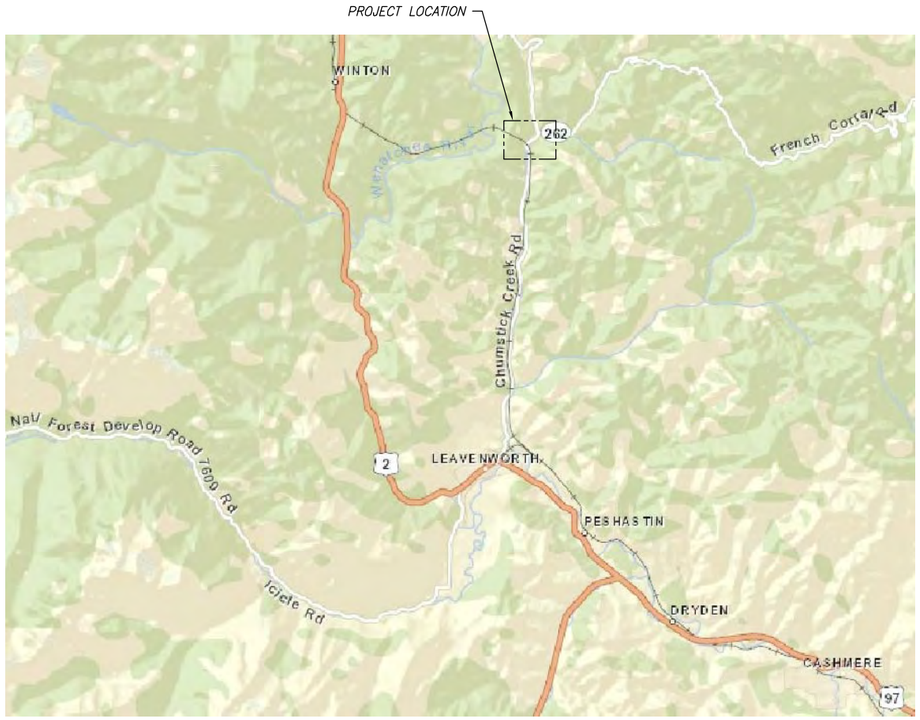

VICINITY MAP

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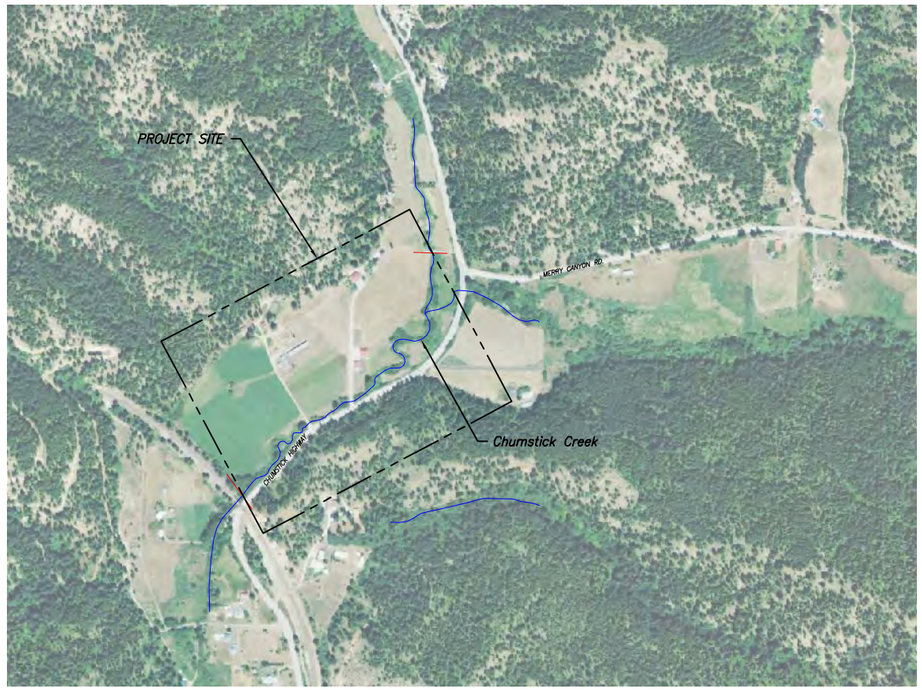
SCALE OF FEET



LOCATION MAP

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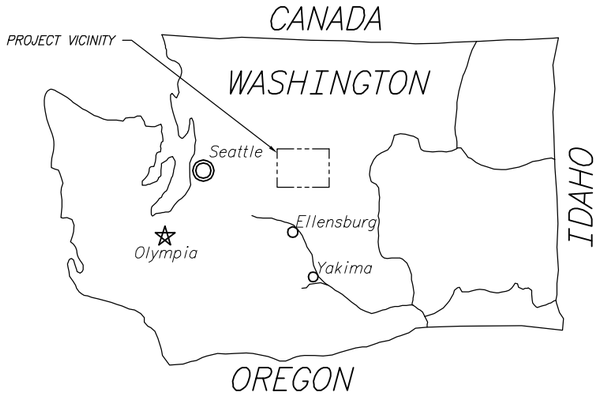
SCALE OF FEET



SUMMARY

T26N R18E

47°42'50" N 120°38'13"W

DRAWING LIST	
DRAWING NUMBER	DESCRIPTION
1678-100-1753	LOCATION MAP
1678-100-1754	GENERAL NOTES AND QUANTITIES
1678-100-1755	ACCESS AND STAGING
1678-100-1756	EXISTING CONDITIONS AND DEWATERING PLAN
1678-100-1757	BAUMANN BRIDGE DETAIL AND GRADING
1678-100-1758	BAUMANN SECTIONS
1678-100-1759	CANN BRIDGE DETAIL AND GRADING
1678-100-1760	CANN SECTIONS

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COLUMBIA/SNAKE RIVER SALMON RECOVERY PROGRAM

WENATCHEE SUBBASIN

UPPER CHUMSTICK BARRIERS PROJECT
BAUMANN AND CANN CULVERT REPLACEMENT PROJECT

REV. NO

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TECH. APPR. NAME, PROF. ABBR.
Steve Montague Acting Program Manager
ADMIN. APPROVAL NAME TITLE
BOISE, ID 2012-06-20

LOCATION MAP

1678-100-1753

SHEET 1 OF 8

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JUNE 22, 2012 11:06
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GENERAL NOTES

1. ALL COMPONENTS OF THE CONTRACT DOCUMENTS SHALL FULLY APPLY TO THE WORK WHETHER SPECIFICALLY REFERENCED IN THE DRAWINGS OR NOT. ANY ITEMS NOT SPECIFICALLY DISCUSSED IN NOTES ON SHEETS IN THE PLANS SHALL BE AS DESCRIBED IN THE STANDARD SPECIFICATIONS FOR ROADS, BRIDGES, AND MUNICIPAL CONSTRUCTION, 2012 PUBLISHED BY THE STATE OF WASHINGTON DEPARTMENT OF TRANSPORTATION.
2. STATIONING, DISTANCES, AND LENGTHS SHOWN ON THE DRAWINGS ARE BASED ON HORIZONTAL MEASUREMENTS ALONG THE STREAM CENTERLINE. CROSS SECTIONS, CROSSING DETAILS, AND REFERENCES TO LEFT (L) AND RIGHT (R) ON THE DRAWINGS ASSUME LOOKING IN THE DIRECTION OF INCREASING STATION ALONG STREAM CENTERLINE ALIGNMENT (FACING DOWNSTREAM).
3. ALL DIMENSIONS, INCLUDING, BUT NOT LIMITED TO, ELEVATIONS, STATIONS, AND DISTANCES ARE IN STANDARD ENGLISH UNITS.
4. ANY DISCREPANCIES FOUND BETWEEN THE DRAWINGS AND ACTUAL SITE CONDITIONS; OR ANY INCONSISTENCIES OR AMBIGUITIES BETWEEN THE DRAWINGS AND OTHER COMPONENTS OF THE CONTRACT DOCUMENTS SHALL BE IMMEDIATELY REPORTED IN WRITING TO THE ENGINEER. THE ENGINEER WILL PROMPTLY CORRECT INCONSISTENCIES OR AMBIGUITIES IN WRITING. WORK DONE BY THE CONTRACTOR INVOLVING SUCH DISCREPANCIES WITHOUT A WRITTEN REPORT AND RESPONSE FROM THE ENGINEER SHALL BE DONE AT THE CONTRACTOR'S SOLE RISK AND EXPENSE.
5. CONTRACTOR SHALL NOT DISTURB OR DESTROY ANY EXISTING SURVEY MONUMENTS OR BENCHMARKS. ANY BENCHMARKS DISTURBED OR DESTROYED BY THE CONTRACTOR SHALL BE REPLACED TO THE ENGINEER'S SATISFACTION AT THE CONTRACTOR'S SOLE EXPENSE.
6. EXISTING UTILITIES ARE NOT SHOWN ON THE DRAWINGS. UTILITY LOCATION AND PROTECTION IS THE RESPONSIBILITY OF THE CONTRACTOR. THE CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING THE EXACT TYPE, OWNER, LOCATION, AND ELEVATION OF ALL BURIED AND OVERHEAD UTILITIES. IT IS THE CONTRACTOR'S RESPONSIBILITY TO PERFORM THE WORK IN A SAFE MANNER AND IN ACCORDANCE WITH ANY REQUIREMENTS SET FORTH BY THE UTILITY OWNER AND APPLICABLE LAWS AND REGULATIONS.
7. CONTRACTOR IS ADVISED THAT NORTH ARROWS AND ORIENTATION OF PLAN VIEW SHEETS VARY TO ALLOW FOR LEFT–TO–RIGHT STATIONING AND STATIONING IN THE DIRECTION OF STREAM FLOW.
8. CONTRACTOR SHALL NOTIFY UTILITY OWNERS WITHIN THE LIMITS OF CONSTRUCTION A MINIMUM OF TWO WEEKS PRIOR TO EXCAVATION, OR OTHER CONSTRUCTION ACTIVITY THAT MAY IMPACT THE UTILITY. CONTRACTOR SHALL ALSO CONTACT CCNRD PRIOR TO ANY CONSTRUCTION ACTIVITY IN THE AREA. CONTRACTOR SHALL PROVIDE ACCESS TO UTILITY OWNERS FOR MAINTENANCE AND WORK ON THEIR UTILITIES DURING THE COURSE OF THE WORK.
9. CONTRACTOR SHALL ENSURE THAT OPERATION OF EXISTING IRRIGATION, SEWER, DRAINAGE, DOMESTIC WATER, AND OTHER UTILITY SYSTEMS ARE CONTINUOUS DURING CONSTRUCTION.
10. RELOCATIONS AND/OR REPLACEMENTS OF EXISTING UTILITIES SHALL BE COORDINATED BY THE CONTRACTOR WITH THE UTILITY OWNER. CONTRACTOR SHALL CONTACT, SCHEDULE, AND ESTABLISH UTILITY SHUT DOWN TIMES AND DETERMINE THE RELOCATION AND/OR REPLACEMENT REQUIREMENTS OF EXISTING UTILITIES PRIOR TO THE START OF ANY WORK. THE UTILITY SHALL BE RELOCATED OR REPLACED TO THE SATISFACTION OF THE UTILITY OWNER.
11. IF APPLICABLE, CONSTRUCTION EASEMENTS SHALL NOT BE USED IN ANY MANNER THAT WILL CAUSE PERMANENT DAMAGE TO THE PROPERTY. DESCRIPTIONS OF THE EASEMENTS ACQUIRED FOR THE WORK WILL BE ON FILE AT THE OFFICE OF THE OWNER. CONTRACTOR SHALL COMPLY WITH ALL PROVISIONS OF THE EASEMENT AGREEMENTS.
12. CONTRACTOR SHALL KEEP ALL CONSTRUCTION ACTIVITIES WITHIN THE CONSTRUCTION LIMITS AND ANY TEMPORARY CONSTRUCTION OR PERMANENT EASEMENTS OBTAINED FOR THIS PROJECT, IF APPLICABLE. THIS INCLUDES, BUT IS NOT LIMITED TO, VEHICLES AND EQUIPMENT, LIMITS OF EXCAVATION, STOCKPILED EXCAVATED AND IMPORTED MATERIAL, BACKFILL MATERIAL, STREAMBED MATERIAL, AND BRIDGE MATERIAL. IF THE CONTRACTOR REQUIRES ADDITIONAL CONSTRUCTION EASEMENTS, IT IS THE CONTRACTOR'S RESPONSIBILITY TO OBTAIN SUCH EASEMENTS FROM INDIVIDUAL PROPERTY OWNERS AND BEAR ALL ASSOCIATED COSTS.
13. UNLESS OTHERWISE INDICATED ON THE DRAWINGS OR SPECIFICATIONS, ALL EXISTING ITEMS INCLUDING, BUT NOT LIMITED TO, STRUCTURES, IMPROVEMENTS, GROUNDWATER WELLS, SIGNS, FENCES, GATES, CURBS, PAVEMENT, BRIDGES, UTILITIES, IRRIGATION PIPELINES AND DITCHES, ETC. SHALL BE PROTECTED BY THE CONTRACTOR. IF SUCH ITEMS ARE DAMAGED OR MUST BE REMOVED OR MODIFIED TO FACILITATE CONSTRUCTION, CONTRACTOR SHALL FIRST NOTIFY THE OWNER AND THEN REPLACE THE ITEMS TO A LIKE OR BETTER CONDITION AT CONTRACTOR'S EXPENSE TO SATISFACTION OF OWNER OF FACILITIES.
14. REQUIREMENTS RELATED TO THE PROTECTION AND/OR REMOVAL OF TREES, VEGETATION, AND STRUCTURES WITHIN THE WORK AREA ARE DETAILED IN THE SPECIFICATIONS.
15. CONTRACTOR IS SOLELY RESPONSIBLE FOR DETERMINING THE TRENCH LIMITS NEEDED TO COMPLETE THE WORK IN CONFORMANCE WITH LOCAL, STATE AND FEDERAL CODES GOVERNING SHORING, SHEETING, BRACING OF EXCAVATIONS AND TRENCHES, AND FOR PROTECTION AND SAFETY OF THE WORKERS AND OTHER CONSTRUCTION RELATED PERSONNEL.
16. EXCAVATION SHALL MEET THE REQUIREMENTS OF OSHA 29 CFR PART 1926, SUBPART P, EXCAVATIONS. ACTUAL SLOPES SHALL NOT EXCEED THE MAXIMUM ALLOWABLE SLOPES (SUBPART P. APPENDIX B).
17. HORIZONTAL DATUM IS NAD83/91. HORIZONTAL COORDINATES SHOWN HEREIN ARE WASHINGTON STATE PLANE COORDINATE SYSTEM, NORTH ZONE, US SURVEY FEET.
18. VERTICAL DATUM IS NAVD 88, FEET.
19. ELEVATIONS GIVEN ARE TO FINISH GRADE UNLESS OTHERWISE INDICATED.
20. SLOPE UNIFORMLY BETWEEN CONTOURS AND SPOT ELEVATIONS SHOWN.
21. THE CONTRACTOR IS RESPONSIBLE FOR PRODUCING, IMPLEMENTING, ADHERING TO, AND MAINTAINING A STORMWATER POLLUTION PREVENTION PLAN IN ACCORDANCE WITH THE REGULATIONS AND GUIDELINES SET FORTH AND SUBJECT TO APPROVAL BY THE STATE OF WASHINGTON, DEPARTMENT OF ECOLOGY, WATER QUALITY PROGRAM. CONTRACTOR SHALL IMPLEMENT AND DOCUMENT ANY ADDITIONAL MEASURES NECESSARY TO PREVENT ANY EROSION OR HAZARDOUS MATERIALS FROM LEAVING THE SITE, DISCHARGING, BEING ENTRAINED, ABSORBED OR OTHERWISE ENTERING SURFACE WATERS, GROUND WATER OR SOILS.
22. THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING ALL TEMPORARY AND PERMANENT EROSION CONTROL MEASURES AT ALL TIMES. MAINTENANCE OF TEMPORARY AND PERMANENT EROSION CONTROL MEASURES SHALL BE CONSIDERED INCIDENTAL.
23. THE CONTRACTOR SHALL BE HELD SOLELY RESPONSIBLE FOR ANY NPDES OR OTHER APPLICABLE ENVIRONMENTAL PERMIT VIOLATIONS AND FINES.
24. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL CONSTRUCTION STAKING AND LAYOUT, UNLESS OTHERWISE SPECIFIED IN THE PLANS. CONTRACTOR SHALL STAKE LOCATIONS OF CORNERS OF CONCRETE BRIDGE DECK AND OBTAIN APPROVAL FROM ENGINEER PRIOR TO EXCAVATION TO PLACE ABUTMENTS.

BAUMANN CULVERT REPLACEMENT QUANTITIES

ITEM NO.	ITEM	QUANTITY	UNITS
	SITE PREPERATION		
1	MOBILIZATION	1.00	L.S.
2	REMOVAL OF STRUCTURE AND OBSTRUCTION	1.00	EA.
3	TEMPORARY DAMS AND DEWATERING	1.00	EA.
4	SURVEYING	1.00	L.S.
	EARTHWORK		
5	STRUCTURE EXCAVATION CLASS A INCLUDING HAUL	51	C.Y.
6	SHORING OR EXTRA EXCAVATION CLASS A	1	L.S.
7	FURNISH AND INSTALL PRECAST CONCETE BRIDGE BAUMANN SITE	1.00	L.S.
8	FURNISH AND INSTALL PRECAST CONCETE BRIDGE CANN SITE	1.00	L.S.
9	PRECAST CONCRETE WING WALL	4	EA.
10	GRAVEL BACKFILL CLASS A	5.50	C.Y.
11	CONSTRUCTION GEOTEXTILE FOR SEPARATION	17.00	S.Y.
12	TOPSOIL	27.00	C.Y.
13	STREAMBED GRAVELS	84.00	C.Y.
14	CRUSHED SURFACE BASE COURSE	7.00	C.Y.
	OTHER		
15	EROSION CONTROL & WATER POLLUTION CONTROL	1.00	L.S.
16	FINAL CLEANUP	1.00	L.S.
17	MINOR CHANGE	2500.00	DOLLARS

CANN CULVERT REPLACEMENT QUANTITIES

ITEM NO.	ITEM	QUANTITY	UNITS
	SITE PREPERATION		
1	MOBILIZATION	1.00	L.S.
2	REMOVAL OF STRUCTURE AND OBSTRUCTION	1.00	EA.
3	TEMPORARY DAMS AND DEWATERING	1.00	EA.
4	SURVEYING	1.00	L.S.
	EARTHWORK		
5	STRUCTURE EXCAVATION CLASS A INCLUDING HAUL	51	C.Y.
6	SHORING OR EXTRA EXCAVATION CLASS A	1	L.S.
7	FURNISH AND INSTALL PRECAST CONCETE BRIDGE BAUMANN SITE	1.00	L.S.
8	FURNISH AND INSTALL PRECAST CONCETE BRIDGE CANN SITE	1.00	L.S.
9	PRECAST CONCRETE WING WALL	4	EA.
10	GRAVEL BACKFILL CLASS A	5.50	C.Y.
11	CONSTRUCTION GEOTEXTILE FOR SEPARATION	17.00	S.Y.
12	TOPSOIL	26.00	C.Y.
13	STREAMBED GRAVELS	58.00	C.Y.
14	CRUSHED SURFACE BASE COURSE	7.00	C.Y.
	OTHER		
15	EROSION CONTROL & WATER POLLUTION CONTROL	1.00	L.S.
16	FINAL CLEANUP	1.00	L.S.
17	MINOR CHANGE	2500.00	DOLLARS

STRUCTURE NOTES:

1. THE CONTRACTOR SHALL BE RESPONSIBLE FOR DESIGNING AND SUPPLYING PRECAST CONCRETE BRIDGE STRUCTURES MEETING THE DIMENSIONS AND REQUIREMENTS IDENTIFIED IN THESE PLANS AND THE SPECIFICATIONS. THE CONTRACTOR SHALL SUBMIT TO THE CONTRACTING AGENCY, DOCUMENTATION DEMONSTRATING THAT THE BRIDGE DECK AND ABUTMENTS ARE DESIGNED TO WITHSTAND AASHTO HL–93 LOADING. THE DOCUMENTATION SHALL BE PROVIDED TO THE CONTRACTING AGENCY AT LEAST 30 DAYS PRIOR TO INSTALLATION OF THE BRIDGE AT THE PROJECT SITE AND SHALL INCLUDE SUPPLEMENTAL SPECIFICATIONS AND DRAWINGS OF THE BRIDGE DECK, ABUTMENTS, AND WING WALLS STAMPED BY A STRUCTURAL ENGINEER, LICENSED TO PRACTICE IN THE STATE OF WASHINGTON AND THE ASSOCIATED DESIGN CALCULATIONS. THE SUBMITTAL SHALL CONSTITUTE "SHOP DRAWINGS", WHICH UPON APPROVAL WILL SUPPLEMENT THE CONTRACT DRAWINGS AND SPECIFICATIONS.
2. MANUFACTURE OF CONCRETE BRIDGE SHALL CONFORM TO MOST RECENT AASHTO BRIDGE DESIGN STANDARDS. EXACT CONFIGURATION OF BRIDGE MAY VARY FROM THAT SHOWN ON THESE PLANS. BRIDGE DESIGN AND SHOP DRAWINGS ARE SUBJECT TO APPROVAL BY THE CONTRACTING AGENCY.
3. CAST IN PLACE CONCRETE IS NOT ACCEPTABLE.
4. BRIDGE DECK SHALL INCLUDE 2 RACEWAYS TO ACCOMMODATE UTILITY LINES. 2" DIAMETER (MINIMUM) SEPARATED BY 6' (MINIMUM).
5. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL CONSTRUCTION STAKING AND LAYOUT, UNLESS OTHERWISE SPECIFIED IN THE DRAWINGS. CONTRACTOR SHALL STAKE LOCATIONS OF CORNERS OF CONCRETE BRIDGE DECKS AND OBTAIN APPROVAL FROM CONTRACTING OFFICER PRIOR TO EXCAVATION TO PLACE ABUTMENTS.
6. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ARRANGING DELIVERY OF THE BRIDGE AND ALL ASSOCIATED COMPONENTS TO THE PROJECT SITE. DISTURBANCE TO NORMAL TRAFFIC FLOW SHALL BE MINIMIZED; ANY TRAFFIC CONTROL MEASURES REQUIRED FOR DELIVERY OF ANY PROJECT RELATED MATERIALS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.

LEGEND

1600 — EXISTING GRADE CONTOURS

1600 — FINISH GRADE CONTOURS

ABBREVIATIONS

AASHTO	AMERICAN ASSOCIATION OF STATE HIGHWAY SAFETY OFFICIALS
APPROX	APPROXIMATE
ASTM	AMERICAN SOCIETY OF TESTING & MATERIALS
BM	BENCHMARK
℄	CENTERLINE
CCNRD	CHELAN COUNTY NATURAL RESOURCE DEPARTMENT
CDF	CONTROLLED DENSITY FILL
CMP	CORRUGATED METAL PIPE
CONC	CONCRETE
CONT	CONTINUOUS
CP	CONTROL POINT
CSBC	CRUSHED SURFACING BASE COURSE
CSTC	CRUSHED SURFACING TOP COURSE
CY	CUBIC YARD
E	EAST
EA	EACH
EF	EACH FACE
EL	ELEVATION
EXST	EXISTING
G	GRADE
GPM	GALLONS PER MINUTE
H	HORIZONTAL
L	LENGTH
LF	LINEAR FOOT
LS	LUMP SUM
MAX	MAXIMUM
MIN	MINIMUM
N	NORTH
NO.	NUMBER
NTS	NOT TO SCALE
OC	ON CENTER
OG	ORDINARY GROUND
OHW	ORDINARY HIGH WATER
PSI	POUNDS PER SQUARE INCH
PT	POINT
Q	FLOW
ROW	RIGHT–OF–WAY
S	SOUTH
SF	SQUARE FOOT
SPEC	SPECIFICATION
SST	STAINLESS STEEL
STA	STATION
SY	SQUARE YARD
T & B	TOP & BOTTOM
TYP	TYPICAL
W	WEST
WSDOT	WASHINGTON STATE DEPARTMENT OF TRANSPORTATION
WSE	WATER SURFACE ELEVATION
USFWS	UNITED STATES FISH AND WILDLIFE SERVICE

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WENATCHEE SUBBASIN
UPPER CHUMSTICK BARRIERS PROJECT
BAUMANN AND CANN CULVERT REPLACEMENT PROJECT

REV NO

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DESIGNED
J. H. Nielsen/J. E. T.
DRAWN
Roger W. Wright
CHECKED
Colin Forsyth P.E.
TECH. APPR. NAME, PROF. ABBR.
Steve Montague Acting Program Manager
ADMIN. APPROVAL NAME TITLE
BOISE, ID 2012–06–20

GENERAL NOTES AND QUANTITIES

1678–100–1754

SHEET 2 OF 8

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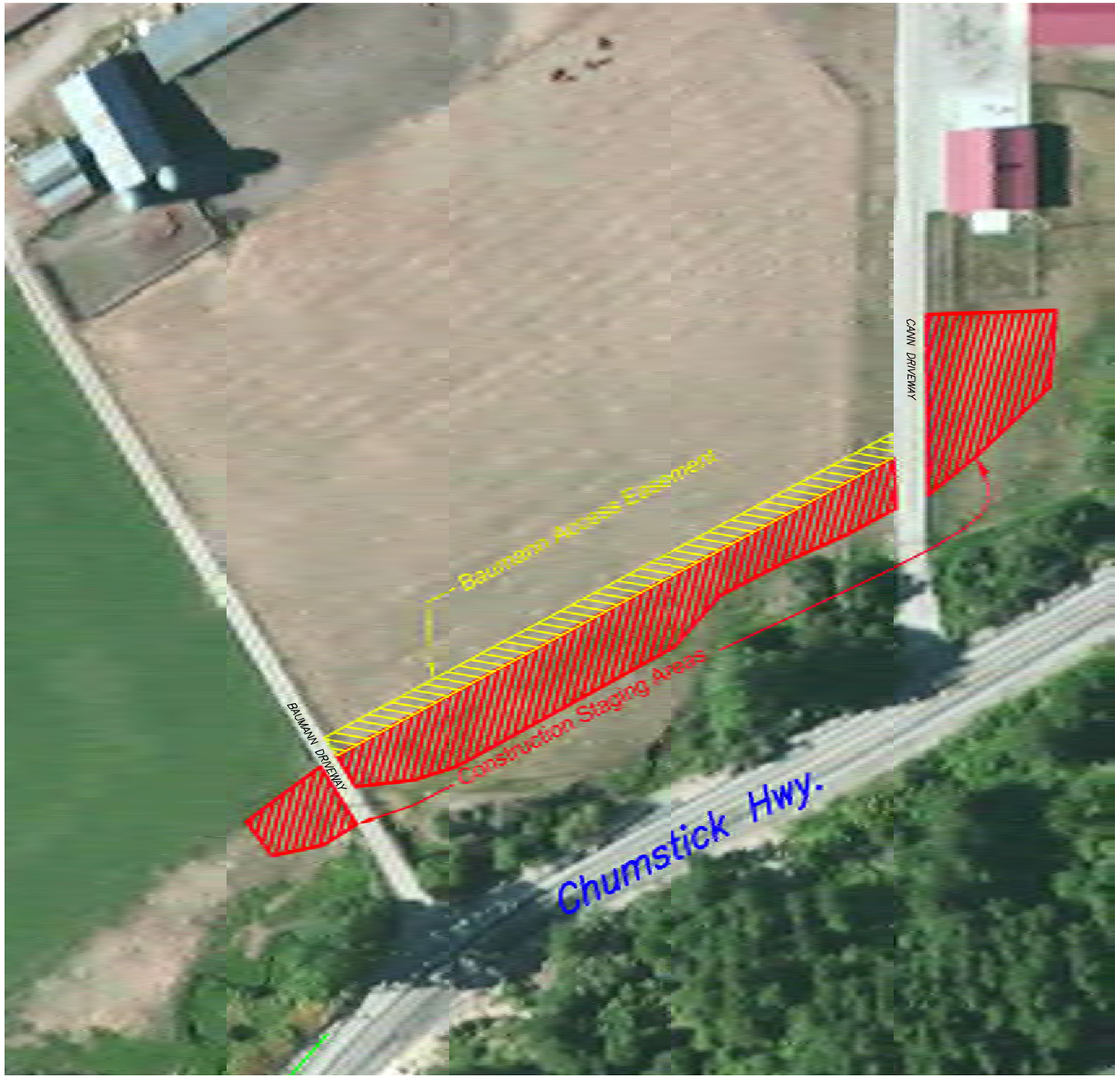

LOCATION MAP

N

NOTES:

1. Contracting Officer will stake out staging area prior to mobilization.
2. Additional staging for the Baumann Bridge may be placed on the Baumann Driveway with the prior approval of the contracting officer.
3. Contractor will be responsible for maintaining current condition of existing driveways and fence lines; where necessary to disturb either, the contractor shall restore to pre-project conditions at the end of construction.
4. Temporary access to the Baumann property during construction of the Baumann Bridge will occur through the Cann Driveway. Contractor shall ensure that access is continually maintained.
5. Unloading of materials or staging for unloading from the Chumstick Highway is not allowed. All materials shall be unloaded from existing driveways.
6. Contractor shall access creek from the Cann Driveway for the Cann Bridge, as staked out by contracting officer. Access point shall be returned as close to existing conditions as possible. Contracting officer must approve access point restoration prior to contractor leaving site.
7. Contractor shall access creek from the Baumann Driveway for the Baumann Bridge, as staked out by contracting officer. Access point shall be returned as close to existing conditions as possible. Contracting officer must approve access point restoration prior to contractor leaving site.

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ACCESS AND STAGING

1678-100-1755

SHEET 3 OF 8

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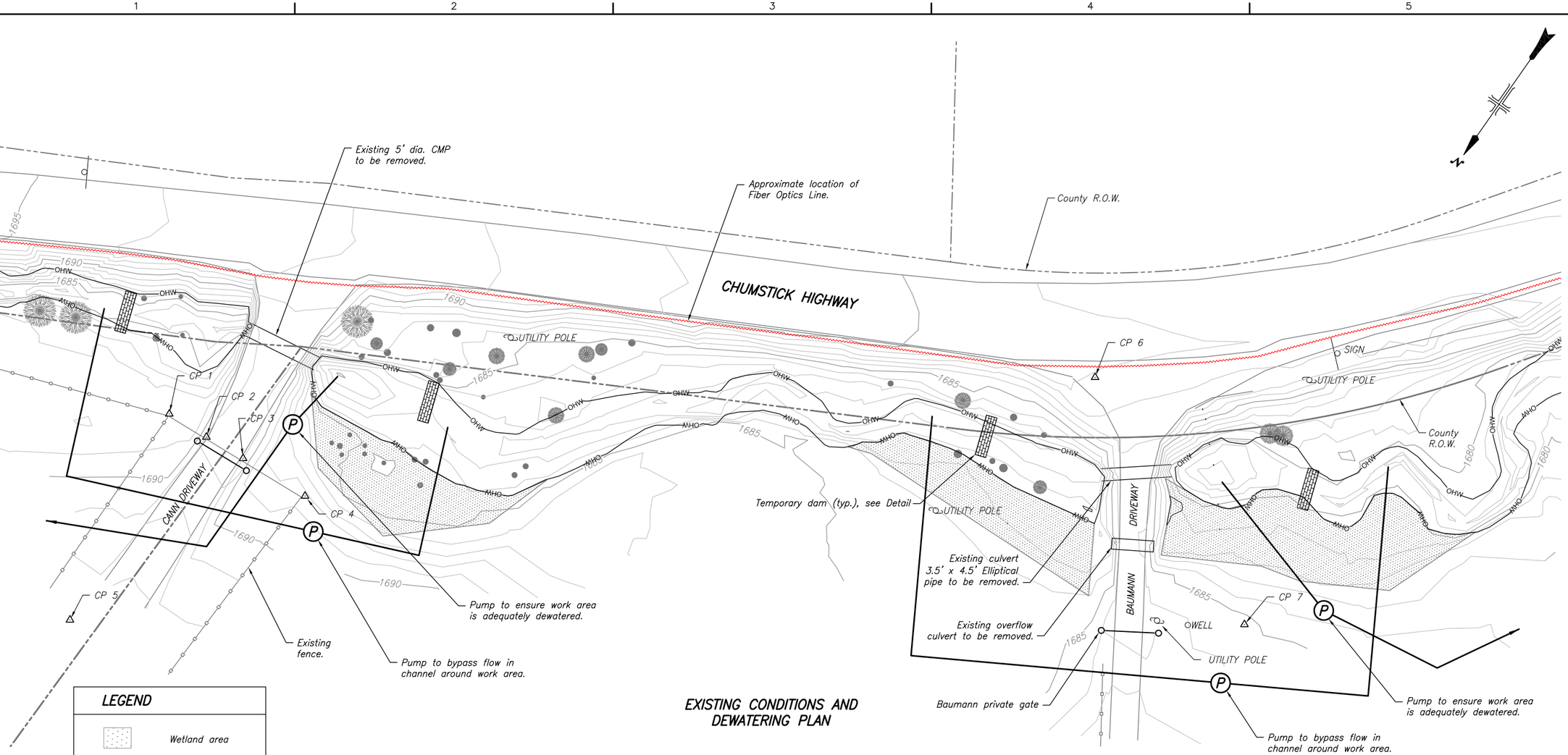

LEGEND

- Wetland area
- Pump
- Tree
- Gate
- OHW — Ordinary High Water
- Fiber Optics Line

CONTROL POINTS

Point #	Northing	Easting	Elevation	Description
CP 1	260816.95	1689094.80	1688.29	5/8" IR RPC DEA Control
CP 2	260816.11	1689078.89	1691.16	5/8" IR RPC DEA Control
CP 3	260814.81	1689063.48	1691.30	5/8" IR RPC DEA Control
CP 4	260813.11	1689037.11	1688.66	5/8" IR RPC DEA Control
CP 5	260899.24	1689081.37	1692.94	5/8" IR RPC DEA Control
CP 6	260612.52	1688826.05	1688.83	5/8" IR RPC DEA Control
CP 7	260655.10	1688729.77	1685.34	5/8" IR RPC DEA Control

EXISTING CONDITIONS AND DEWATERING PLAN

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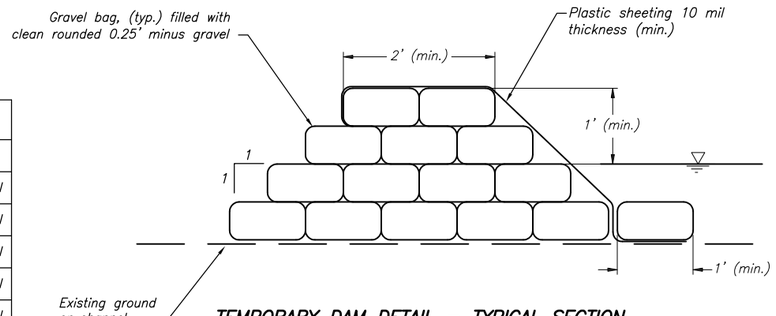
SCALE OF FEET



TEMPORARY DAM DETAIL – TYPICAL SECTION

1 0 1 2 3
SCALE OF FEET

NOTES:

1. Existing underground utility locations have not been identified and are not shown on these plans. The contractor is responsible to locate and protect utilities during construction as described in section 1–07.17 of the WSDOT standard specifications. The telephone number for the one call center for utility locates is 1–800–424–5555.
2. Locations of control points will be clearly marked by the contracting agency.
3. The contractor shall place temporary dams in Chumstick Creek upstream and downstream to keep water and fish from entering the active construction area. The exact location of the temporary dams shall be coordinated with the contracting officer. The contractor shall furnish and operate a pump, or pumps, capable of bypassing the entirety of Chumstick Creek streamflow; expected streamflow during period of construction is approximately 650 gpm. However, flow conditions can vary seasonally and extended periods of rainfall will increase flow. All pumps used by the contractor for dewatering shall have screened intakes that meet WDFW specifications and juvenile fish screening criteria.
4. The contractor shall notify the contracting officer a minimum of 5 working days in advance of temporary dam construction to coordinate fish removal. The contracting agency will be responsible for all fish removal and handling.
5. Dewatering within the work area shall be performed to the extent necessary for contractor to perform, and contracting officer to inspect, all work. Discharge from dewatering with the work area shall be routed to vegetated buffers in floodplain areas so as to allow the removal of fine sediments or other contaminants prior to being allowed to re–enter Chumstick Creek. Discharge from dewatering is not permitted in wetland areas.
6. Contractor may propose other methods of dewatering. The locations of temporary dams, pumps and discharge locations shown on this sheet are approximate and are intended to schematically represent one method of dewatering the project area. The contractor shall submit a dewatering plan as described in the specifications prior to construction for review and approval by the contracting agency.

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Steve Monteque Acting Program Manager
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BOISE, ID 2012–06–20

EXISTING CONDITION AND DEWATERING PLAN

1678–100–1756

SHEET 4 OF 8

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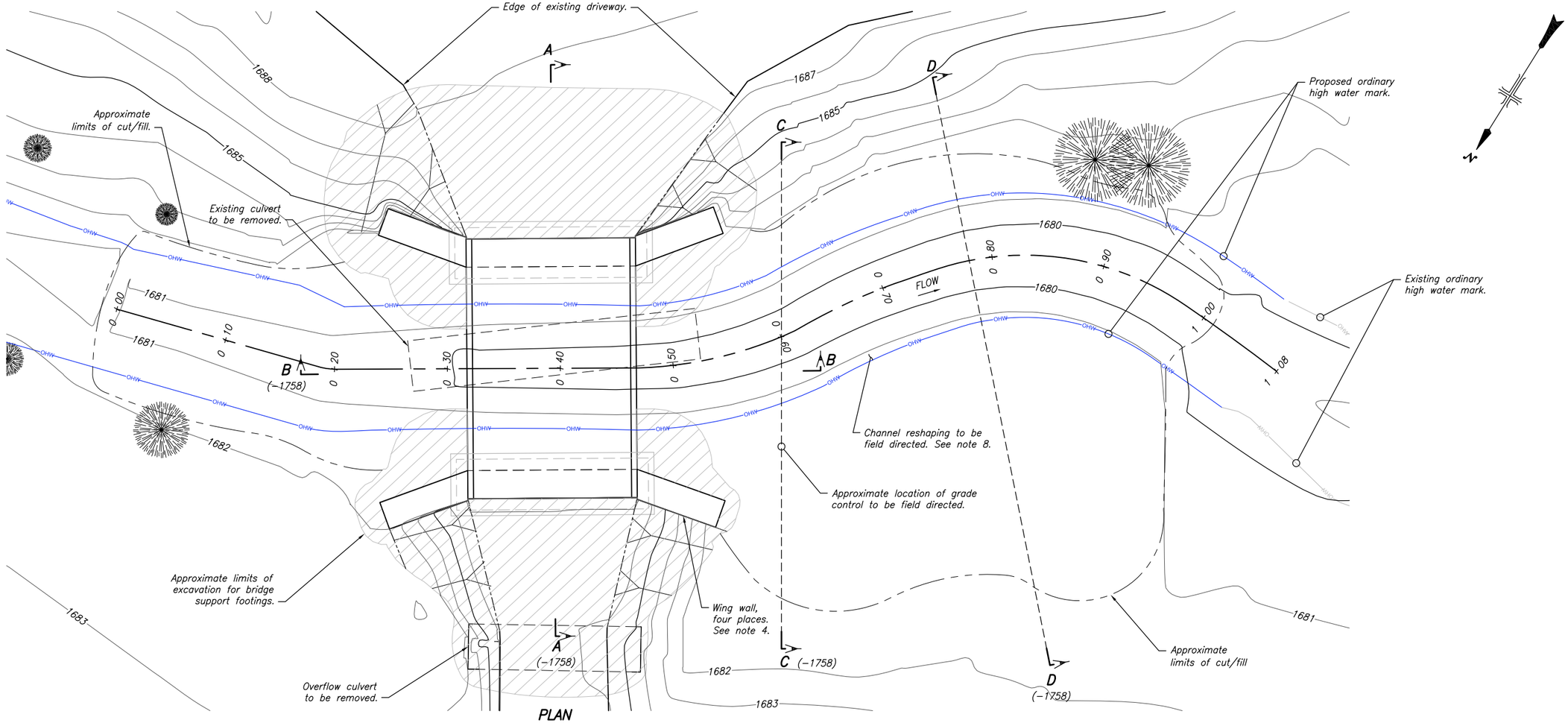

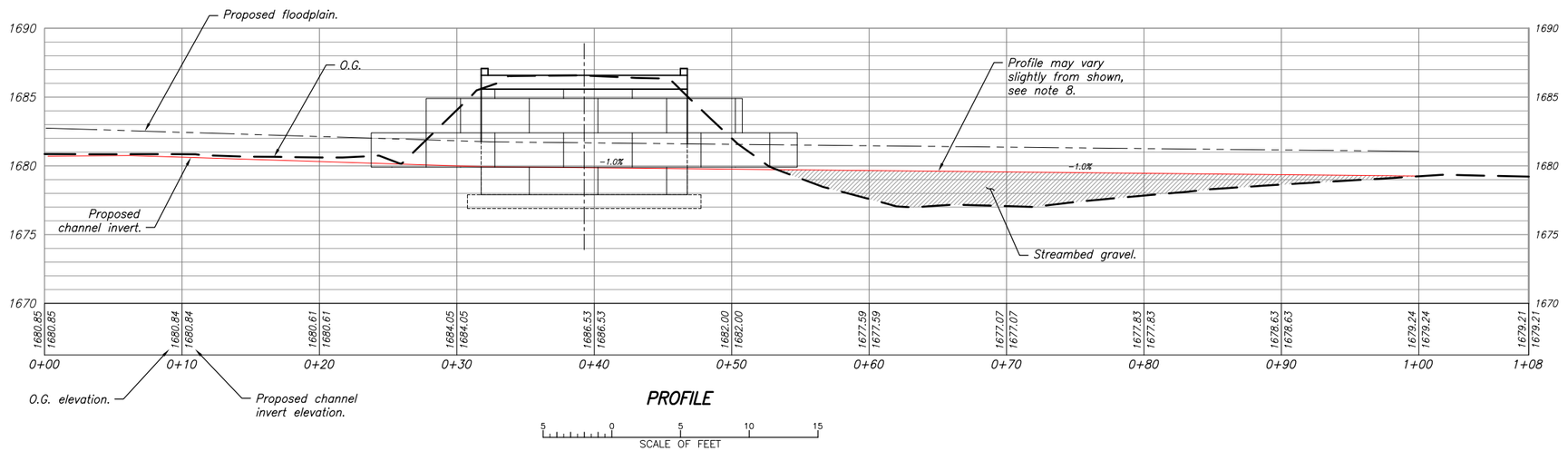

NOTES:

1. Contractor shall avoid damage to existing woody vegetation, including trees and shrubs, unless approved by the contracting officer.
2. Excavation and/or fill will be required to shape the channel as shown; channel shaping shall be limited to approximately 30' upstream and 60' downstream of the bridge.
3. Contracting officer may alter the finished grade from that shown on these plans to accommodate site conditions.
4. Wing wall shall be constructed from pre–cast concrete designed by the contractor, see note 1 Sheet 1678–100–1754 Structure Notes.
5. Side slopes of driveway constructed between existing driveway and the bridge deck shall not exceed 1.5:1.
6. Upon completing of construction, all areas disturbed during construction activities including mobilization, storage, and excavation above the ordinary high water line, but excluding the driveway surface, shall be seeded by contracting agency.
7. Flexible guideposts shall be installed at all four corners of the bridge deck,. Flexible guideposts shall be as shown in standard plan of WSDOT Standard Plans M–40.10–02.
8. Channel reshaping to be field directed by contracting officer and may vary slightly in width, depth, and slope than shown.

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ADMIN. APPROVAL	Steve Montague (NAME) Acting Program Manager (TITLE)
BOISE, ID	2012–06–20

BAUMANN BRIDGE DETAIL AND GRADING

1678–100–1757

SHEET 5 OF 8

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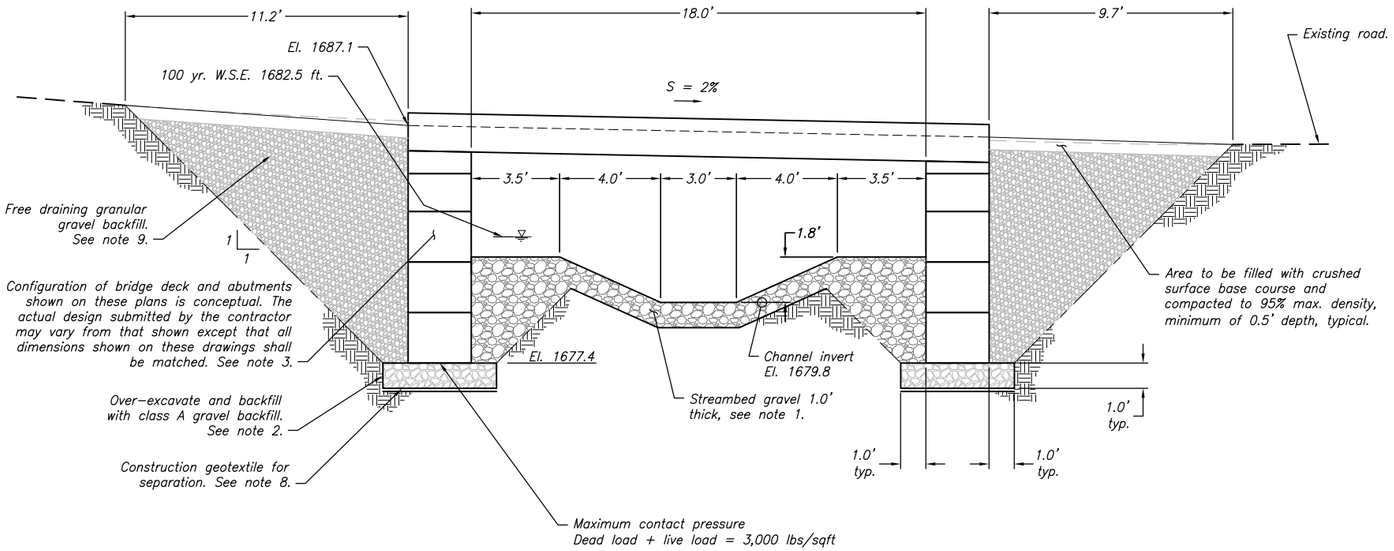
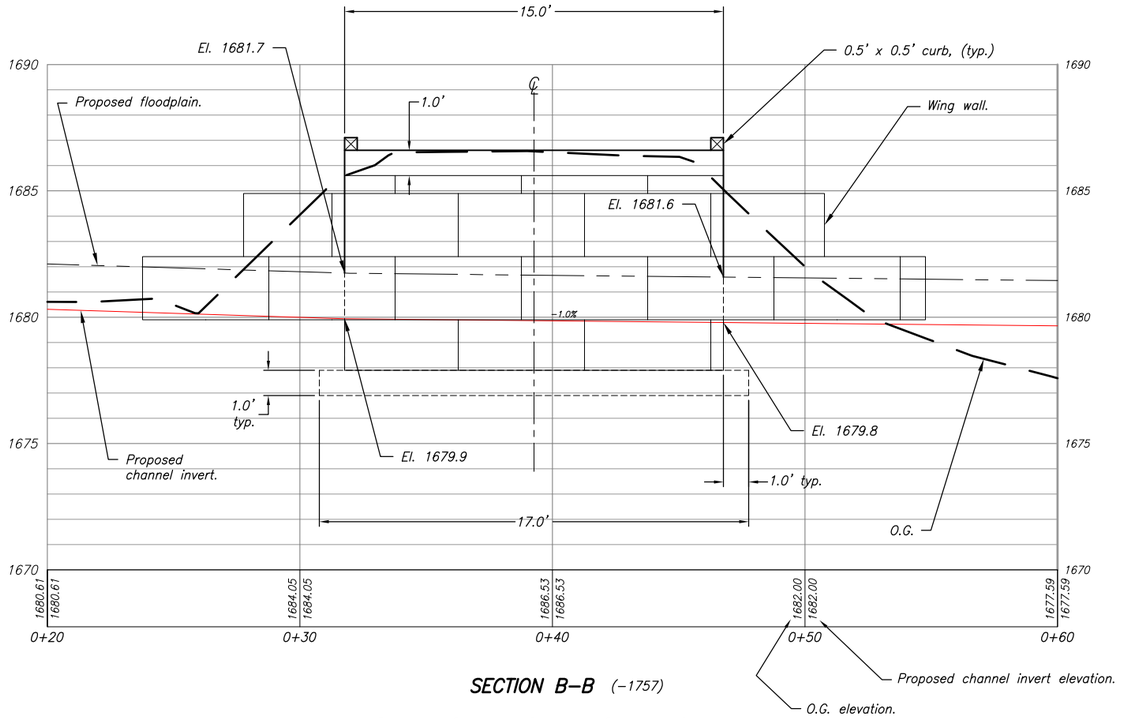


SECTION A–A (–1757)

3 0 3 6 9
SCALE OF FEET



SECTION B–B (–1757)

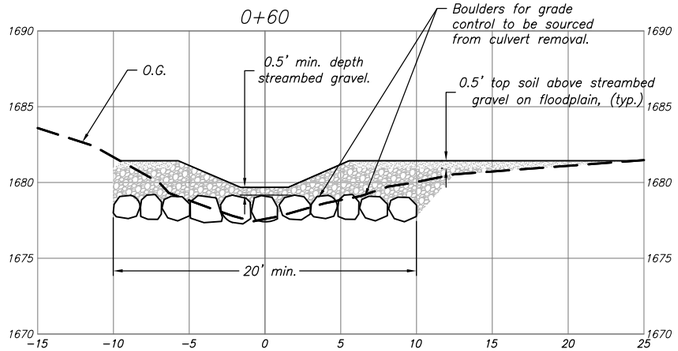
3 0 3 6 9
SCALE OF FEET

NOTES:

1. The constructed channel shall be lined with a minimum 1.0' layer of streambed gravel. All material shall be naturally occurring rounded rock that is hard, and durable. The gradation shall be:

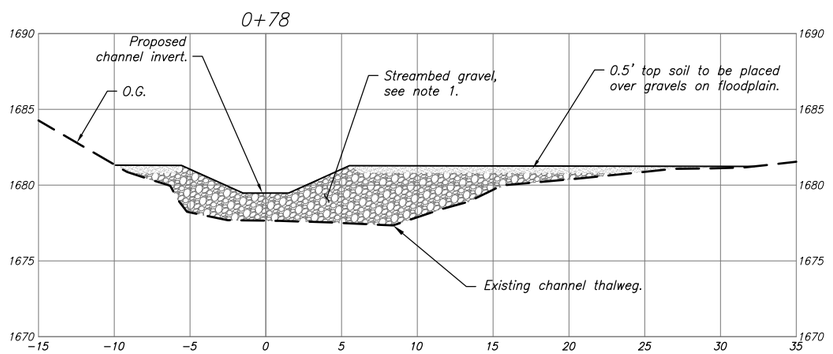
DIAMETER	PERCENT PASSING
7"	100
3"	70 – 90
1.5"	40 – 65
3/8"	10 – 25
US #200 sieve	0 – 5

2. Crushed rock placed below bridge footings shall conform to WSDOT standard specification 9–03.12, Class A gravel backfill and shall be compacted to 95% maximum density.
3. Bridge deck shall be designed to withstand AASHTO HL–93 loading. Design shall be conducted by a registered structural engineer licensed to practice in the state of Washington. Design shall be submitted at least 30 days prior to construction to allow for review and approval by the contracting agency.
4. Manufacture of concrete bridge shall conform to most recent AASHTO bridge design standards. Exact configuration of bridge may vary from that shown on these plans. Bridge design and shop drawings are subject to approval by the contracting agency.
5. Cast in place concrete is not acceptable.
6. Bridge deck shall include 2 raceways to accommodate utility lines. 2" diameter (minimum) separated by 6' (minimum).
7. Wing wall dimensions are approximate and shall be adjusted based on site conditions.
8. Geotextile fabric shall conform to WSDOT standard specification 9–33, construction geotextile for separation.
9. Backfill behind abutments shall be free draining material that conforms to Section 9–03.12(2) of the WSDOT standard specifications. Backfill shall be placed in 12 inch (max.) lifts and compacted to 95% maximum density using hand–operated compaction equipment. Soil excavated for bridge construction may be used as backfill if it meets the requirements of Section 9–03.12(2).



SECTION C–C (–1757)

5 0 5 10 15
SCALE OF FEET



SECTION D–D (–1757)

5 0 5 10 15
SCALE OF FEET

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COLUMBIA/SNAKE RIVER SALMON RECOVERY PROGRAM

WENATCHEE SUBBASIN

UPPER CHUMSTICK BARRIERS PROJECT
BAUMANN AND CANN CULVERT REPLACEMENT PROJECT

REV NO

Justin Nielsen — DESIGNED
N. E. Thomas\J. H. N. — DRAWN
Roger W. Wright — CHECKED
Colin Forsyth P.E. — TECH. APPR. (NAME, PROF. ABBR.)
Steve Montague, Acting Program Manager — ADMIN. APPROVAL (NAME, TITLE)
BOISE, ID — 2012–06–20

BAUMANN SECTIONS

1678–100–1758

SHEET 6 OF 8

DATE AND TIME PLOTTED
JUNE 22, 2012 11:29
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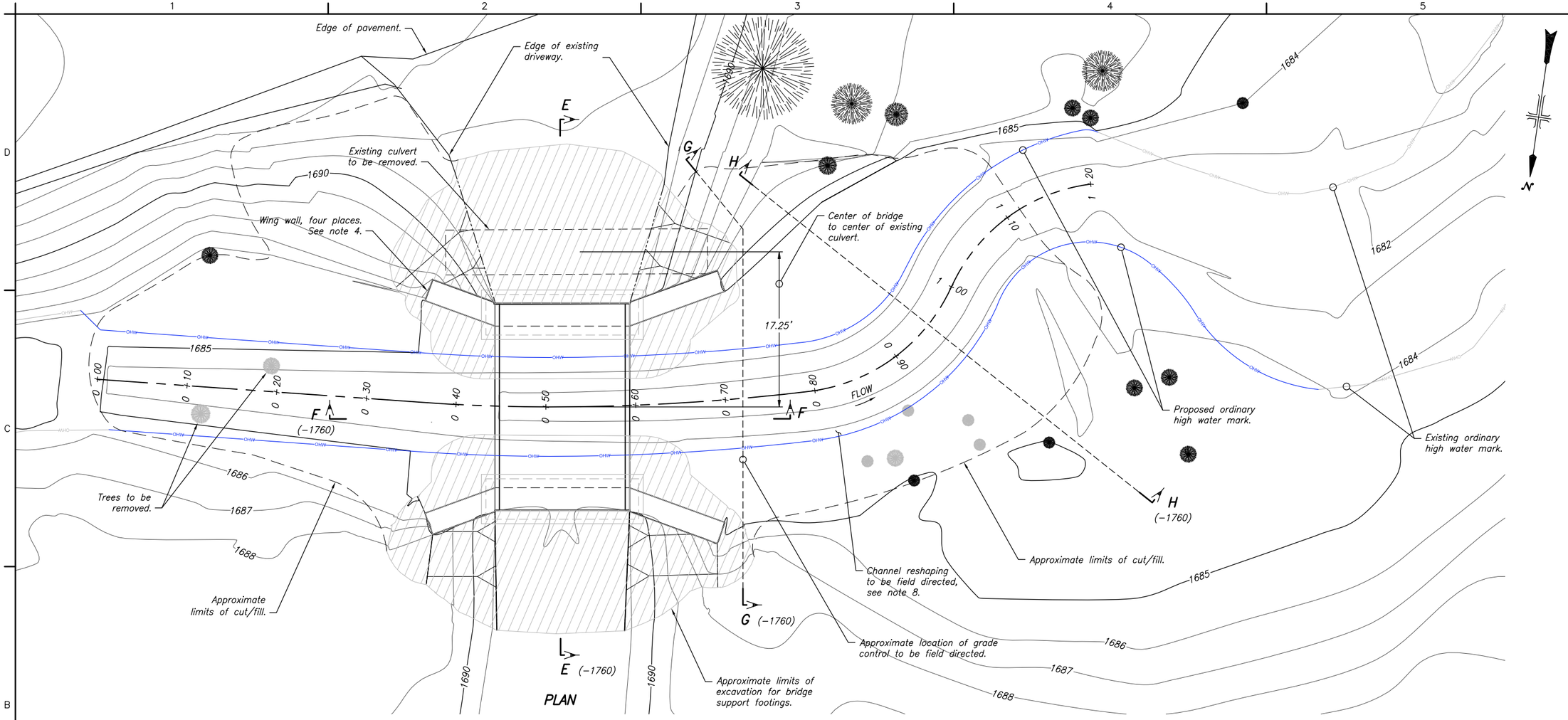

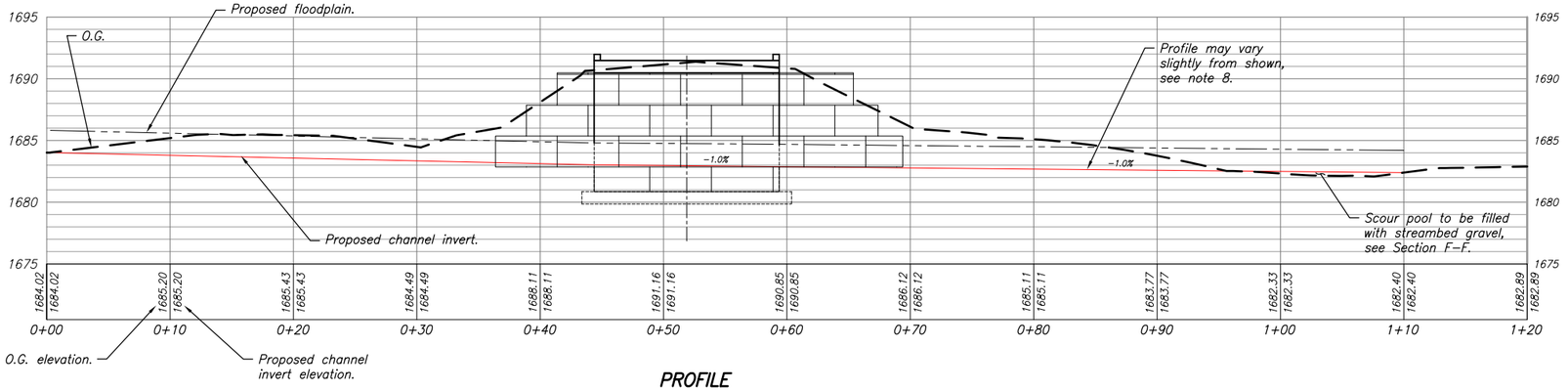

NOTES:

1. Contractor shall avoid damage to existing woody vegetation, including trees and shrubs, unless approved by the contracting officer.
2. Excavation and/or fill will be required to shape the channel as shown; channel shaping shall be limited to approximately 40' upstream and 60' downstream of the bridge.
3. Contracting officer may alter the finished grade from that shown on these plans to accommodate site conditions.
4. Wing wall shall be constructed from pre–cast concrete designed by the contractor, see note 1 Sheet 1678–100–1754 Structure Notes.
5. Side slopes of driveway constructed between existing driveway and the bridge deck shall not exceed 1.5:1.
6. Upon completing of construction, all areas disturbed during construction activities including mobilization, storage, and excavation above the ordinary high water line, but excluding the driveway surface, shall be seeded by contracting agency.
7. Flexible guideposts shall be installed at all four corners of the bridge deck,. Flexible guideposts shall be as shown in standard plan of WSDOT Standard Plans M–40.10–02.
8. Channel reshaping to be field directed by contracting officer and may vary slightly in width, depth, and slope than shown.

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WENATCHEE SUBBASIN

UPPER CHUMSTICK BARRIERS PROJECT
BAUMANN AND CANN CULVERT REPLACEMENT PROJECT

REV NO

DESIGNED	Justin Nielsen
DRAWN	J. E. Thomas
CHECKED	Roger W. Wright
TECH. APPR.	Colin Forsyth P.E.
ADMIN. APPROVAL	Steve Montague, Acting Program Manager
NAME	
TITLE	
BOISE, ID	2012–06–20

CANN BRIDGE
DETAIL AND GRADING

1678–100–1759

SHEET 7 OF 8

DATE AND TIME PLOTTED
JUNE 22, 2012 11:31
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CAD SYSTEM
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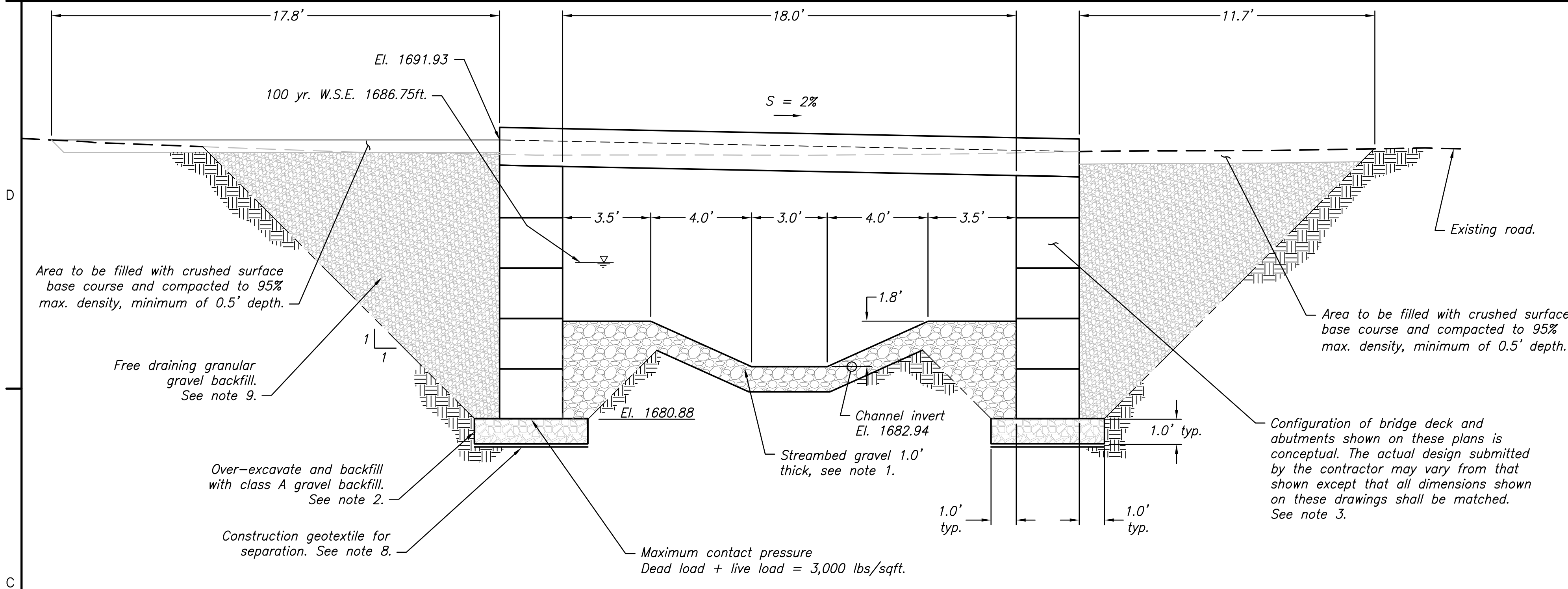


SECTION E–E (–1759)

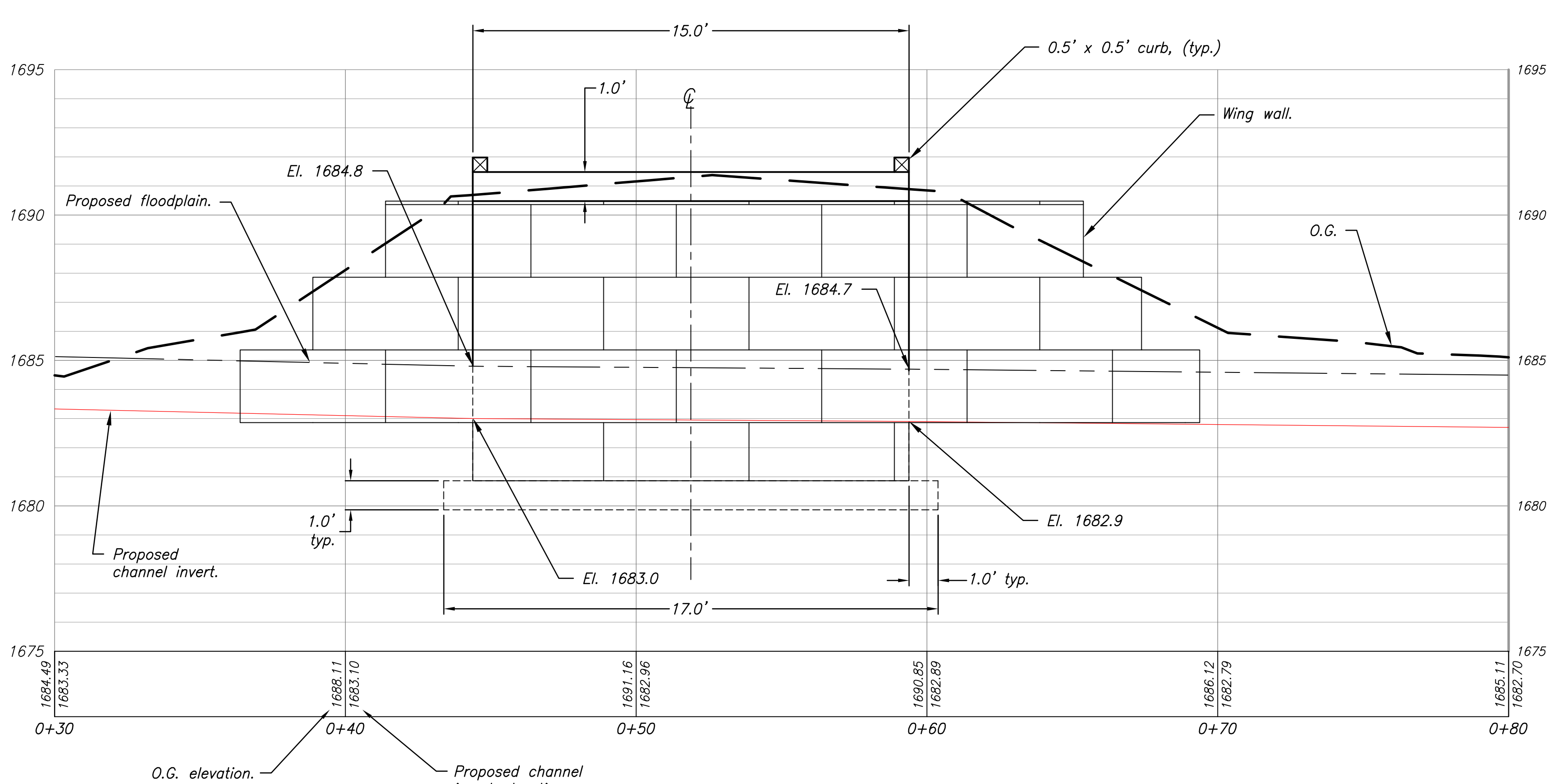
3 0 3 6 9
SCALE OF FEET

NOTES:

1. The constructed channel shall be lined with a minimum 1.0' layer of streambed gravel. All material shall be naturally occurring rounded rock that is hard, and durable. The gradation shall be:

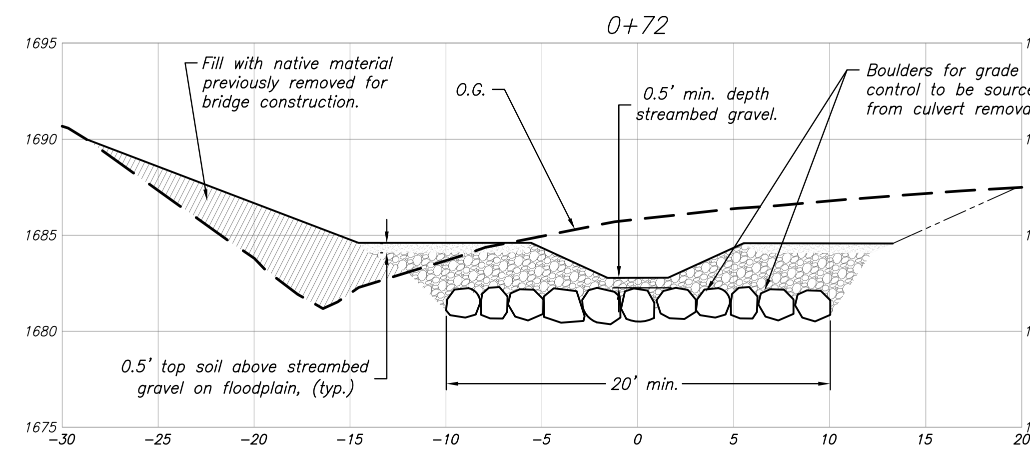
DIAMETER	PERCENT PASSING
7"	100
3"	70 – 90
1.5"	40 – 65
3/8"	10 – 25
US #200 sieve	0 – 5

2. Crushed rock placed below bridge footings shall conform to WSDOT standard specification 9–03.12, Class A gravel backfill and shall be compacted to 95% maximum density.
3. Bridge deck shall be designed to withstand AASHTO HL–93 loading. Design shall be conducted by a registered structural engineer licensed to practice in the state of Washington. Design shall be submitted at least 30 days prior to construction to allow for review and approval by the contracting agency.
4. Manufacture of concrete bridge shall conform to most recent AASHTO bridge design standards. Exact configuration of bridge may vary from that shown on these plans. Bridge design and shop drawings are subject to approval by the contracting agency.
5. Cast in place concrete is not acceptable.
6. Bridge deck shall include 2 raceways to accommodate utility lines. 2" diameter (minimum) separated by 6" (minimum).
7. Wing wall dimensions are approximate and shall be adjusted based on site conditions.
8. Geotextile fabric shall conform to WSDOT standard specification 9–33, construction geotextile for separation.
9. Backfill behind abutments shall be free draining material that conforms to Section 9–03.12(2) of the WSDOT standard specifications. Backfill shall be placed in 12 inch (max.) lifts and compacted to 95% maximum density using hand–operated compaction equipment. Soil excavated for bridge construction may be used as backfill if it meets the requirements of Section 9–03.12(2).



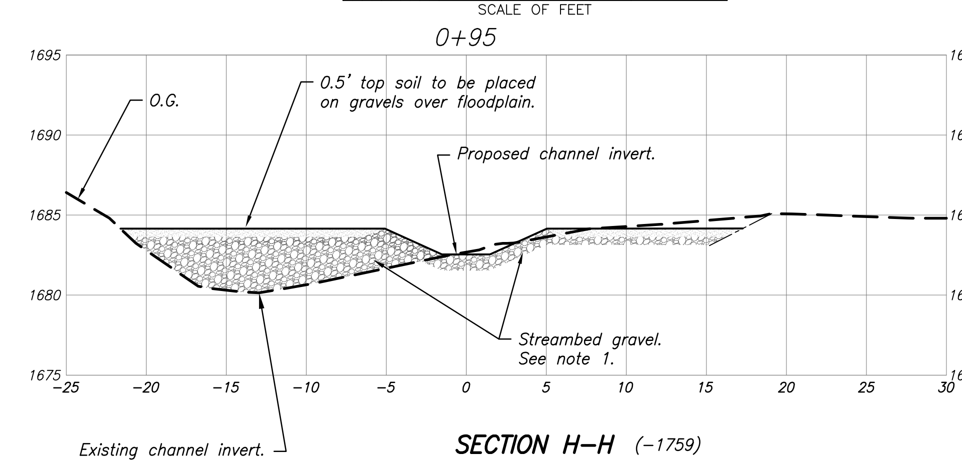
SECTION F–F (–1759)

3 0 3 6 9
SCALE OF FEET



SECTION G–G (–1759)

5 0 5 10 15
SCALE OF FEET



SECTION H–H (–1759)

6 0 6 12 18
SCALE OF FEET

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J. E. Thomas	DRAWN
Roger W. Wright	CHECKED
Colin Forsyth P.E.	TECH. APPR.
Steve Montague, Acting Program Manager	ADMIN. APPROVAL

BOISE, ID 2012–06–20

CANN SECTIONS

1678–100–1760