

CALCULATIONS

CALC. BY: JJB
DATE: 6/92
CHKD: SJS
DATE: 6/92

LAKE COUNTY
LAK-20-15.75

OHIO
FHWA REGION 5

12
80

ITEM 305 9" CONCRETE BASE

A.	STA 524+90 TO STA 527+22.27	680.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	75.56 SQ.YD.
B.	STA 527+22.27 TO STA 527+71.51 (2.75 FT. x 65.92 FT.) + (1.5 FT. x 32.56 FT.)		/	9 SQ.FT./SQ.YD.	=	25.57 SQ.YD.
C.	STA 527+71.51 TO STA 533+64.89	8.00 FT. x 593.38 FT.	/	9 SQ.FT./SQ.YD.	=	527.45 SQ.YD.
D.	STA 533+64.89 TO STA 535+36.30	1916.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	212.89 SQ.YD.
E.	STA 535+36.30 TO STA 536+15.89	8.00 FT. x 79.59 FT.	/	9 SQ.FT./SQ.YD.	=	70.75 SQ.YD.
F.	STA 536+15.89 TO STA 536+86.41	680.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	75.56 SQ.YD.
G.	STA 536+86.41 TO STA 541+17	8.00 FT. x 430.59 FT.	/	9 SQ.FT./SQ.YD.	=	382.75 SQ.YD.
H.	STA 541+17 TO STA 542+34, LT	4.00 FT. x 117.00 FT.	/	9 SQ.FT./SQ.YD.	=	52.00 SQ.YD.
I.	STA 541+17 TO STA 542+34, RT	8.00 FT. x 117.00 FT.	/	9 SQ.FT./SQ.YD.	=	104.00 SQ.YD.
J.	STA 542+34 TO STA 546+31.44	8.00 FT. x 397.44 FT.	/	9 SQ.FT./SQ.YD.	=	353.28 SQ.YD.
K.	STA 546+31.44 TO STA 548+32.75	1711.14 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	190.13 SQ.YD.
L.	STA 548+32.75 TO STA 551+92.08	8.50 FT. x 359.33 FT.	/	9 SQ.FT./SQ.YD.	=	339.37 SQ.YD.
M.	STA 551+92.08 TO STA 554+10.22	1854.19 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	206.02 SQ.YD.
N.	STA 554+10.22 TO STA 555+01	8.00 FT. x 90.8 FT.	/	9 SQ.FT./SQ.YD.	=	80.70 SQ.YD.
O.	STA 555+01 TO STA 556+51	5.50 FT. x 150.0 FT.	/	9 SQ.FT./SQ.YD.	=	91.67 SQ.YD.
P.	STA 556+51 TO STA 557+37.74	320.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	35.56 SQ.YD.
Q.	STA 559+35.44 TO STA 559+98.44	256.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	28.45 SQ.YD.
R.	STA 570+92.64 TO STA 571+73	120.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	13.34 SQ.YD.
S.	STA 582+54.05 TO STA 583+25.05	272.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	30.23 SQ.YD.
T.	STA 586+04.54 TO STA 586+74.54	272.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	30.23 SQ.YD.
U.	STA 593+06.09 TO STA 593+52.10	172.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	19.12 SQ.YD.
V.	STA 594+56.38 TO STA 595+98.23	328.0 SQ.FT.	/	9 SQ.FT./SQ.YD.	=	36.45 SQ.YD.
					SUBTOTAL	= 2981.08 SQ.YD.
					TOTAL OF ITEM 305 9" CONCRETE BASE	= 2982 SQ.YD.

ITEM 310 6" SUBBASE, TYPE 1, GRADING A, AS PER PLAN

A.	STA 524+90 TO STA 527+22.27	760.8 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	14.09 CU.YD.
B.	STA 527+22.27 TO STA 527+71.51 (3.25 FT. x 65.92 FT.) + (2 FT. x 32.56 FT.)		x	0.5 FT. / 27 CU.FT./CU.YD.	=	5.18 CU.YD.
C.	STA 527+71.51 TO STA 533+64.89	9.0 FT. x 593.38 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	98.90 CU.YD.
D.	STA 533+64.89 TO STA 535+36.30	1542.69 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	28.57 CU.YD.
E.	STA 535+36.30 TO STA 536+15.89	9.0 FT. x 79.59 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	13.27 CU.YD.
F.	STA 536+15.89 TO STA 536+86.41	634.68 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	11.76 CU.YD.
G.	STA 536+86.41 TO STA 541+17	9.0 FT. x 430.59 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	71.77 CU.YD.
H.	STA 541+17 TO STA 542+34, LT	4.5 FT. x 117.00 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	9.75 CU.YD.
I.	STA 541+17 TO STA 542+34, RT	9 FT. x 117.00 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	19.50 CU.YD.
J.	STA 542+34 TO STA 546+31.44	9.0 FT. x 397.44 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	66.24 CU.YD.
K.	STA 546+31.44 TO STA 548+32.75	1912.45 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	35.41 CU.YD.

L.	STA 548+32.75 TO STA 551+92.08	9.5 FT. x 359.33 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	63.22 CU.YD.
M.	STA 551+92.08 TO STA 554+10.22	1963.26 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	36.35 CU.YD.
N.	STA 554+10.22 TO STA 555+01	9.0 FT. x 90.78 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	15.13 CU.YD.
O.	STA 555+01 TO STA 556+51	6.5 FT. x 150 FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	18.06 CU.YD.
P.	STA 556+51 TO STA 557+37.74	359.3 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	6.66 CU.YD.
Q.	STA 559+35.44 TO STA 559+98.44	287.4 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	5.33 CU.YD.
R.	STA 570+92.64 TO STA 571+73	140.6 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	2.61 CU.YD.
S.	STA 582+54.05 TO STA 583+25.05	311.3 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	5.77 CU.YD.
T.	STA 586+04.54 TO STA 586+74.54	311.3 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	5.77 CU.YD.
U.	STA 593+06.09 TO STA 593+52.10	195.6 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	3.63 CU.YD.
V.	STA 594+56.38 TO STA 595+98.23	386.1 SQ.FT.	x	0.5 FT. / 27 CU.FT./CU.YD.	=	7.15 CU.YD.
					SUBTOTAL	= 544.11 CU.YD.
					TOTAL OF ITEM 310 6" SUBBASE, TYPE 1, GRADING A, AS PER PLAN	= 545 CU.YD.

ITEM 402 VARIABLE DEPTH (2 1/4" MIN.) ASPHALT CONCRETE, AC-20

A.	STA 524+90 TO STA 527+22.27	680.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	8.39 CU.YD.
B.	STA 527+22.27 TO STA 527+71.51 (2.75 FT. x 65.92 FT.) + (1.5 FT. x 32.56 FT.)		x	0.333 FT. / 27 CU.FT./CU.YD.	=	2.84 CU.YD.
C.	STA 527+71.51 TO STA 533+64.89	8.00 FT. x 593.38 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	58.55 CU.YD.
D.	STA 533+64.89 TO STA 535+36.30	1371.28 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	16.93 CU.YD.
E.	STA 535+36.30 TO STA 536+15.89	8.00 FT. x 79.59 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	7.86 CU.YD.
F.	STA 536+15.89 TO STA 536+86.41	564.12 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	6.96 CU.YD.
G.	STA 536+86.41 TO STA 541+17	8.00 FT. x 430.59 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	42.49 CU.YD.
H.	STA 541+17 TO STA 542+34, LT	4.00 FT. x 117.00 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	5.78 CU.YD.
I.	STA 542+34 TO STA 546+31.44	8.00 FT. x 397.44 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	39.22 CU.YD.
J.	STA 546+31.44 TO STA 548+32.75	1711.14 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	21.10 CU.YD.
K.	STA 548+32.75 TO STA 551+92.08	8.50 FT. x 359.33 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	37.67 CU.YD.
L.	STA 551+92.08 TO STA 554+10.22	1854.19 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	22.87 CU.YD.
M.	STA 554+10.22 TO STA 555+01	8.00 FT. x 90.78 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	8.96 CU.YD.
N.	STA 555+01 TO STA 556+51	5.50 FT. x 150.0 FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	10.18 CU.YD.
O.	STA 556+51 TO STA 557+37.74	320.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	3.95 CU.YD.
P.	STA 559+35.44 TO STA 559+98.44	256.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	3.16 CU.YD.
Q.	STA 570+92.64 TO STA 571+73	120.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	1.48 CU.YD.
R.	STA 582+54.05 TO STA 583+25.05	272.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	3.36 CU.YD.
S.	STA 586+04.54 TO STA 586+74.54	272.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	3.36 CU.YD.
T.	STA 593+06.09 TO STA 593+52.10	172.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	2.13 CU.YD.
U.	STA 594+56.38 TO STA 595+98.23	328.0 SQ.FT.	x	0.333 FT. / 27 CU.FT./CU.YD.	=	4.05 CU.YD.
					SUBTOTAL	= 311.28 CU.YD.
					TOTAL OF ITEM 402 - ASPHALT CONCRETE, AC-20	= 312 CU.YD.

ITEM 403 VARIABLE DEPTH (1/2" MIN.) ASPHALT CONCRETE, AC - 20

A.	STA 524+90 TO STA 527+22.27	9523.07 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	33.08 CU.YD.
B.	STA 527+22.27 TO STA 527+71.51	1797.26 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	6.24 CU.YD.
C.	STA 527+71.51 TO STA 533+64.89	28.0 FT. x 593.38 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	57.73 CU.YD.
D.	STA 533+64.89 TO STA 535+36.30	5313.71 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	18.46 CU.YD.
E.	STA 535+36.30 TO STA 536+15.89	28.0 FT. x 79.59 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	7.75 CU.YD.
F.	STA 536+15.89 TO STA 536+86.41	2186.12 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	7.59 CU.YD.
G.	STA 536+86.41 TO STA 541+17	28.0 FT. x 430.59 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	41.89 CU.YD.
H.	STA 541+17 TO STA 542+34	32.0 FT. x 117.00 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	13.01 CU.YD.
I.	STA 542+34 TO STA 546+31.44	28.0 FT. x 397.44 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	38.67 CU.YD.
J.	STA 546+31.44 TO STA 548+32.75	6190.28 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	21.51 CU.YD.
K.	STA 548+32.75 TO STA 551+92.08	27.5 FT. x 359.33 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	34.33 CU.YD.
L.	STA 551+92.08 TO STA 554+10.22	6718.71 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	23.34 CU.YD.
M.	STA 554+10.22 TO STA 555+01	28.0 FT. x 90.78 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	8.84 CU.YD.
N.	STA 555+01 TO STA 556+51	28.0 FT. x 150.0 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	14.60 CU.YD.
O.	STA 556+51 TO STA 556+64.74	31.0 FT. x 13.74 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	1.48 CU.YD.
P.	STA 556+64 TO STA 557+37.74	2285.94 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	7.94 CU.YD.
Q.	STA 557+37.74 TO STA 559+35.44	31.0 FT. x 197.7 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	21.30 CU.YD.
R.	STA 559+35.44 TO STA 559+98.44	1953.00 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	6.78 CU.YD.
S.	STA 559+98.44 TO STA 570+92.64	31.0 FT. x 1094.2 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	117.85 CU.YD.
T.	STA 570+92.64 TO STA 571+73	2491.16 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	8.65 CU.YD.
U.	STA 571+73 TO STA 572+01.97	31.0 FT. x 28.97 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	3.12 CU.YD.
V.	STA 572+05.01 TO STA 579+49.63	31.0 FT. x 744.62 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	80.20 CU.YD.
W.	STA 579+49.63 TO STA 581+49.09	35.25 FT. x 199.48 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	24.43 CU.YD.
X.	STA 581+51.79 TO STA 582+54.05	31.00 FT. x 102.26 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	11.01 CU.YD.
Y.	STA 582+54.05 TO STA 583+25.05	2201.00 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	7.64 CU.YD.
Z.	STA 583+25.05 TO STA 586+04.54	31.00 FT. x 279.49 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	30.10 CU.YD.
AA.	STA 586+04.54 TO STA 586+74.54	2170.00 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	7.53 CU.YD.
AB.	STA 586+74.54 TO STA 593+06.09	31.0 FT. x 631.55 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	68.02 CU.YD.
AC.	STA 593+06.09 TO STA 593+52.10	1426.31 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	4.96 CU.YD.
AD.	STA 593+52.1 TO STA 594+56.38	31.0 FT. x 104.28 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	11.24 CU.YD.
AE.	STA 594+56.38 TO STA 595+98.23	4397.35 SQ.FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	15.28 CU.YD.
AF.	STA 595+98.23 TO STA 597+64.98	25.0 FT. x 166.75 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	14.49 CU.YD.
AG.	STA 597+64.98 TO STA 598+13.55	26.5 FT. x 48.57 FT.	x	0.0938 FT. / 27 CU.FT./CU.YD.	=	4.48 CU.YD.
					SUBTOTAL	= 773.54 CU.YD.
					TOTAL OF ITEM 403 - ASPHALT CONCRETE, AC-20	= 774 CU.YD.

CALCULATIONS