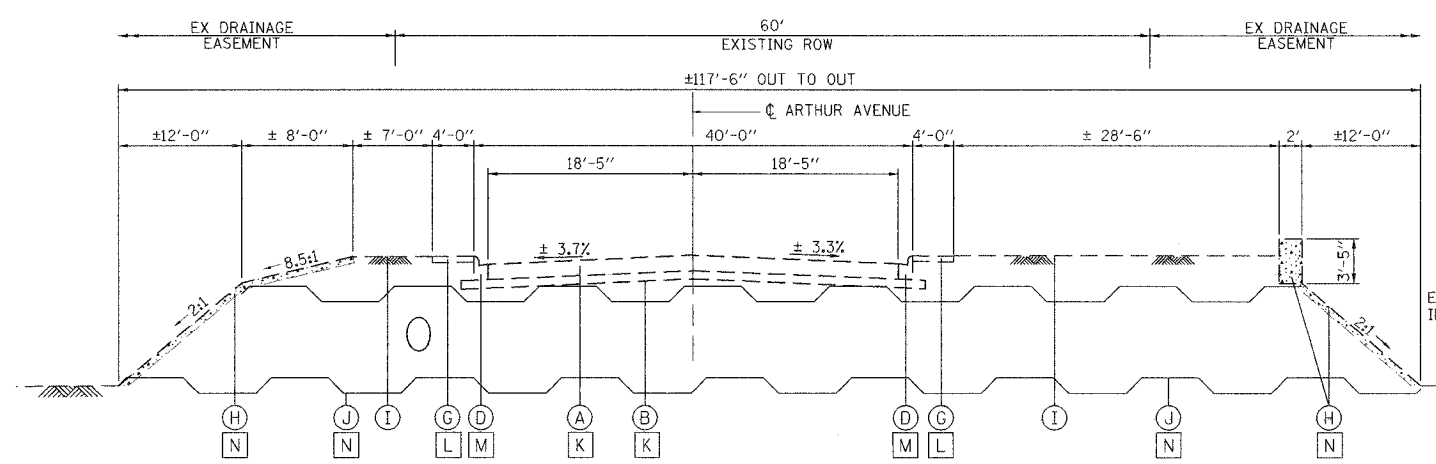
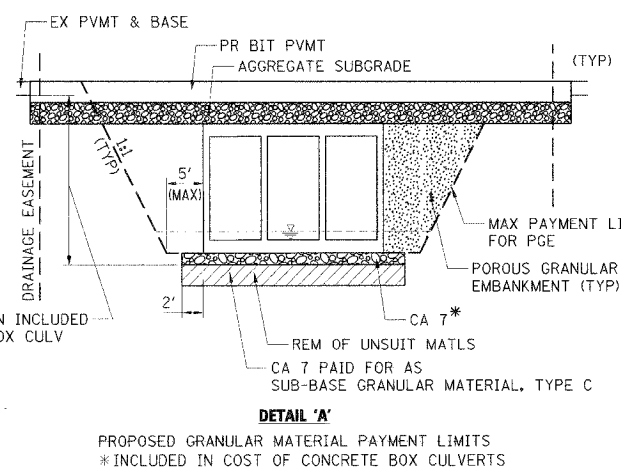


F.A.U. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
02-00048-00-BR	COOK	27	6	
STA.	TO STA.			
FED. ROAD DIST. NO.		ILLINOIS FED. AID PROJECT		
CONTRACT NO. 83779				



EXISTING TYPICAL SECTION
ARTHUR AVENUE
STA 57+70 TO STA 58+30



DETAIL 'A'
PROPOSED GRANULAR MATERIAL PAYMENT LIMITS
*INCLUDED IN COST OF CONCRETE BOX CULVERTS

EXISTING LEGEND

- (A) BITUMINOUS CONCRETE PAVEMENT
- (B) AGGREGATE SUB-BASE
- (C) COMBINATION CONCRETE CURB & GUTTER, TYPE B-6.12
- (D) COMBINATION CONCRETE CURB & GUTTER, TYPE M-6.12
- (E) COMBINATION CONCRETE CURB & GUTTER, TYPE B-6.24
- (F) LANDSCAPED MEDIAN
- (G) PORTLAND CEMENT CONCRETE SIDEWALK
- (H) CONCRETE SLOPE WALL / HEADWALL
- (I) EXISTING GROUND
- (J) CORRUGATED METAL PIPE CULVERTS
- (K) PAVEMENT REMOVAL
- (L) SIDEWALK REMOVAL
- (M) COMBINATION CURB AND GUTTER REMOVAL
- (N) REMOVAL OF EXISTING STRUCTURES

EARTHWORK SUMMARY

LOCATION	EARTH EXCAVATION (CUBIC YARDS)	UNSUITABLE OR UNSTABLE MATERIAL (CUBIC YARDS)	EMBANKMENT (CUBIC YARDS)	EARTHWORK BALANCE WASTE (+) OR SHORTAGE (-) (CUBIC YARDS)
ARTHUR AVE (STA 57+70 TO STA 58+30)	1,600	100	170	+1,100
PRATT BLVD (STA 37+70 TO STA 38+32)	2,100	100	310	+1,390
LUNT AVE (STA 17+70 TO STA 18+30)	1,100	100	110	+740
SUBTOTAL	4,800	300	590	+3,230

NOTES

- EARTH EXCAVATION AND EMBANKMENT VALUES ARE ESTIMATED FOR BIDDING PURPOSES ONLY. THESE ITEMS ARE INCLUDED IN THE COST OF CONCRETE BOX CULVERTS. EARTH EXCAVATION IN THE ABOVE TABLE INCLUDES UNSUITABLE REMOVAL. A 15% SHRINKAGE FACTOR WAS ASSUMED.
- A QUANTITY OF 300 CUBIC YARDS OF SUB-BASE GRANULAR MATERIAL, TYPE C AND REMOVAL AND DISPOSAL OF UNSUITABLE MATERIAL HAVE BEEN PROVIDED FOR LOCATIONS WHERE SOILS TEND TO BE UNSTABLE WHEN WET. THE ACTUAL NEED FOR REMOVAL AND REPLACEMENT WILL BE DETERMINED IN THE FIELD AT THE TIME OF CONSTRUCTION BY THE ENGINEER (BY USE OF A CONE PENETROMETER IN CONJUNCTION WITH IDOT SUBGRADE STABILITY MANUAL). IF UNSTABLE OR UNSUITABLE MATERIALS ARE NOT ENCOUNTERED, THEN THE QUANTITY SHALL BE DEDUCTED AND NO ADDITIONAL COMPENSATION WILL BE DUE THE CONTRACTOR.

PAVEMENT DESIGN

ITEM	ARTHUR AVE	PRATT BLVD	LUNT AVE
STRUCTURAL DESIGN TRAFFIC (2015):	3,060	7,670	2,560
ROAD CLASSIFICATION:	II	I	II
PASSENGER CARS:	2,290	5,750	1,920
SINGLE UNITS:	385	960	320
MULTIPLE UNITS:	385	960	320
PERCENT PASSENGER CARS IN DESIGN LANE:	50%	32%	50%
PERCENT SINGLE UNITS IN DESIGN LANE:	50%	45%	50%
PERCENT MULTIPLE UNITS IN DESIGN LANE:	50%	45%	50%
TRAFFIC FACTOR:	0.95	2.38	0.79
MINIMUM TRAFFIC FACTOR:	0.5	0.5	0.5
SUBGRADE SUPPORT RATING	POOR	POOR	POOR
ASPHALT CEMENT GRADE	PG-64	PG-64	PG-64
EAC (KSI)	630	630	630
AC STRAIN (MICROSTRAIN)	110	80	115
COMPUTED THICKNESS (INCHES):	2+2.25+5.25+12	2+2.25+7.25+12	2+2.25+5+12
DESIGN THICKNESS (INCHES):	2+2.25+8+12	2+2.25+8+12	2+2.25+8+12
THICKNESS = (BIT SURF + BIT BIND + BIT BASE+ AGG SUBGRADE)			

MIXTURE REQUIREMENT

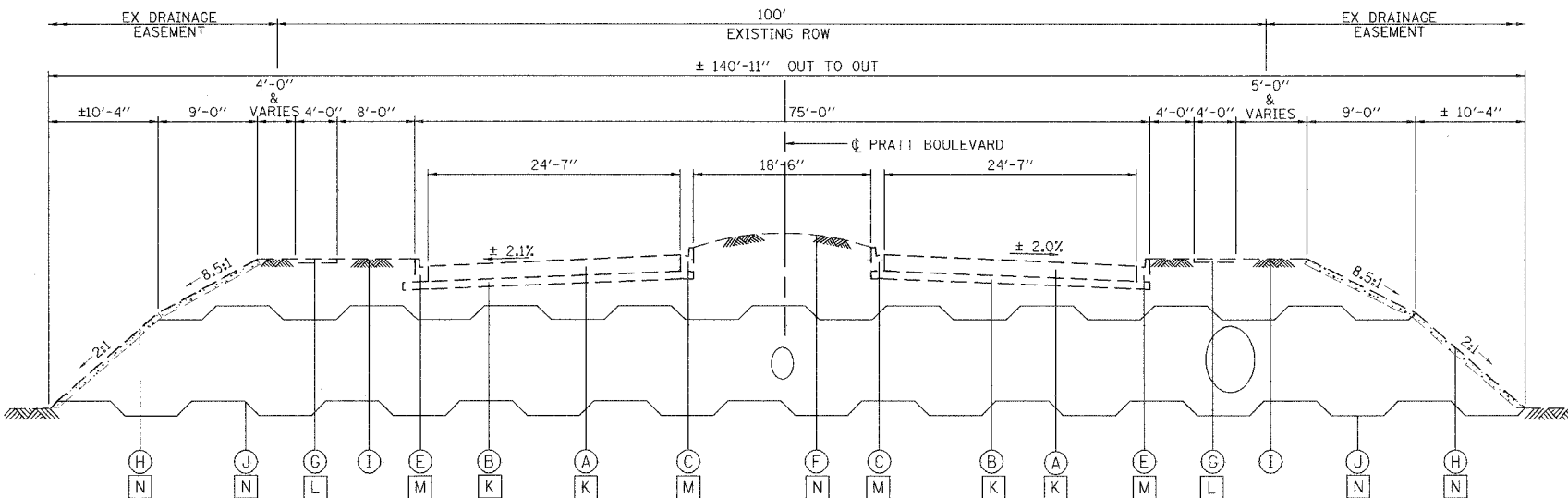
ITEM	AC/PG	AIR VOIDS (%)	RAP % (MAX)
BITUMINOUS CONCRETE SURFACE COURSE, SUPERPAVE, MIX "C", N50	PG 64-22	4% AT 50 GYRATIONS	15
BITUMINOUS CONCRETE SURFACE COURSE, SUPERPAVE, MIX "D", N50	PG 64-22	4% AT 50 GYRATIONS	15
BITUMINOUS CONCRETE BINDER COURSE, SUPERPAVE, IL-19.0, N50	PG 64-22	4% AT 50 GYRATIONS	25
BITUMINOUS BASE COURSE SUPERPAVE	PG 58-22	2% AT 50 GYRATIONS	50

REVISIONS	
NAME	DATE

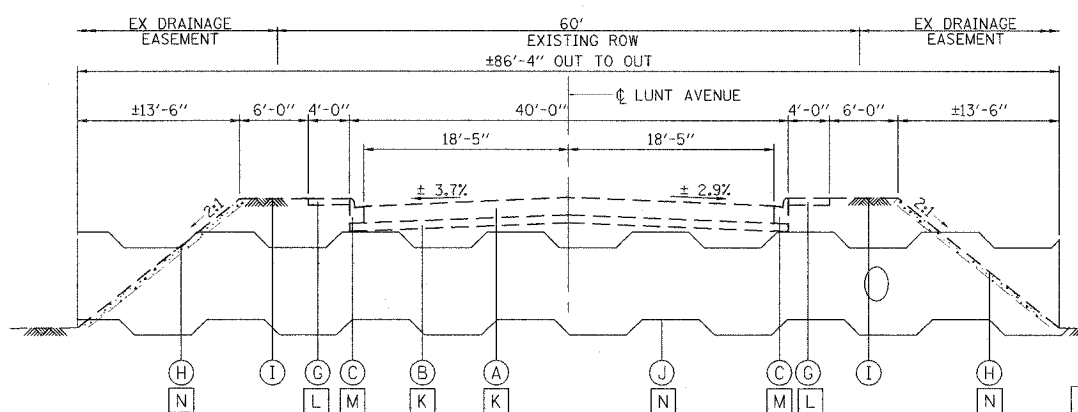
EXISTING TYPICAL SECTIONS

WILLOW CREEK CULVERTS
ARTHUR AVENUE, PRATT BOULEVARD
AND LUNT AVENUE

NO SCALE
DATE 11-01-04
DRAWN BY LAS
CHECKED BY SDC



EXISTING TYPICAL SECTION
PRATT BOULEVARD
STA 37+70 TO STA 38+32



EXISTING TYPICAL SECTION
LUNT AVENUE
STA 17+70 TO STA 18+30

11/02/2004 02:49:00 PM
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