

Animas Glacier Gravel application M-2011-028

The inadequacies I've found are:

1. Culvert analyses indicate reinforced concrete pipe (RCP) with headwalls are to be used. The drawings and text state corrugated metal pipe (CMP) is to be used and no reference is made to headwalls for the CMP. The analyses, text and drawings need to be consistent.
2. The times of concentration (TC) for the small basins contributing to the access road appear very large for the basin size and slope. I believe this is the result of using too long of an overland flow path length (200 ft) and too large of a Manning's coef. For the terrain (0.40 – woods with light underbrush). If the Applicant insists on using 0.40, then the length should be limited to between 50 and 100 feet. If the Applicant uses $n = 0.13$ for Range, then an overland flow path length of up to 150 might be acceptable. The TCs should be recalculated and used to recalculate the peak flows.

Hope this helps.

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