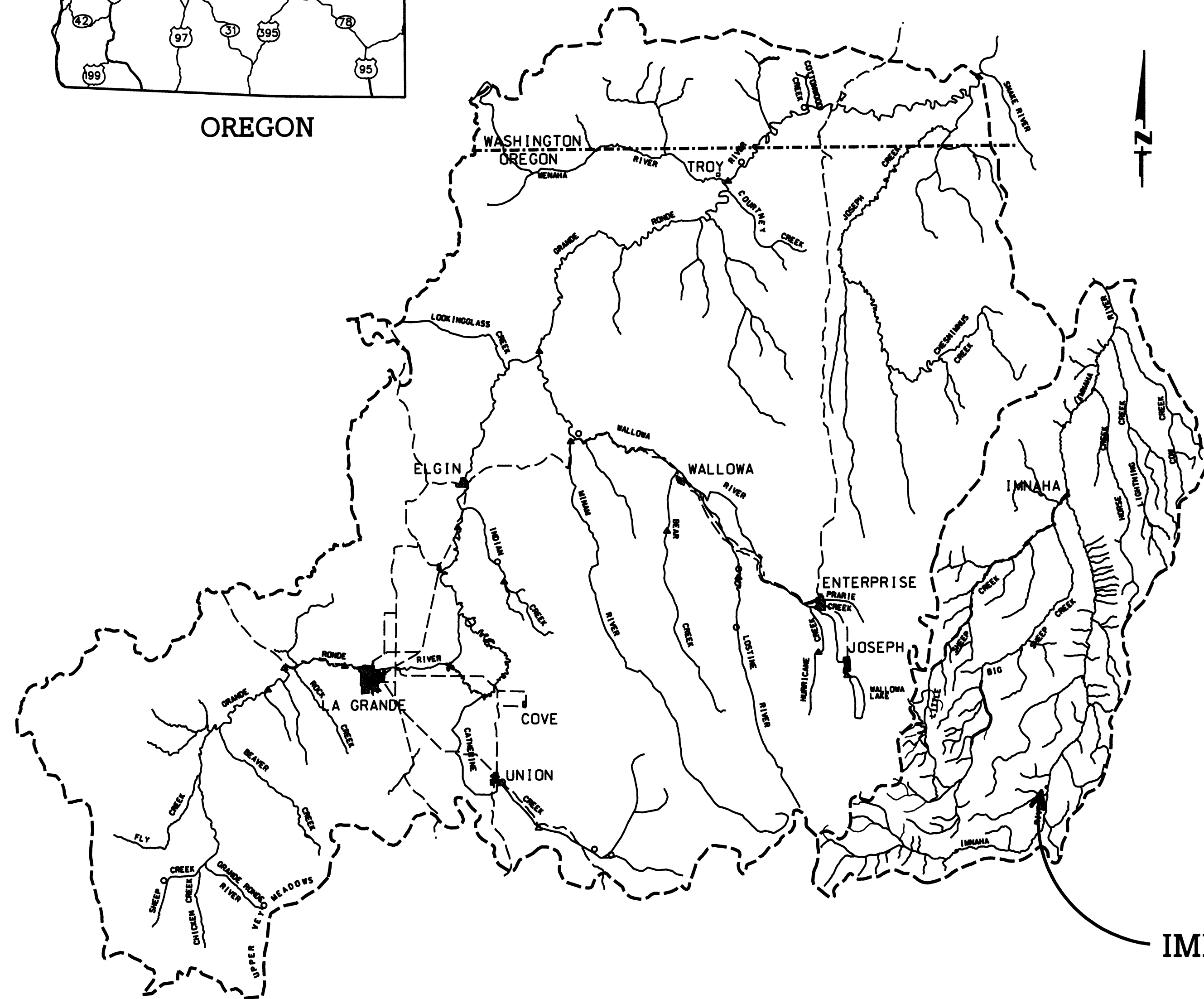


NORTHEAST OREGON HATCHERY PROJECT



IMNAHA SATELLITE FACILITY CONSTRUCTION DRAWINGS APRIL 11, 2006

IN COOPERATION WITH:

CONFEDERATED TRIBES OF THE UMATILLA INDIAN RESERVATION
OREGON DEPARTMENT OF FISH AND WILDLIFE
US FISH AND WILDLIFE SERVICE
NOAA FISHERIES



Sheet No.	Drawing Title
GENERAL	
1	G1 COVER, LOCATION MAP, VICINITY MAP
2	G2 DRAWING INDEX
3	G3 STANDARD SYMBOLS
4	G4 STANDARD ABBREVIATIONS
5	G5 OVERALL PROJECT PLAN AND CONTRACTOR STAGING AREA
6	G6 HYDRAULIC PROFILE AND DESIGN CRITERIA
CIVIL	
7	GC1 STANDARD CIVIL DETAILS 1
8	GC2 RESERVED
9	C1 DEMOLITION AND CLEARING/GRUBBING PLAN
10	C2 SITE PLAN AND GRADING PLAN NORTH
11	C3 SITE PLAN AND GRADING PLAN SOUTH
12	C4 YARD PIPING PLAN NORTH
13	C5 YARD PIPING PLAN SOUTH
14	C6 FISH LADDER AND BARRIER MODIFICATIONS PLAN
15	C7 FISH LADDER AND BARRIER MODIFICATIONS SECTIONS
16	C8 FISH LADDER AND BARRIER MODIFICATIONS DETAILS
17	C9 SW INTAKE SITE PLAN, SECTIONS AND DETAILS
STRUCTURAL	
18	GS1 GENERAL STRUCTURAL DETAILS 1
19	GS2 GENERAL STRUCTURAL DETAILS 2
20	GS3 GENERAL STRUCTURAL DETAILS 3
21	S1 INTAKE STRUCTURE PLAN AND SECTIONS
22	S2 INTAKE STRUCTURE SECTIONS AND DETAILS
23	S3 INTAKE STRUCTURE FISH SCREENS AND BAFFLES
24	S4 ACCLIMATION POND FOUNDATION PLAN AND SECTION
25	S5 ACCLIMATION POND TOP PLAN AND SECTION
26	S6 ACCLIMATION POND SECTIONS AND DETAILS
27	S7 ACCLIMATION POND DETAILS
28	S8 SEDIMENTATION POND FOUNDATION PLAN AND SECTION
29	S9 SEDIMENTATION POND SECTIONS
30	S10 SEDIMENTATION POND SECTION AND DETAILS
31	S11 FISH BARRIER PLAN
32	S12 FISH BARRIER SECTIONS AND DETAILS
33	S13 FISH BARRIER DETAILS 1
34	S14 RESERVED
35	S15 AUXILIARY WATER DIFFUSER BOX - PLAN, SECTION, AND DETAILS
36	S16 VEHICLE PARKING STRUCTURE FOUNDATION PLAN AND ROOF FRAMING PLAN
37	S17 VEHICLE PARKING STRUCTURE BUILDING SECTIONS
38	S18 VEHICLE PARKING STRUCTURE BUILDING ELEVATIONS
MECHANICAL	
39	GM1 PIPING SCHEDULE
40	GM2 RESERVED
41	GM3 STANDARD MECHANICAL DETAILS 1
42	GM4 STANDARD MECHANICAL DETAILS 2
43	M1 OVERALL MECHANICAL PLAN
44	M2 INTAKE STRUCTURE PLAN AND SECTION
45	M3 INTAKE STRUCTURE MECHANICAL SECTIONS AND DETAILS
46	M4 INTAKE SCREEN AIR BURST MANIFOLD PLAN, SECTIONS AND DETAILS
47	M5 INTAKE SCREEN PLAN AND SECTIONS
48	M6 ACCLIMATION POND SPRAY WATER SYSTEM SECTIONS AND DETAILS
49	M7 ACCLIMATION POND SPRAY WATER SYSTEM PLANS AND SECTIONS
50	M8 RESERVED
51	M9 RESERVED
52	M10 RESERVED
53	M11 RESERVED
54	M12 RESERVED
55	M13 WELL HEAD PLAN SECTIONS AND SCHEDULE
56	M14 AIR BACKWASH SYSTEM PROCESS AND INSTRUMENTATION DIAGRAM
57	M15 DETAILS 1
ELECTRICAL	
58	E1 ELECTRICAL SITE PLAN
59	E2 ELECTRICAL DETAILS 1
60	E3 ELECTRICAL DETAILS 2



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UNITED STATES DEPARTMENT OF ENERGY
BONNEVILLE POWER ADMINISTRATION
 HEADQUARTERS, PORTLAND, OREGON
NORTHEAST OREGON HATCHERY PROGRAM
 IMNAHA SATELLITE FACILITY
DRAWING INDEX

SITE PLAN SYMBOLOGY

- Nail #0
- FOUND 3/4" IRON PIN, PROPERTY CORNER FROM SUBDIVISION PLATS.
- ⊙ WATER WELL, SIZE AS INDICATED.
- POLE ANCHOR
- P POWER POLE
- SIGN
- *—*—*— FENCE LINE
- 3745.6 X SPOT ELEVATION
- ☀ CONIFER TREE: FIR, SPRUCE, LARCH OR PINE, 8" DIAMETER OR LARGER.
- ☁ DECIDUOUS TREE: COTTONWOOD, HAWTHORN, ASPEN, 8" DIAMETER OR LARGER.
- ☪ ALDER OR RIVER BIRCH CLUMP, MULTI-STEM, 6" TO 10" IN DIAMETER.
- ⊙ STUMP
- P/T OVERHEAD POWER AND TELEPHONE LINES.
- CO CLEAN OUT
- MH MANHOLE
- CB STORM DRAIN CATCH BASIN
- UV UTILITY VAULT
- PP POWER POLE
- TP TELEPHONE POLE
- FH FIRE HYDRANT
- YH-X YARD HYDRANT
- 75.8 FINISHED SPOT ELEVATION

PIPING SYMBOLOGY

- ⊗ BALL VALVE
- ⊗ BUTTERFLY VALVE
- ⊗ CHECK VALVE
- ⊗ GATE VALVE OR AS NOTED
- ⊗ SAFETY RELIEF VALVE
- ⊗ PLUG VALVE
- ⊗ PRESSURE REDUCING VALVE
- ⊗ CURB STOP
- ⊗ FM FLOW METER
- ▶ THRUST BLOCK
- ⊗ FOOT VALVE
- HB HOSE BIBB "NF" NON FREEZE
- YH YARD HYDRANT
- ⊗ CAPPED OR PLUGGED OPENING
- ⊗ ORIFICE
- ⊗ PIPE REDUCER
- ⊗ COMBINATION AIR RELEASE/VACUUM VALVE
- ⊗ UNION
- ⊗ PUMP
- ⊗ WYE STRAINER
- ⊗ PRESSURE GAUGE w/ GAUGE COCK
- ⊗ NEEDLE VALVE
- ⊗ ADJUSTABLE CLAMP
- ⊗ HOSE OR FLEXIBLE CONNECTOR
- ⊗ HEAT EXCHANGER

- CO CLEANOUT
- ⊗ 3-WAY TEMPERATURE MODULATING VALVE
- ⊗ CONTROL WIRING
- ⊗ FLEXIBLE CONNECTION

MECHANICAL SYMBOLOGY

- ⊗ AIR REGISTER
- ⊗ ROOF VENT W/BACKDRAFT DAMPER
- ⊗ CEILING MOUNTED ELECTRIC HEATER
- ⊗ ROOF MOUNTED EXHAUST FAN
- ⊗ HEAT RECOVERY FAN
- ⊗ WALL MTD. EXHAUST FAN
- ⊗ CEILING MTD. EXHAUST FAN
- ⊗ ELECTRIC UNIT HEATER

REFLECTED CEILING SYMBOLOGY

- ⊗ 2x4 ACOUSTICAL SUSPENDED CEILING
- RECESSED LIGHT FIXTURE
- ⊗ 1x4 FLUORESCENT LIGHT FIXTURE
- ⊗ 2x4 FLUORESCENT LIGHT FIXTURE
- ⊗ 4x4 FLUORESCENT LIGHT FIXTURE
- ⊗ SUPPLY AIR DIFFUSER/GRILLE
- ⊗ RETURN AIR GRILLE

GENERAL SYMBOLOGY

ARROW INDICATES DIRECTION OF PLAN NORTH

PLAN
BAR SCALE GOES HERE

DETAIL NUMBER
X
XXXX
* DRAWING WHERE DETAIL VIEW IS SHOWN
* DRAWING WHERE DETAIL VIEW IS CUT

DETAIL MARKER

DETAIL NUMBER
X
XXXX
* DRAWING WHERE DETAIL VIEW IS CUT
* DRAWING WHERE DETAIL VIEW IS SHOWN

DETAIL
BAR SCALE GOES HERE

SECTION LETTER
X
XXXX
* DRAWING WHERE SECTION VIEW IS SHOWN
* DRAWING WHERE SECTION VIEW IS CUT

SECTION CUT MARKER

SECTION LETTER
X
XXXX
* DRAWING WHERE SECTION VIEW IS CUT
* DRAWING WHERE SECTION VIEW IS SHOWN

SECTION
BAR SCALE GOES HERE

ELEVATION LETTER
X
XXXX
ARROW INDICATES POINT OF VIEW
* DRAWING WHERE ELEVATION VIEW IS SHOWN
* DRAWING WHERE ELEVATION VIEW IS CUT

ELEVATION MARKER

ELEVATION LETTER
X
XXXX
* DRAWING WHERE ELEVATION VIEW IS CUT
* DRAWING WHERE ELEVATION VIEW IS SHOWN

ELEVATION
BAR SCALE GOES HERE

* NUMBER IS REPLACED BY A LINE (-). DETAIL ARE SHOWN ON SAME DRAWING, DRAWING NUMBER IS REPLACED BY A LINE (-).

MATERIALS IN PLAN/SECTION

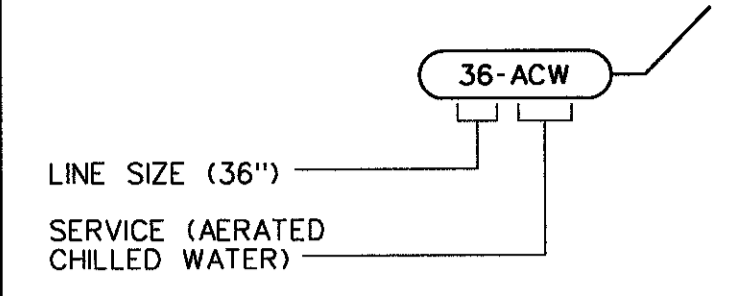
- ⊗ GRAVEL/ROCK, TYPE AS NOTED (PLAN/SECTION)
- ⊗ BED ROCK OR EXISTING GRADE (SECTION)
- ⊗ SOIL (SECTION)
- ⊗ CONCRETE (SECTION/PLAN)
- ⊗ SAND, GROUT OR AS NOTE (PLAN/SECTION)
- ⊗ CONCRETE MASONRY (SECTION)
- ⊗ WOOD, SIZE/TYPE AS NOTED (PLAN)
- ⊗ WOOD, SIZE/TYPE AS NOTED (SECTION)
- ⊗ RIP RAP (PLAN/SECTION)
- ⊗ RIGID INSULATION (SECTION)
- ⊗ STRUCTURE (PLAN/SECTION)
- ⊗ ASPHALT CONCRETE PAVEMENT SURFACE (PLAN)
- ⊗ BATT INSULATION (SECTION)

GENERAL NOTES:

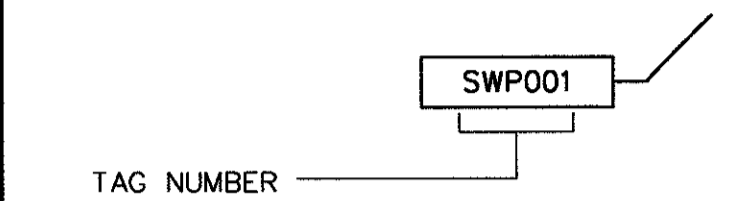
- ALL SYMBOLS ARE NOT NECESSARILY USED THIS IS A STANDARD DRAWING SHOWING COMMON ON THIS PROJECT.
- SCREENING OR SHADING OF WORK IS USED TO INDICATE EXISTING COMPONENTS OR TO DE-EMPHASIZE PROPOSED IMPROVEMENTS TO HIGHLIGHT SELECTED TRADE WORK. REFER TO CONTEXT OF EACH DRAWING FOR USAGE.
- SEE PROJECT EQUIPMENT AND PIPING SYSTEMS DRAWING FOR SYMBOLS AND ABBREVIATIONS SPECIFIC TO THE PROJECT.

IDENTIFICATION SYMBOLOGY

PIPING TAG:



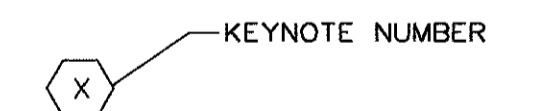
EQUIPMENT TAG:



MISCELLANEOUS SYMBOLS

- G 6 GATE NUMBER
- GR 1 GUARDRAIL
- S 6 SCREEN NUMBER
- BG 6 BAR GRATE NUMBER
- 1 WALL TYPE
- SL 6 STOPLOG NUMBER
- F FIRE EXTINGUISHER
- 27 ROOM NUMBER
- 27 DOOR NUMBER
- 6 WINDOW NUMBER
- L 6 LOUVER NUMBER
- EF EXHAUST FAN

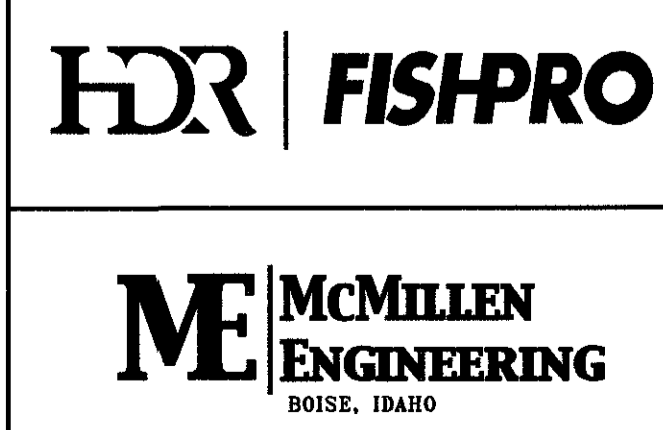
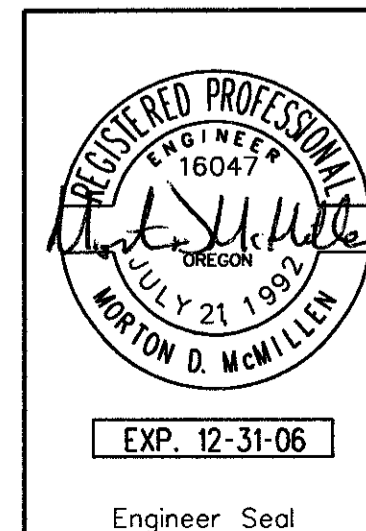
KEYNOTE DESIGNATION



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C-CONTRACT CONSTR., FA-FORCE ACCOUNT CONSTR., R-RECORD FILE NAME: ISF_G-3.dwg					

Design	M. McMILLEN
Drawn	R. GUERRERO
Chkd	S. SPICKELMIER
Sub	
Rec	
Rec	
Appr	
Date	

UNITED STATES DEPARTMENT OF ENERGY BONNEVILLE POWER ADMINISTRATION HEADQUARTERS, PORTLAND, OREGON				
NORTHEAST OREGON HATCHERY PROGRAM IMNAHA SATELLITE FACILITY				
STANDARD SYMBOLS				
SERIAL	SOURCE	SHEET NO.	SHEET	REVISION
		G3	OF	



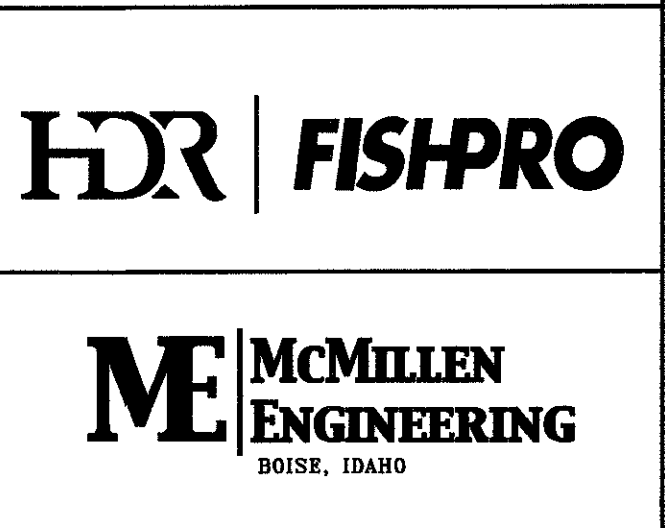
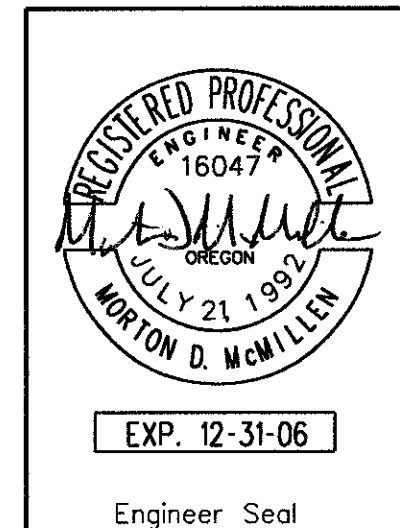
Main table of abbreviations and their definitions, organized in columns. Includes terms like AIR CONDITIONING, ARCHITECT/ENGINEER, ANCHOR BOLT, etc.

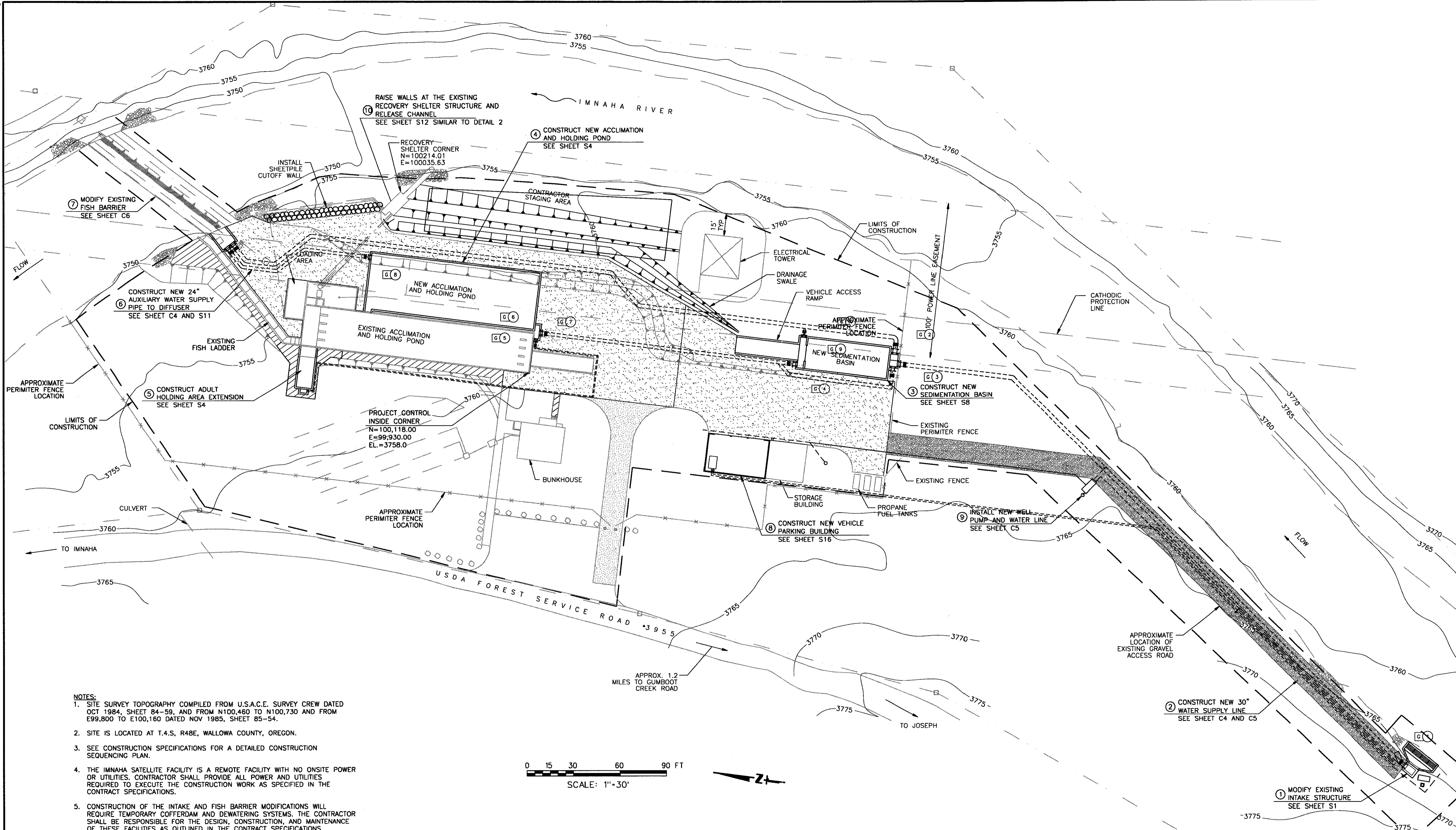
Table of abbreviations and their definitions, continuing from the main table. Includes terms like TOP AND BOTTOM, TONGUE AND GROOVE, TILE, TREAD, etc.

Table of abbreviations and their definitions, continuing from the main table. Includes terms like VENT, VELOCITY, VOLT, VOLT AMPERE, etc.

- GENERAL NOTES:
1. THESE ABBREVIATIONS APPLY TO THE ENTIRE SET OF CONTRACT DRAWINGS.
2. LISTING OF ABBREVIATIONS DOES NOT IMPLY ALL ABBREVIATIONS ARE USED IN THE CONTRACT DRAWINGS.
3. ABBREVIATIONS SHOWN ON THIS DRAWING INCLUDE VARIATIONS OF THE WORD. FOR EXAMPLE, "MOD" MAY MEAN MODIFY OR MODIFICATION; "INC" MAY MEAN INCLUDED OR INCLUDING; "REINF" MAY MEAN EITHER REINFORCE OR REINFORCING.
4. SCREENING OR SHADING OF WORK IS USED TO INDICATE EXISTING COMPONENTS OR TO DE-EMPHASIZE PROPOSED IMPROVEMENTS TO HIGHLIGHT SELECTED TRADE WORK.

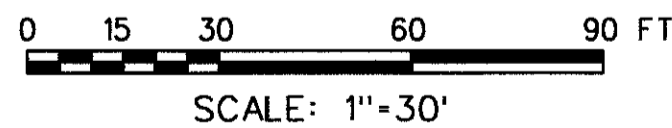
Table with project information including NO., W/O, COMPUTER, REVISION, ONLY, BY, DATE, APPROVED. Includes project name: BONNEVILLE POWER ADMINISTRATION, NORTHEAST OREGON HATCHERY PROGRAM, IMNAHA SATELLITE FACILITY.



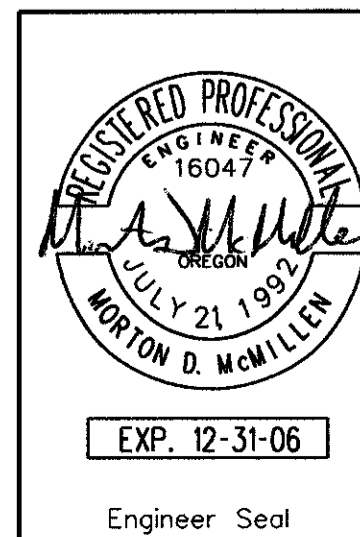


NOTES:

- SITE SURVEY TOPOGRAPHY COMPILED FROM U.S.A.C.E. SURVEY CREW DATED OCT 1984, SHEET 84-59, AND FROM N100,460 TO N100,730 AND FROM E99,800 TO E100,160 DATED NOV 1985, SHEET 85-54.
- SITE IS LOCATED AT T.4.S, R48E, WALLOWA COUNTY, OREGON.
- SEE CONSTRUCTION SPECIFICATIONS FOR A DETAILED CONSTRUCTION SEQUENCING PLAN.
- THE IMNAHA SATELLITE FACILITY IS A REMOTE FACILITY WITH NO ONSITE POWER OR UTILITIES. CONTRACTOR SHALL PROVIDE ALL POWER AND UTILITIES REQUIRED TO EXECUTE THE CONSTRUCTION WORK AS SPECIFIED IN THE CONTRACT SPECIFICATIONS.
- CONSTRUCTION OF THE INTAKE AND FISH BARRIER MODIFICATIONS WILL REQUIRE TEMPORARY COFFERDAM AND DEWATERING SYSTEMS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DESIGN, CONSTRUCTION, AND MAINTENANCE OF THESE FACILITIES AS OUTLINED IN THE CONTRACT SPECIFICATIONS.
- THE CONTRACTOR SHALL WORK WITHIN THE LIMITS OF CONSTRUCTION SHOWN. WORK ACTIVITIES SHALL BE CONFINED TO THE EXISTING DISTURBED AREA CONTAINED WITHIN THE IMNAHA SATELLITE FACILITY. NO CLEARING, TREE REMOVAL, OR GENERAL WORK ACTIVITIES SHALL OCCUR OUTSIDE THE IDENTIFIED LIMITS OF CONSTRUCTION.
- THE CONTRACTOR SHALL MAINTAIN THE EXISTING TRAPPING AND ACCLIMATION FACILITY IN OPERATION DURING CONSTRUCTION. SEE THE CONSTRUCTION SPECIFICATIONS FOR A DETAILED CONSTRUCTION SEQUENCE AND FACILITY OPERATION SCHEDULE.

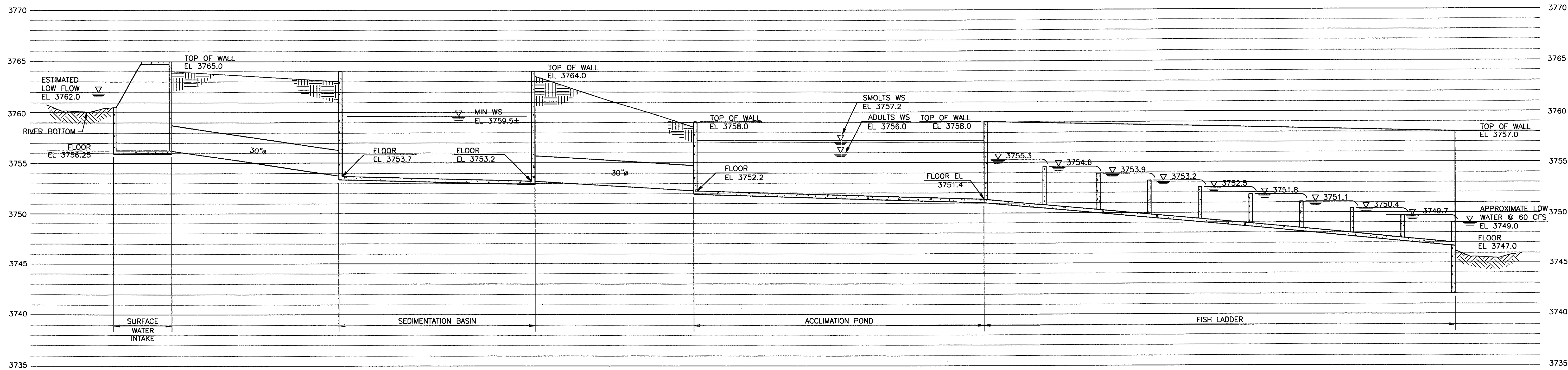


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Drawn	R. GUERRERO	NORTHEAST OREGON HATCHERY PROGRAM IMNAHA SATELLITE FACILITY					
Chkd	S. SPICKELMIER	OVERALL PROJECT PLAN AND CONTRACTOR STAGING					
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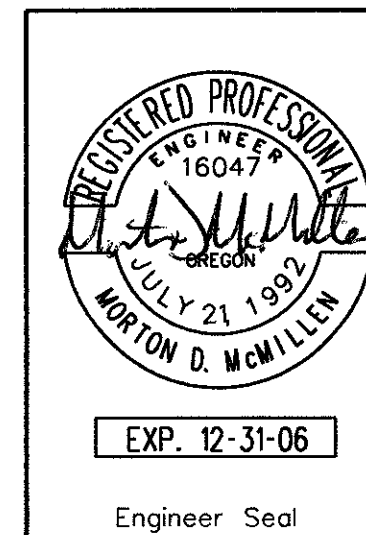


HDR | FISHPRO

ME | McMILLEN ENGINEERING
BOISE, IDAHO



HYDRAULIC PROFILE



HDR | FISHPRO

ME | McMILLEN ENGINEERING
BOISE, IDAHO

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C-CONTRACT CONSTR., FA-FORCE ACCOUNT CONSTR., R-RECORD FILE NAME: ISF_G-6.dwg							
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Drawn	R. GUERRERO	NORTHEAST OREGON HATCHERY PROGRAM IMNAHA SATELLITE FACILITY					
Chkd	M. McMILLEN	HYDRAULIC PROFILE AND DESIGN CRITERIA					
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