

(23) All maps are to be made with the North pointing to top of map and the West towards the left and as nearly as possible, but keep the general direction of line as near center of roll as possible, thereby avoiding some breaks, but always breaking the line where necessary to keep at least 3 inches from the edge of the 36" roll.

(24) Projected location is to be kept worked up as fast as preliminary will permit, and from contours take off and plot with care a profile, on which lay the grade, showing all openings and the alignment, and the whole inked in.

(25) Show each mile post 5280 feet apart. Unless otherwise instructed show mileage from zero.

(26) From the projected profile make a careful estimate of all quantities and the total yardage in each cut and fill. Include all ditches, sub-grades and back filling, according to "Manual for Resident Engineers", but do not plot the overhaul or distribution of quantities, as shown on the sample profile in this publication. Estimate overhaul approximately.

(27) The quantities in embankment should be considered and entered separately between bridge ends and the mouth of cut.

(28) Obtain E.M. quantities from Bill of Material shown on blue print of standard pile and trestle bridges, and quantities of all other structures in accordance with the adopted standards. Standards for structures must be followed throughout, and no special structure estimated on without instructions.

(29) In estimating gradation quantities, transverse slopes taken from topographical notes must be taken into consideration, to the end that quantities are sufficient of the work to be performed on construction, and make allowances for all probable side work.

(30) Classification must be fully considered and care taken that it is fully covered.

(31) The tracing of this profile will be made as rapidly as each ten miles is completed and forwarded, preferably with some weekly report to the office, titled in exactly the same manner as that described for other profiles.

(32) Show a summary of each mile as indicated on that profile. Transfer this summary on to a standard construction estimate sheet, using one line for each mile.

(33) Make a duplicate copy of estimate sheet for each 35 miles and forward one to the office, retaining the other.