DESIGN NOTES

DESIGN SPECIFICATIONS

"AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS" XX EDITION AND (MONTH)(YEAR) ITD BRIDGE DESIGN LRFD MANUAL, AND AASHTO/AWS "BRIDGE WELDING CODE" D1.5.

DESIGN PROCEDURES

DECK DESIGNED USING EMPIRICAL METHOD. RAILING IN ACCORDANCE WITH MASH TL-x.
DESIGN SPEED IS _ mph.
ABUTMENT/PIER DESIGNED TO RESIST THE VEHICULAR COLLISION FORCE.
PROPRIETARY COMPUTER SOFTWARE PROGRAMS USED TO FACILITATE THE DESIGN:

NAME	VERSION	RELEASE DATE	NAME	VERSION	RELEASE DATE

DESIGN LOADS

PERMANENT LOADS

DC	UNIT WEIGHT OF REINFORCED CONCRETE	0.150 kcf
	UNIT WEIGHT OF STRUCTURAL STEEL	0.490 kcf
	METAL DECK FORMS	xxx ksf
	42" SINGLE SLOPE CONCRETE PARAPET	0.518 klf/SIDE
DW	INITIAL WEARING SURFACE	0.028 ksf
	FUTURE WEARING SURFACE	0.028 ksf
	UTILITIES	xxx klf/GIRDER
	FUTURE UTILITIES	xxx klf/GIRDER
EV	UNIT WEIGHT OF SOIL	xxx kcf
EH	ACTIVE PRESSURE	xxx kcf
	AT REST PRESSURE	xxx kcf

TRANSIENT LOADS

LL	HL-93 INCLUDING PAIR OF DESIGN TANDEMS IN ACCORDANCE WITH "AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS" ARTICLE 3.6.1.3	
IM	DYNAMIC ALLOWANCE APPLIED TO TRUCK & TANDEM	
LS	LIVE LOAD SURCHARGE AT ABUTMENT	xxx feet
	LIVE LOAD SURCHARGE AT WINGWALL	xxx feet
TU	UNIFORM TEMPERATURE RANGE	-30° F TO 120° F
	BASE SETTING TEMPERATURE	60° F

EXTREME EVENT LOADS

EQ	SITE CLASS	x
	ACCELERATION COEFFICIENT S_{D1}	0.xx g
	SEISMIC PERFORMANCE ZONE	X
CT	VEHICULAR COLLISION FORCE	600 k
IC	ICE CRUSHING STRENGTH	xxx ksf
	ICE THICKNESS	x.xx feet

GENERAL NOTES

MATERIALS, CONSTRUCTION AND WORKMANSHIP IN ACCORDANCE WITH THE STATE OF IDAHO TRANSPORTATION DEPARTMENT: (YEAR) STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION, (YEAR) SUPPLEMENTAL SPECIFICATIONS, SPECIAL PROVISIONS, AND THE PROJECT PLANS.

MATERIALS

CONCRETE:	DECK SLAB AND PARAPET - CLASS 40AF	f'c= 4.0 ksi
	ABUTMENTS AND WINGWALLS - CLASS 40A	f'c= 4.0 ksi
METAL REINFORCEMENT: AASHTO M31, GRADE 60		fy= 60 ksi
STRUCTURAL STEEL: ASTM A709 GRADE 50W		fy= 50 ksi
	BASE METAL & WELD METAL CHARPY V-NOTCH TEMPERATURE ZONE 3.	

HIGH STRENGTH BOLTS: ASTM F3125 GRADE A325 TYPE 3
CARBON STEEL BOLTS: ASTM A307

PLAN DIMENSIONS AND ELEVATIONS

BEVEL EXPOSED EDGES OF CONCRETE ¾" UNLESS NOTED OTHERWISE.
DIMENSIONS TO REINFORCING STEEL ARE TO CENTERLINE OF BAR UNLESS NOTED OTHERWISE.
PROVIDE 2" CONCRETE COVER MEASURED FROM THE FACE OF THE CONCRETE TO THE FACE OF ANY REINFORCING BAR, UNLESS SHOWN OTHERWISE ON THE DRAWINGS.
PROVIDE REINFORCING STEEL SPLICE LENGTHS IN ACCORDANCE WITH AASHTO SPECIFICATIONS.

CONSTRUCTION

EPOXY-COATED REINFORCEMENT IS DESIGNATED BY AN (E) AFTER THE BAR MARK.
GLASS FIBER REINFORCED POLYMER REINFORCEMENT IS DESIGNATED BY A (G) AFTER THE BAR MARK.
PROVIDE CONSTRUCTION JOINTS ONLY AT THE LOCATIONS SHOWN ON THE PLANS OR AS APPROVED.
PERMANENT METAL DECK SLAB FORMS MAY BE USED AT CONTRACTOR'S OPTION.
PROTECT SURFACES OF THE SUBSTRUCTURE EXCEPT WINGWALLS EXPOSED ON THE COMPLETED STRUCTURE TO PREVENT STAINING WITH PLASTIC SHEETS OR OTHER APPROVED METHODS UNTIL DECK PLACEMENT IS COMPLETED AND GIRDERS ARE BLAST CLEANED.
PROVIDE WELDS IN ACCORDANCE WITH AASHTO/AWS D1.5 AND INTERIM REVISIONS.
ELEVATIONS ARE BASED ON NAVD 88 DATUM.

INCIDENTAL ITEMS

WORK NECESSARY TO FULFILL THE CONTRACT THAT IS NOT MEASURED OR PAID FOR SEPARATELY.

MASS CONCRETE PLACEMENT

SUBMIT A THERMAL CONTROL PLAN IN ACCORDANCE WITH 502.03.F.4 FOR THE FOLLOWING MASS CONCRETE ELEMENTS:

XXX
YYY
ZZZ

REVISIONS			
NO.	DATE	BY	DESCRIPTION
1			
2			
3			
4			
5			

DESIGNED
DESIGN CHECKED
DETAILED
DWG. CHECKED
CORRECTIONS

SCALES SHOWN ARE FOR 11" X 17" PRINTS ONLY
CADD FILE NAME
Standards\Bridge Standard Drawings\B17_1B.DGN
DRAWING DATE: DEC 2024

IDAHO TRANSPORTATION DEPARTMENT
YOUR Safety→YOUR Mobility→YOUR Economic Opportunity
APPROVED BY: BRIDGE ENGINEER MICHAEL T. JOHNSON DATE: _____

ENGLISH
PROJECT NO.

DESIGN AND GENERAL NOTES - SHEET 1

WEATHERING STEEL GIRDER BRIDGE
BRIDGE LRFD DESIGN MANUAL, B17.1B

BRIDGE PLANS
BRIDGE KEY NO.
COUNTY | KEY NO.
BRIDGE DWG. NO. | SHEET OF