PROPOSED BLASTING PLAN

Hyak Wa. I 90

Company KLB Date Oct 8, 2010 Shot # SN5

Location of Blast STA 1343+50 – 1345+00 PRODUCTION (PRESPLIT PREV. SHOT)

Date of Blast Planned OCT 11 Time of Blast 6:00 Rock Type LAPILLI TOFF

Name of Blaster VIC BRONSON License Number U21291

Direction N Distance 150 Feet From I-90 WESTBOUND

# of Pre-Split Holes – Spacing – Depth – Slope – Charge WT – LF Drilled –

Holes 125 Burden 6' ft Spacing 6 ft Depth 12 Diameter 3" Stemming 6'

Holes___ Burden___ ft Spacing___ ft Depth___ Diameter___ Stemming___

Holes___ Burden___ ft Spacing___ ft Depth___ Diameter___ Stemming___

Rows___ Bench Height___ ft Yield___ cu/yds Subdrilling___

Type Stemming CRUSHED STONE Max Weight of Explosives per Delay 15

Explosives Type and Estimated Quantity's

Anfo 1875 lbs Primer's 3/4# lbs/ea Pre-Split Powder N/A lbs

Stick Powder Type 2x16 FORTEL Amount ? lbs

Stick Powder Type___ Amount___ lbs

Stick Powder Type___ Amount___ lbs

Hole to Hole Delay 25 MS Row to Row Delay 42 & 67 MS

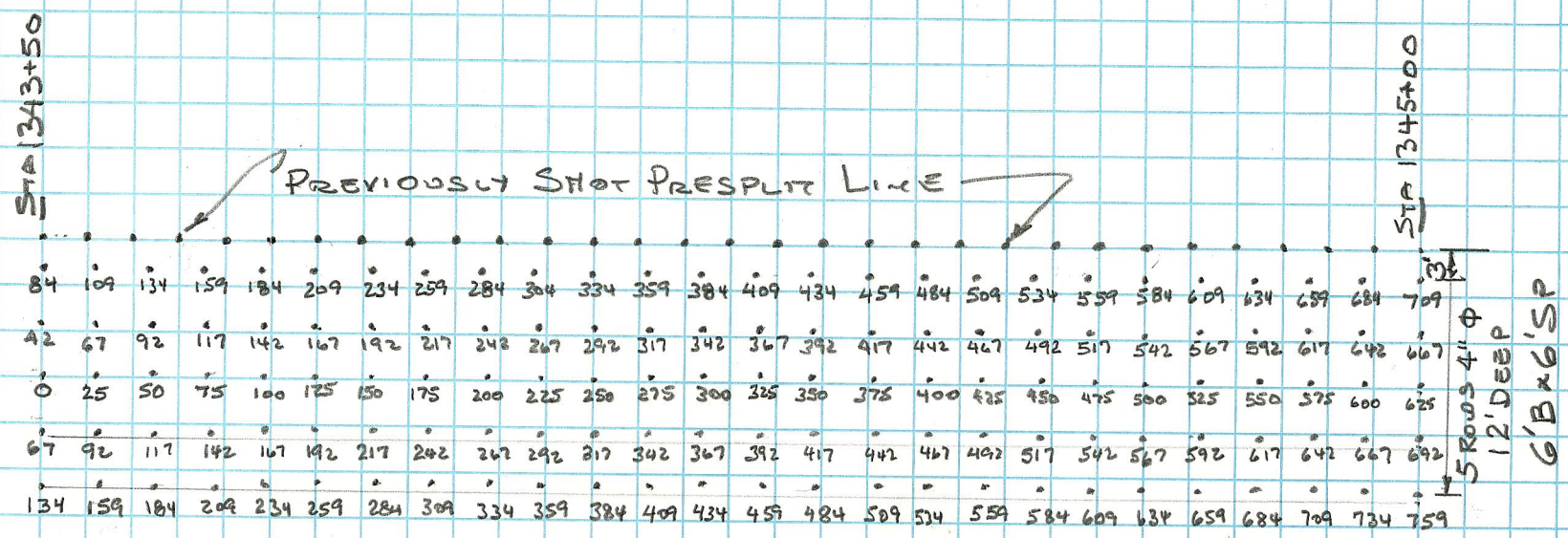
Total Weight of Explosives 1968 lbs Estimated Powder Factor .98 lbs cu/yd

Method of Initation NON ELEC Type of Detonator & Delay 25/500 HANDIDET

Notes: THIS BLAST WILL TAKE STA 1343+50 THRU 1345+00 TO TOP OF BENCH 1

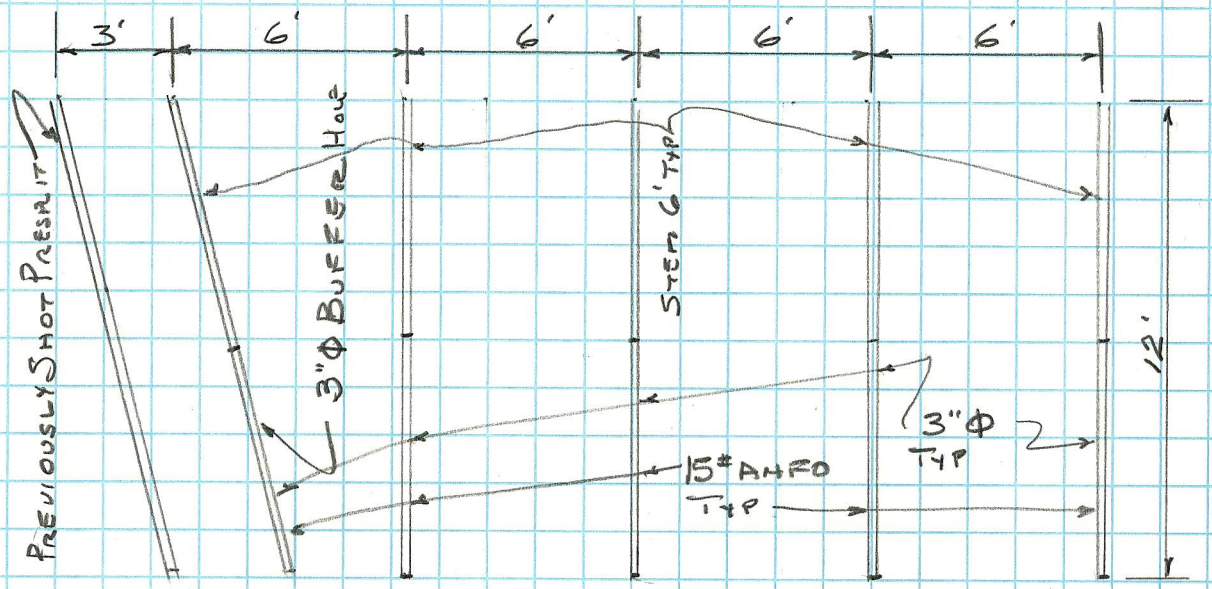
Plan Submitted By C. MURPHY Date OCT 8, 2010

Note: Production blast holes will only be fired if pre-split line is blasted in combination or prior to the blast for a distance of 30 feet at the beginning and end of production blasting.



PLAN VIEW BLAST SN5

SCALE 1" = 20'



SECTION AA

SCALE 1" = 5'