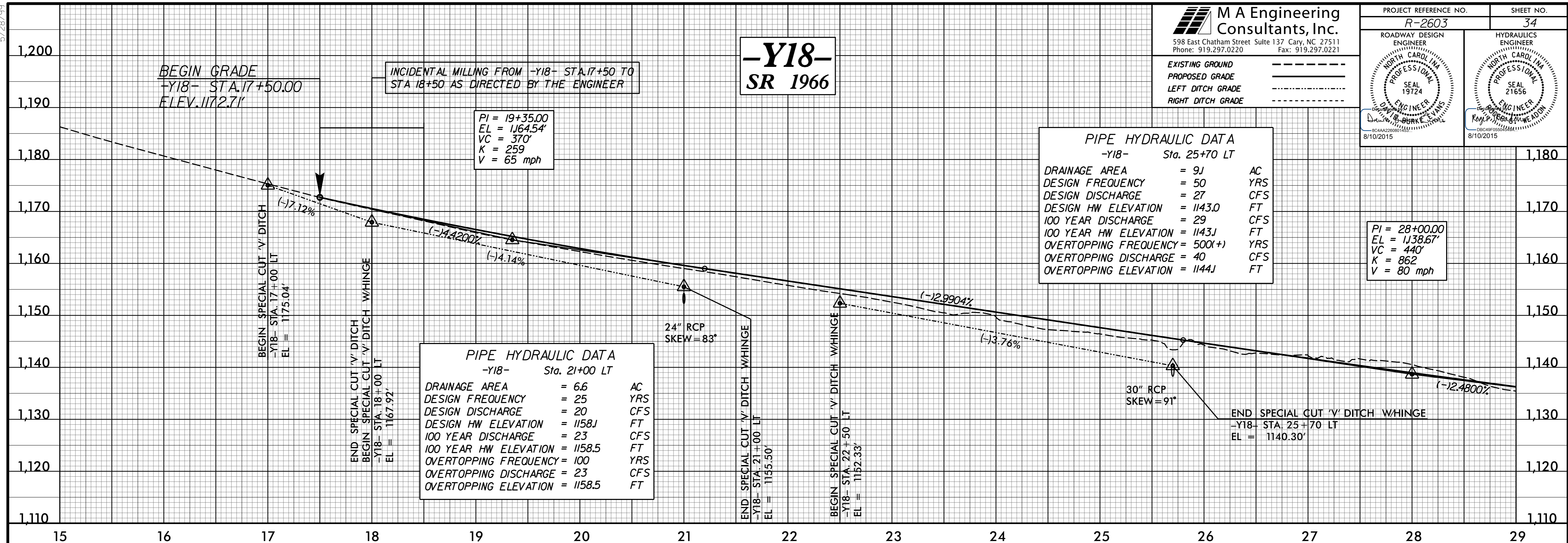


5/28/99

**M A Engineering Consultants, Inc.**  
 598 East Chatham Street Suite 137 Cary, NC 27511  
 Phone: 919.297.0220 Fax: 919.297.0221

EXISTING GROUND -----  
 PROPOSED GRADE -----  
 LEFT DITCH GRADE -----  
 RIGHT DITCH GRADE -----

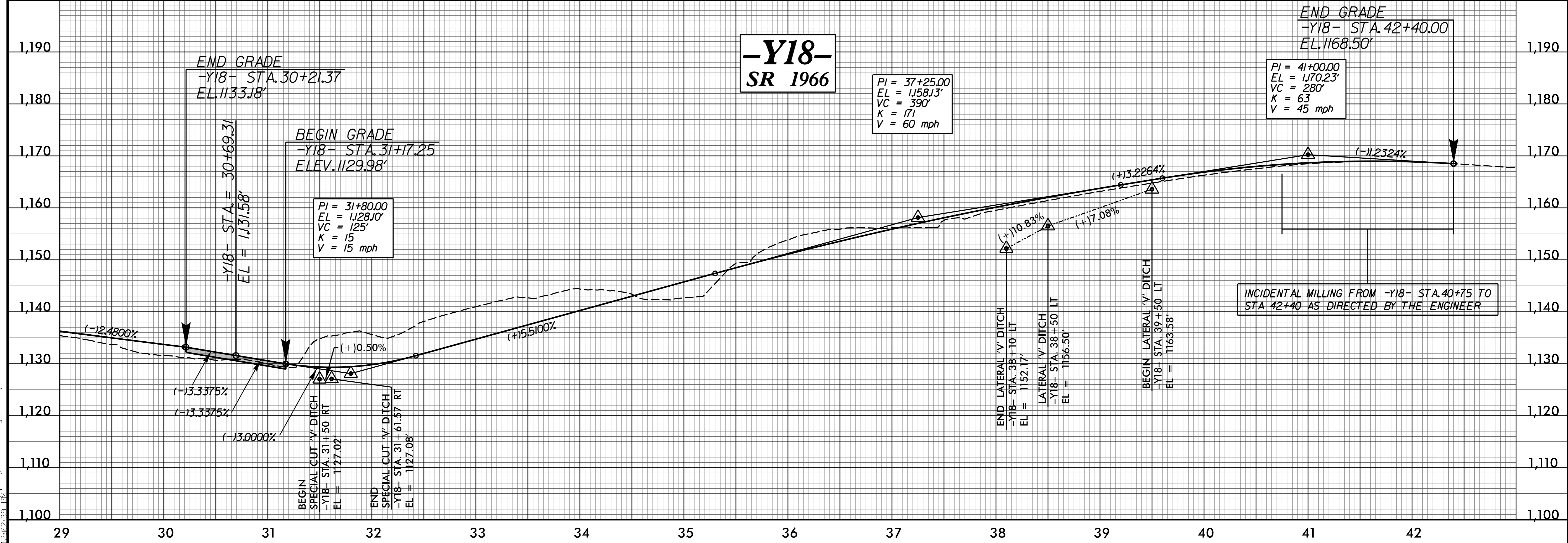
PROJECT REFERENCE NO. <b>R-2603</b>	SHEET NO. <b>34</b>
ROADWAY DESIGN ENGINEER  <b>DAVID B. BURKE, E.I.T.</b>	HYDRAULICS ENGINEER  <b>ROY P. HEGGA, P.E.</b>



**PIPE HYDRAULIC DATA**  
 -Y18- Sta. 25+70 LT

DRAINAGE AREA	= 9J	AC
DESIGN FREQUENCY	= 50	YRS
DESIGN DISCHARGE	= 27	CFS
DESIGN HW ELEVATION	= 1143.0	FT
100 YEAR DISCHARGE	= 29	CFS
100 YEAR HW ELEVATION	= 1143J	FT
OVERTOPPING FREQUENCY	= 500(+)	YRS
OVERTOPPING DISCHARGE	= 40	CFS
OVERTOPPING ELEVATION	= 1144J	FT

PI = 28+00.00  
 EL = 1138.67'  
 VC = 440'  
 K = 862  
 V = 80 mph



T:\2\2015\150933\proj\150933.dwg