COMPUTED BY:	JMH	DATE:	6-30-16
CHECKED BY:	PJJ	DATE:	6-30-16

PROJECT REFERENCE NO.	SHEET NO.
R-3100A	3B-3

DIVISION OF HIGHWAYS
STATE OF NORTH CAROLINA

GUARDRAIL SUMMARY

"N" = DISTANCE FROM EDGE OF LANE TO FACE OF GUARDRAIL
TOTAL SHOULDER WIDTH = DISTANCE FROM EDGE OF TRAVEL LANE TO SHOULDER BREAK POINT.
FLARE LENGTH = DISTANCE FROM LAST SECTION OF PARALLEL GUARDRAIL TO END OF GUARDRAIL
W = TOTAL WIDTH OF FLARE FROM BEGINNING OF TAPER TO END OF GUARDRAIL

G = GATING IMPACT ATTENUATOR TYPE 350
NG = NON-GATING IMPACT ATTENUATOR TYPE 350

SURVEY LINE	BEG. STA.	END STA.	LOCATION	LENGTH			WARRANT POINT		"N" DIST. FROM E.O.L.	TOTAL SHOUL WIDTH	FLARE LENGTH		W		ANCHORS									IMPACT ATTENUATOR TYPE 350		SINGLE FACED CONCRETE BARRIER	REMOVE EXISTING GUARDRAIL	REMOVE & STOCKPILE EXISTING GUARDRAIL	REMARKS
				STRAIGHT	SHOP CURVED	DOUBLE FACED	APPROACH END	TRAILING END			APPROACH END	TRAILING END	APPROACH END	TRAILING END	XI MOD	XI	GRAU 350	M-350	XIII	CAT-1	AT-1	TES		G	NG				
-L-	28+25.00	35+62.50	RT	737.50			29+50.00	35+25.00	8	11	1	1	50	50			2												EXTEND TO KEEP SBG OFF ANCHOR UNIT USE GRAU-350 ON TRAILING END FOR TMP
-L-	29+18.75	34+25.00	LT	506.25			32+50.00	29+25.00	8	11	1		50				1			1									
-L-	44+62.50	49+37.50	RT	475.00			44+30.00	49+25.00	8	11	1	1	50	50			2												BREAK FOR DRIVE (APPROACH) USE GRAU-350 ON TRAILING END FOR TMP
-L-	46+68.75	49+79.00	LT	281.25	25.00		48+44.00	46+75.00	8	11	1		50				1			1									BREAK FOR U-TURN BULB (APPROACH)
-L-	109+18.75	116+25.00	LT	706.25			115+00.00	109+25.00	8	11	1		50				1			1									
-L-	130+68.75	134+25.00	LT	356.25			133+00.00	130+75.00	8	11	1		50				1			1									
-L-	163+25.00	165+81.25	RT	256.25			165+00.00	165+80.00	8	11	1		50				1			1									BREAK FOR DRIVE (APPROACH & TRAIL)
-L-	164+37.50	169+25.00	LT	487.50			168+00.00	164+75.00	8	11	1	1	50	50			2												USE GRAU-350 ON TRAILING END FOR TMP
-L-	167+00.00	169+31.25	RT	231.25			166+50.00	169+25.00	8	11	1		50				1			1									BREAK FOR DRIVE (APPROACH)
-L-	217+87.50	223+75.00	LT	587.50			222+50.00	217+75.00	8	11	1	1	50	50			2												BREAK FOR DRIVE (TRAIL) USE GRAU-350 ON TRAILING END FOR TMP
-L-	227+02.50	230+90.00	LT	381.25	12.50		231+00.00	227+25.00	8	11			50				1				1								BREAK FOR DRIVE (APPROACH) USE GRAU-350 ON TRAILING END FOR TMP
-L-	229+37.50	234+75.00	RT	537.50			228+86.00	234+75.00	8	11	1		50	50			2												BREAK FOR DRIVE (APPROACH)
-L-	231+36.75	234+16.00	LT	262.50	37.50		233+50.00	231+00.00	8	11											2								BREAK FOR DRIVE (APPROACH & TRAIL) USE AT-1 ON TRAILING END FOR TMP
-L1-	10+93.75	15+25.00	LT	431.25			14+05.00	11+20.00	8	11	1		50				1			1									
-L1-	14+94.00	-	DEADEND	25.00																		2							
SUBTOTAL:				6262.50	75.00												18			7	3	2							
ANCHOR UNIT DEDUCTIONS:																													
18 GRAU-350 @ 50' EACH				-900.00																									
7 CAT-1 @ 6.25 EACH				-43.75																									
3 AT-1 @ 6.25 EACH				-18.75																									
LESS GUARDRAIL DEDUCTIONS:				5300.00	75.00												18			7	3	2							
R-3100A TOTAL:				5300.00	75.00												18			7	3	2							
R-3100A SAY				5300	75		ADDITIONAL GUARDRAIL POST		10		R-3100A ANCHORS OR ATTENUATORS (EA)						18			7	3	2							
R-3100B SAY				4200	150		ADDITIONAL GUARDRAIL POST		10		R-3100B ANCHORS OR ATTENUATORS (EA)						15			16	2						500		
GRAND TOTAL				9500	225		ADDITIONAL GUARDRAIL POST		20		GRAND TOTAL ANCHORS OR ATTENUATORS (EA)						33			23	5	2					500		