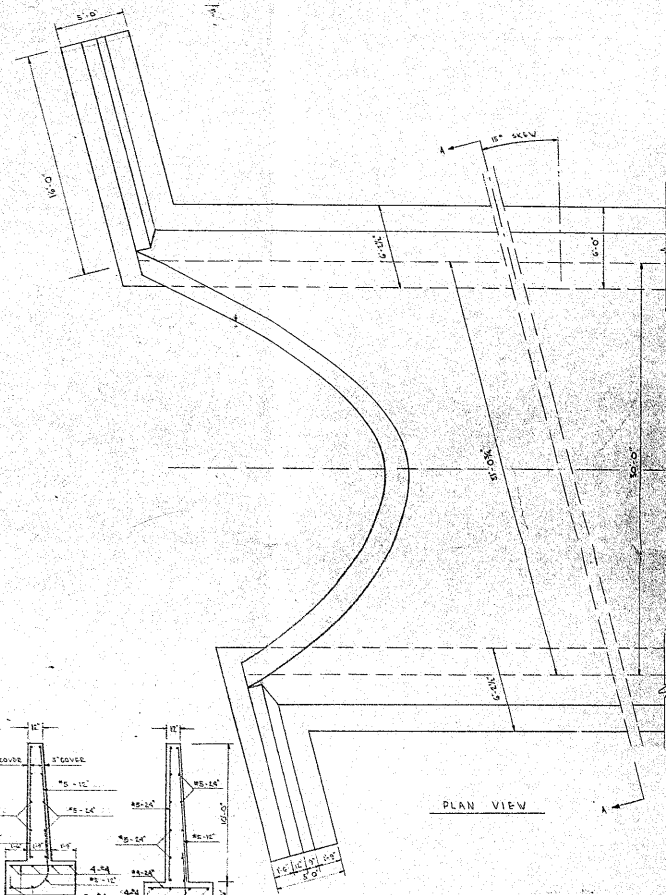
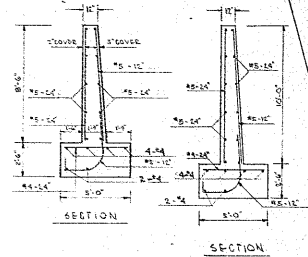
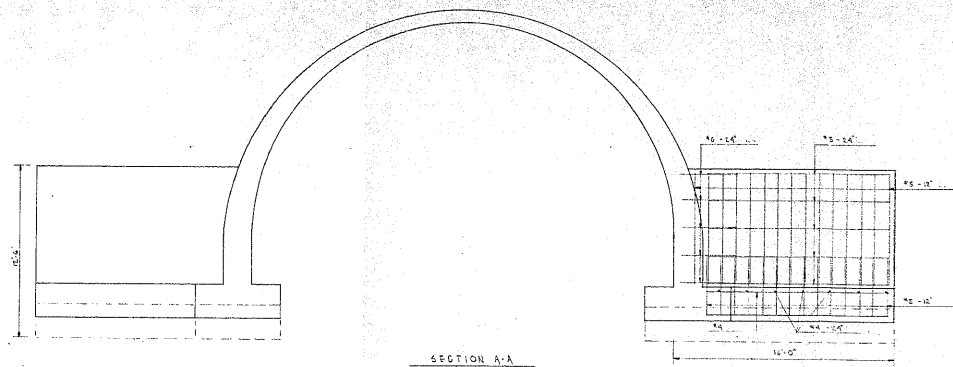
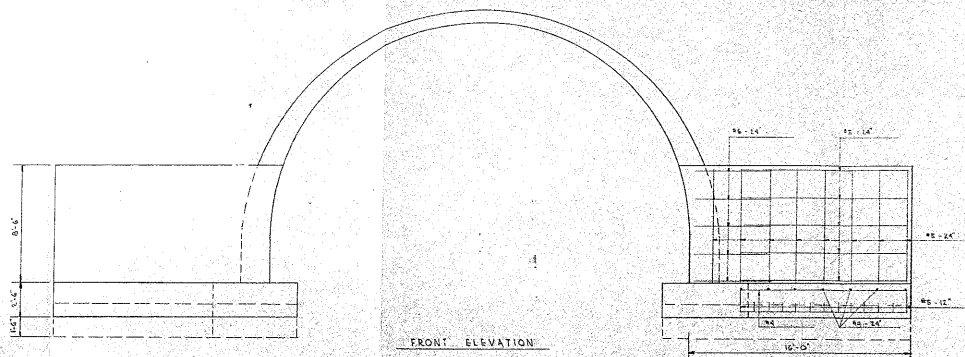


SKIEW SECTION SHOWING REINFORCEMENT



SQUARE SECTION THRU CULVERT

DATE	REVISIONS	BY
0.1.1	CONTRACTOR TO CHECK AND VERIFY ALL DIMENSIONS ON THE JOB AND REPORT ANY DISCREPANCIES TO ENGINEERS BEFORE PROCEEDING WITH THE WORK.	
REINFORCEMENT DETAILS.		
DESIGN BY	5" SKEW RP. BARKED ARCH.	DATE REC.
CHECKED BY	LOTS 5 & 6 CON. III	3
SCALE	TOWNSHIP OF ALBION	JUNE 2, 1952
DUNCAN HOPPER & ASSOCIATES LIMITED		
TORONTO CONSULTING ENGINEERS CANADA		



DATE	REVISIONS	BY
CONTRACTOR TO CHECK AND VERIFY ALL DIMENSIONS ON THE JOB AND REPORT ANY DISCREPANCIES TO ENGINEERS BEFORE PROCEEDING WITH THE WORK.		
RETAINING WALLS		
	DRAWN BY J.L.H. CHECKED BY J.L.H. DATE N-1-0	JOB No. 6138 PAGE No. 4 JOB TITLE 5TH PIPE ROW BARREL ARCH. LOT 5-6 CONG. 111 TOWNSHIP of ALBION DUNCAN HOPPER & ASSOCIATES LIMITED CONSULTING ENGINEERS TORONTO CANADA