



# TOWN OF JACKSON PLANNING & BUILDING DEPARTMENT

## TRANSMITTAL MEMO

**Town of Jackson**

- Public Works/Engineering
- Building
- Title Company
- Town Attorney
- Police

**Joint Town/County**

- Parks and Recreation
- Pathways
- Housing Department

**Teton County**

- Planning Division

- Engineer
- Surveyor- *Nelson*
- Assessor
- Clerk and Recorder
- Road and Levee

**State of Wyoming**

- Teton Conservation
- WYDOT
- TC School District #1
- Game and Fish
- DEQ

**Federal Agencies**

- Army Corp of Engineers

**Utility Providers**

- Qwest
- Lower Valley Energy
- Bresnan Communications

**Special Districts**

- START
- Jackson Hole Fire/EMS
- Irrigation Company

Date: August 23, 2021	<b>REQUESTS:</b>
Item #: P21-228	The applicant is submitting a request for a Pre-Application meeting for improvements at the Teton County/Jackson Recreation Center located at 155 E Gill Ave., PT. SW1/4SW1/4 SEC. 27, TWP. 41, RNG. 116 PARCEL A & PARCEL B PIDN: 22-41-16-27-3-00-017 For questions, please call Tyler Valentine at 307-733-0440, x1305 or email to the address shown to the left. Thank you.
Planner: Tyler Valentine	
Phone: 733-0440 ext. 1305	
Email: <a href="mailto:tvalentine@jacksonwy.gov">tvalentine@jacksonwy.gov</a>	
<b>Owner:</b> Town of Jackson PO Box 1687 Jackson, WY 83001	
<b>Applicant:</b> Jason Berning/Berning Project Mgmt PO Box 485 Victor, ID 83455	
<b>Please respond by: September 13, 2021 (with Comments)</b>	

**Owner:**

Town of Jackson  
PO Box 1687  
Jackson, WY 83001

**Applicant:**

Jason Berning/Berning Project Mgmt  
PO Box 485  
Victor, ID 83455

The applicant is submitting a request for a Pre-Application meeting for improvements at the Teton County/Jackson Recreation Center located at 155 E Gill Ave., PT. SW1/4SW1/4 SEC. 27, TWP. 41, RNG. 116 PARCEL A & PARCEL B PIDN: 22-41-16-27-3-00-017

For questions, please call Tyler Valentine at 307-733-0440, x1305 or email to the address shown to the left. Thank you.

**RESPONSE:** For Departments not using Trak-it, please send responses via email to:  
[alangley@jacksonwy.gov](mailto:alangley@jacksonwy.gov)

# Pre-Application Conference Request (PAP)

**Teton County / Jackson Recreation Center Improvements**  
**155 E. Gill Avenue**  
**Jackson, Wyoming 83001**

**August 20, 2021**



[www.tetonparksandrec.org](http://www.tetonparksandrec.org)

PO Box 811  
Jackson, WY 83001

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**PRE-APPLICATION CONFERENCE REQUEST (PAP)**  
Planning & Building Department

150 E Pearl Ave. ph: (307) 733-0440 fax:  
P.O. Box 1687 [www.townofjackson.com](http://www.townofjackson.com)  
Jackson, WY 83001

***For Office Use Only***

Fees Paid \_\_\_\_\_

Time & Date Received \_\_\_\_\_

Application # \_\_\_\_\_

***Please note:*** Applications received after 3 PM will be processed the next business day.

**APPLICABILITY.** This application should be used when applying for a **Pre-application Conference**. The purpose of the pre-application conference is to identify the standards and procedures of these LDRs that would apply to a potential application prior to preparation of the final proposal and to identify the submittal requirements for the application.

For additional information go to [www.townofjackson.com/204/Pre-Application](http://www.townofjackson.com/204/Pre-Application)

**PROJECT.**

Name/Description: \_\_\_\_\_

Physical Address: \_\_\_\_\_

Lot, Subdivision: \_\_\_\_\_

PIDN: \_\_\_\_\_

**PROPERTY OWNER.**

Name: \_\_\_\_\_

Phone: \_\_\_\_\_

Mailing Address: \_\_\_\_\_

ZIP: \_\_\_\_\_

E-mail: \_\_\_\_\_

**APPLICANT/AGENT.**

Name, Agency: \_\_\_\_\_

Phone: \_\_\_\_\_

Mailing Address: \_\_\_\_\_

ZIP: \_\_\_\_\_

E-mail: \_\_\_\_\_

**DESIGNATED PRIMARY CONTACT.**

Property Owner

Applicant/Agent

**ENVIRONMENTAL PROFESSIONAL.** For EA pre-application conferences, a qualified environmental consultant is required to attend the pre-application conference. Please see Subsection 8.2.2.C, Professional Preparation, of the Land Development Regulations, for more information on this requirement. Please provide contact information for the Environmental Consultant if different from Agent.

Name, Agency: \_\_\_\_\_ Phone: \_\_\_\_\_  
Mailing Address: \_\_\_\_\_ ZIP: \_\_\_\_\_  
E-mail: \_\_\_\_\_

**TYPES OF PRE-APPLICATION NEEDED.** Check all that apply; see Section 8.1.2 of the LDRs for a description of review process types.

Physical Development Permit  
 Use Permit  
 Development Option or Subdivision Permit  
 Interpretations of the LDRs  
 Amendments to the LDRs  
 Relief from the LDRs  
 Environmental Analysis

**This pre-application conference is:**  
 Required  
 Optional  
 For an Environmental Analysis  
 For grading

**SUBMITTAL REQUIREMENTS.** Please ensure all submittal requirements are included. The Planning Department will not hold or process incomplete applications. Provide **one electronic copy** (via email to [tstolte@jacksonwy.gov](mailto:tstolte@jacksonwy.gov)) of the submittal packet.

Have you attached the following?

**Application Fee.** Go to [www.townofjackson.com/204/Pre-Application.com](http://www.townofjackson.com/204/Pre-Application.com) for the fees.

**Notarized Letter of Authorization.** A notarized letter of consent from the landowner is required if the applicant is not the owner, or if an agent is applying on behalf of the landowner. Please see the Letter of Authorization template at [www.townofjackson.com/DocumentCenter/View/102/Town-Fee-Schedule-PDF](http://www.townofjackson.com/DocumentCenter/View/102/Town-Fee-Schedule-PDF).

**Narrative Project Description.** Please attach a short narrative description of the project that addresses:

Existing property conditions (buildings, uses, natural resources, etc)  
 Character and magnitude of proposed physical development or use  
 Intended development options or subdivision proposal (if applicable)  
 Proposed amendments to the LDRs (if applicable)

**Conceptual Site Plan.** For pre-application conferences for physical development, use or development option permits, a conceptual site plan is required. For pre-application conferences for interpretations of the LDRs, amendments to the LDRs, or relief from the LDRs, a site plan may or may not be necessary. Contact the Planning Department for assistance. If required, please attach a conceptual site plan that depicts:

Property boundaries  
 Existing and proposed physical development and the location of any uses not requiring physical development  
 Proposed parcel or lot lines (if applicable)  
 Locations of any natural resources, access, utilities, etc that may be discussed during the pre-application conference

**Grading Information (REQUIRED ONLY FOR GRADING PRE-APPS).** Please include a site survey with topography at 2-foot contour intervals and indicate any areas with slopes greater than 25% (or 30% if in the NC Zoning District), as well as proposed finished grade. If any areas of steep slopes are man-made, please identify these areas on the site plan.

**Other Pertinent Information.** Attach any additional information that may help Staff in preparing for the pre-app or identifying possible key issues.

Under penalty of perjury, I hereby certify that I have read this application and state that, to the best of my knowledge, all information submitted in this request is true and correct. I agree to comply with all county and state laws relating to the subject matter of this application, and hereby authorize representatives of Teton County to enter upon the above-mentioned property during normal business hours, after making a reasonable effort to contact the owner/applicant prior to entering.

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Signature of Owner or Authorized Applicant/Agent

---

Date

---

Name Printed

---

Title

## LETTER OF AUTHORIZATION

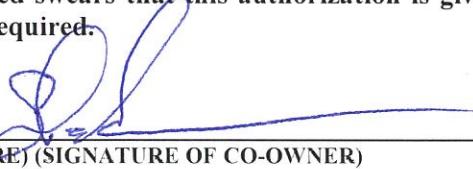
Teton County / Jackson Parks and Recreation \_\_\_\_\_, "Owner" whose address is: PO Box 811  
Jackson, WY 83001

(NAME OF ALL INDIVIDUALS OR ENTITY OWNING THE PROPERTY)  
Town of Jackson, Wyoming \_\_\_\_\_, as the owner of property  
more specifically legally described as: \_\_\_\_\_  
22-41-16-27-3-00-017 / PT. SW1/4SW1/4 SEC. 27, TWP. 41, RNG. 116 PARCEL A & B

(If too lengthy, attach description)

HEREBY AUTHORIZES Jason Berning \_\_\_\_\_ as agent to represent and act for Owner in making application for and receiving and accepting on Owners behalf, any permits or other action by the Town of Jackson, or the Town of Jackson Planning, Building, Engineering and/or Environmental Health Departments relating to the modification, development, planning or replatting, improvement, use or occupancy of land in the Town of Jackson. Owner agrees that Owner is or shall be deemed conclusively to be fully aware of and to have authorized and/or made any and all representations or promises contained in said application or any Owner information in support thereof, and shall be deemed to be aware of and to have authorized any subsequent revisions, corrections or modifications to such materials. Owner acknowledges and agrees that Owner shall be bound and shall abide by the written terms or conditions of issuance of any such named representative, whether actually delivered to Owner or not. Owner agrees that no modification, development, platting or replatting, improvement, occupancy or use of any structure or land involved in the application shall take place until approved by the appropriate official of the Town of Jackson, in accordance with applicable codes and regulations. Owner agrees to pay any fines and be liable for any other penalties arising out of the failure to comply with the terms of any permit or arising out of any violation of the applicable laws, codes or regulations applicable to the action sought to be permitted by the application authorized herein.

Under penalty of perjury, the undersigned swears that the foregoing is true and, if signing on behalf of a corporation, partnership, limited liability company or other entity, the undersigned swears that this authorization is given with the appropriate approval of such entity, if required.

OWNER: 



(SIGNATURE) (SIGNATURE OF CO-OWNER)

Title: DIRECTOR

(if signed by officer, partner or member of corporation, LLC (secretary or corporate owner) partnership or other non-individual Owner)

STATE OF Wyoming \_\_\_\_\_ )

)SS.

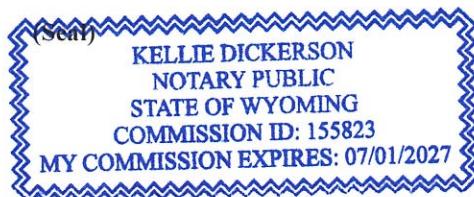
COUNTY OF Teton \_\_\_\_\_ )

)

The foregoing instrument was acknowledged before me by Steve Ashworth this 18 day of August, 2021.

WITNESS my hand and official seal.

Kellie Dickerson  
(Notary Public)  
My commission expires: 7/1/2027





August 20, 2021

Paul Anthony  
Planning Director, Jackson Planning Department  
150 E Pearl Ave / P.O. Box 1687  
Jackson, WY 83001

RE: Pre-Application–Teton County / Jackson Recreation Center Improvements, 155 E. Gill Ave.

Dear Paul,

Please accept this Pre-Application Conference Request (“PAP”) for the improvements for the Teton County / Jackson Recreation Center (“TCJRC”) on 155 East Gill Avenue. The purpose of the PAP is to meet the requirements for Physical Development Permit in advance of submitting for final development permit, currently scheduled for late 2021 to pave way for building permit application in the spring and construction in summer of 2022. We also are requesting feedback from the Town of Jackson staff, on the concept design drawings and narrative. The following materials propose improvements to TCJRC utilizing current Town of Jackson Land Development Regulations and which honors the goals of the expansion from the SPET ballot initiative.

The TCJRC is an important public facility constructed in 1994. The facility serves a wide array of residents and guests throughout the community. TCJRC provides recreational, social and wellness programs, and services for the average of 60,000 unique visitors per year. In November of 2019 voters of Teton County and the Town of Jackson approved a ballot to expand our facility to increase these offerings to include wellness and fitness, indoor walking and jogging, indoor climbing, drop-in day care, an addition gymnasium, outdoor aquatic splash pad, and associated space to support these services. In addition, the project was approved to complete the Cache tube stormwater connection, develop the extension of King Street from Gill Ave. north in a complete streets format, and provide infrastructure for stormwater treatment for the Town of Jackson. The project will further assist the department in the delivery of our mission “to serve the community through safe and enjoyable parks and recreation opportunities”, and the general purpose of the Recreation Center to provide, maintain and manage quality of life programs and resources that encourage healthy lifestyles, social and cultural engagement, and community pride according to the needs of our residents and guests.

TCJRC has made great strides toward designing and building the expanded recreation center. We have brought on a stellar project team that consists of Perkins & Will / Hoyt Architects, Jorgensen Engineering, Entre-Prise Climbing Design/Build Consultant, GE Johnson Construction Wyoming, and Wember / Berning Project Management. The building design responds to ongoing community engagement outreach including community stakeholder groups, online surveys and public open houses. TCJRC will continue to reach out to surrounding neighbors in the coming months and schedule focused meetings with community stakeholders through the fall.

As part of the Pre-Application Conference Request, TCJRC requests a waiver of all fees on the project included in Resolution 1998 Fee Waiver for Public Projects. We look forward to meeting with TOJ staff and appreciate your support in reviewing the pre-application documents for TCJRC. If you have any questions, please feel free to reach out to me as the main point of contact for TCJRC related to entitlements.

Sincerely,



Jason Berning, P.E. / LEED AP  
Berning Project Management, LLC  
Owner's Representative / Project Manager



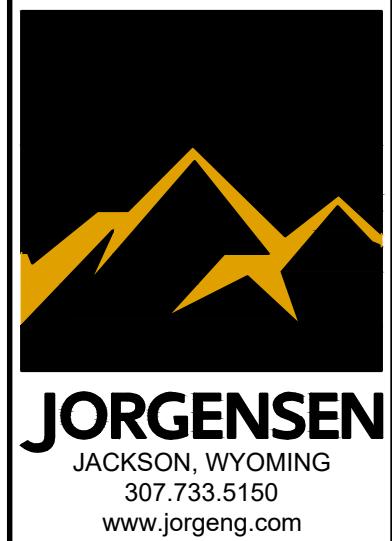
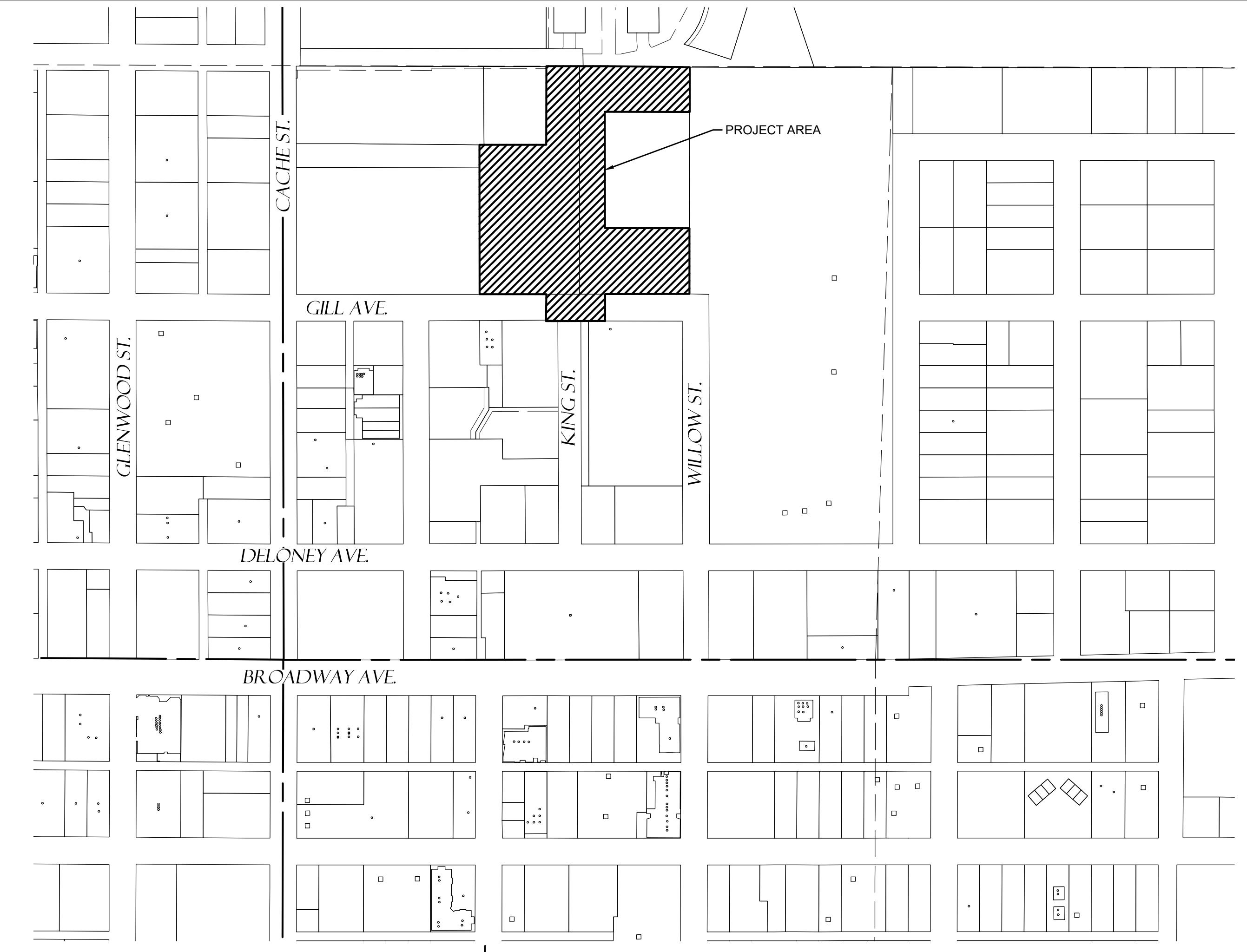
Steve Ashworth  
Executive Director  
Teton County/Jackson Parks & Rec.

# TETON COUNTY/ TOWN OF JACKSON, RECREATION CENTER REDEVELOPMENT

Plotted by Jorgenson on Aug 10, 2021, 3:48pm

Ver. 1.0

LOCATED WITHIN  
SW<sup>1</sup>/<sub>4</sub> SECTION 27,  
T41N, R116W, 6TH P.M.  
TETON COUNTY, WYOMING



PROJECT TITLE:  
TETON COUNTY/ JACKSON RECREATION  
CENTER REDEVELOPMENT

## Sheet List Table

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C1.0	TITLE, VICINITY MAP & SHEET INDEX
C1.1	PROJECT NOTES & LEGEND
C2.0	SITE OVERVIEW
C3.0	CACHE CREEK TUBE REALIGNMENT
C3.1	CACHE CREEK TUBE REALIGNMENT
C4.0	PROPOSED WATER MAIN
C4.1	PROPOSED WATER MAIN
C5.0	CCT VAULT DETAILS
C5.1	CCT VAULT DETAILS
C5.2	CCT VAULT DETAILS
C5.3	CCT VAULT DETAILS
C6.0	WATER DETAILS

DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C1.0

**OWNER**  
Teton County/ Town of Jackson  
450 W. Snow King Ave.  
PO Box 1687  
Jackson, WY 83001  
(307)739-3079



**ENGINEER, SURVEYOR,  
AND LAND USE PLANNER**  
Jorgenson Associates, P.C.  
1315 S. Highway 89, #201  
P.O. Box 9550  
Jackson, WY 83002-9550  
(307) 733-5150



**JORGENSEN**



## LEGEND

EXISTING	PROPOSED	
_____	_____	BOUNDARY, EASEMENT, AS NOTED
-----	_____	EDGE OF ROAD
_____	_____	GUTTERLINE
-----	_____	EDGE OF CURB
-----	_____	EDGE OF SIDEWALK/BIKE PATH
-----	-----	EDGE OF GRAVEL
-----	-----	EDGE OF BUILDING ENVELOPE
8"W	_____	WATERLINE (SIZE IN LINETYPE)
W	W	WATER SERVICE LINE
s	8"S	SANITARY SEWER LINE
<b>S</b>	8"S	SANITARY SEWER CONNECTION LINE
stm	STM	STORM SEWER LINE
UT	_____	ELECTRIC LINE
UT	_____	UTILITY LINE
OH	_____	OVERHEAD POWER
○	○	FENCE, WOOD POST & RAIL
6230	-	INDEX CONTOUR (5' INTERVAL)
6231	_____	INTERMEDIATE CONTOUR (1' INTERVAL)
[T]	_____	TELEPHONE PEDESTAL
[FO]	_____	FIBER OPTIC VAULT
[TV]	_____	BROADBAND VAULT
[G]	_____	NATURAL GAS VALVE
[G]	_____	GAS SERVICE
[]	_____	ELECTRIC JUNCTION BOX
[]	_____	ELECTRIC METER/SERVICE
[E]	_____	ELECTRIC POWER TRANSFORMER
[E]	_____	ELECTRIC UTILITY VAULT
	_____	UTILITY POLE
○	_____	GUY ANCHOR
○	_____	SANITARY SEWER CLEANOUT
(S)	(S)	SANITARY SEWER MANHOLE
+	+	SANITARY SEWER CONNECTION
()	[=]	STORM DRAIN INLET
(D)	(D)	STORM DRAIN MANHOLE
	_____	HYDRANT, FIRE PROTECTION
	_____	WATER CURBSTOP
	_____	WATER SERVICE W/CURBSTOP AND BA
	_____	SPIGOT
	_____	WATER VALVE
[TSC]	_____	TRAFFIC SIGNAL CONTROL VAULT
(MW 1)	_____	MONITORING WELL
—	_____	SIGN, TRAFFIC REGULATORY OR INFOR
	_____	LIGHT POLE
	_____	TREE, DECIDUOUS

## PROJECT NOTES:

## PROJECT SCOPE: RELOCATION FROM PRIVATE LANDS AND INCREASING CAPACITY OF THE CACHE CREEK TUBE FROM EAST JACKSON TO THE OUTFALL ON NORTH GLENWOOD ST

1. PROJECT SCHEDULE: CONSTRUCTION OF CACHE CREEK TUBE PHASE 2D TO BEGIN SPRING 2021 AND BE COMPLETED SUMMER 2021.

## **SURVEY NOTES:**

1. THE ORIGINAL TOPOGRAPHIC SURVEY WAS PERFORMED BY JORGENSEN ASSOCIATES, P.C. DURING JUNE THROUGH SEPTEMBER 2018 AND PREPARED UNDER THE DIRECTION OF MATTHEW P. GOTHAM, WYOMING PLS 13002. ADDITIONAL BASE MAPPING OBTAINED BY SURVEYS PERFORMED BY JORGENSEN ASSOCIATES, P.C. IN 2014 AND 2017 UNDER THE DIRECTION OF KENNETH G. MAGRATH, WYOMING PLS 8469.
2. LOCATIONS OF UTILITIES DEPICTED HEREON ARE LIMITED TO VISIBLE STRUCTURES; UNDERGROUND LOCATIONS MUST BE VERIFIED PRIOR TO ANY CONSTRUCTION ACTIVITY.
3. HORIZONTAL COORDINATES ARE SCALED TO GROUND FROM NAD 83 STATE PLANE, WYOMING WEST ZONE
4. VERTICAL DATUM IS NAVD 88.

## **GENERAL CONSTRUCTION NOTES & SPECIFICATIONS:**

1. ALL SITE WORK SHALL BE PERFORMED IN ACCORDANCE WITH THE 2015 EDITION OF WYOMING PUBLIC WORKS STANDARD SPECIFICATIONS, THE TOWN OF JACKSON LAND DEVELOPMENT REGULATIONS, CODE, AND CONSTRUCTION STANDARDS (CURRENT EDITION), AND AS MODIFIED BY THESE PLANS AND SPECIFICATIONS. WHERE CONFLICTS BETWEEN THE DOCUMENTS ARE ENCOUNTERED, THE MORE STRINGENT INTERPRETATION SHALL APPLY.
2. CONTRACTOR SHALL VERIFY ALL DIMENSIONS IN THE FIELD AND SHALL PROMPTLY NOTIFY THE ENGINEER OF ANY VARIATIONS OR DISCREPANCIES.
3. THE CONTRACTOR SHALL PROTECT ALL EXISTING SURVEY MONUMENTATION DESIGNATED TO REMAIN, FROM ANY DAMAGE DURING CONSTRUCTION OPERATIONS. ANY EXISTING MONUMENTS DISTURBED BY THE CONTRACTOR SHALL BE RESET BY A WYOMING LICENSED PROFESSIONAL SURVEYOR AT THE CONTRACTOR'S OWN EXPENSE. THE CONTRACTOR AND ENGINEER SHALL NOTE THOSE MONUMENTS IN THE FIELD PRIOR TO CONSTRUCTION.
4. CONTRACTOR SHALL REMOVE ALL MATERIALS, TOOLS, EQUIPMENT, AND CONSTRUCTION DEBRIS FROM THE SITE IMMEDIATELY AFTER COMPLETION OF THE WORK TASK. NO CONSTRUCTION DEBRIS SHALL BE DISPOSED OF AT THE WORK SITE.
5. CONTRACTOR SHALL ACTIVELY MINIMIZE THE AMOUNT OF DUST DEBRIS, AND NOXIOUS FUMES INTO THE AIR. BURNING WILL NOT BE PERMITTED AS A MEANS OF DISPOSAL OR CLEANING AT THE SITE. FUGITIVE DUST WILL BE CONTROLLED BY WATERING DURING DRY PERIODS OR AS REQUIRED BY ENGINEER.
6. CONTRACTOR SHALL MAKE EVERY EFFORT TO MINIMIZE DISTURBANCE OF PRIVATE PROPERTY BY HIS OPERATIONS. CONTRACTOR SHALL NOTIFY OWNER, OCCUPANT, AND ENGINEER PRIOR TO CONDUCTING ANY OPERATION THAT REQUIRES THE REMOVAL, REPLACEMENT, OR DAMAGE TO PRIVATE PROPERTY.
7. CONTRACTOR SHALL RETAIN AND PROTECT WHERE POSSIBLE ALL LANDSCAPING, TREES, EXISTING UTILITIES, DITCHES, CULVERTS, ETC. EXCEPT WHERE REMOVAL OF SUCH ITEMS IS SPECIFICALLY CALLED FOR ON THE DRAWINGS. ANY DAMAGE DONE BY THE CONTRACTOR SHALL BE REPAIRED AT HIS EXPENSE.
8. CONTRACTOR SHALL ADHERE TO ALL REQUIREMENTS OF SPECIFICATION SECTION 01570 FOR TRAFFIC CONTROL ON THE PROJECT.
9. CONTRACTOR TO SUBMIT TRAFFIC CONTROL PLAN IN ACCORDANCE WITH SPECIFICATIONS.
10. CONTRACTOR SHALL PROVIDE AND MAINTAIN SAFETY SIGNING AND BARRICADES TO PREVENT THE PUBLIC FROM ENTERING WORK AREAS. SAFETY FENCE SHALL BE INSTALLED AND MAINTAINED AROUND ALL OPEN TRENCHES AND HAZARDOUS AREAS WHEN CONTRACTOR PERSONNEL AND OPERATIONS ARE NOT ACTIVE.

## CIVIL UTILITY NOTES

1. CONTRACTOR SHALL VERIFY LOCATION OF ALL BURIED AND OVERHEAD UTILITIES PRIOR TO ANY EXCAVATION IN THE VICINITY. UTILITY LOCATIONS SHOWN ON THESE DRAWINGS ARE APPROXIMATE AND BASED ON THE BEST INFORMATION AVAILABLE TO THE ENGINEER. ENGINEER DOES NOT WARRANT THE ACCURACY NOR COMPLETENESS OF THE INFORMATION SHOWN FOR EXISTING UTILITIES. CONTRACTOR SHALL COORDINATE WITH UTILITY COMPANIES PRIOR TO INSTALLING IMPROVEMENTS. PRIVATE UNDERGROUND UTILITIES EXIST IN THE PROJECT AREA. CONTACT ENGINEER TO LOCATE EXISTING WATER LINES AND SEWER LINES.
2. THE CONTRACTOR WILL CALL THE UTILITY NOTIFICATION ONE CALL OF WYOMING, AT 1-800-844-2476, OR 811, FOR UTILITY LOCATIONS AT LEAST 2 BUSINESS DAYS, NOT INCLUDING THE DAY OF ACTUAL NOTIFICATION, PRIOR TO ANY EXCAVATION.
3. THE REMOVAL, ABANDONMENT, OR TERMINATION OF ANY EXISTING UTILITIES ON SITE SHALL BE COORDINATED WITH THE UTILITY OWNER, WATER AND SEWER MAINS TO BE REMOVED FROM SERVICE SHALL BE CAPPED AND ABANDONED IN ACCORDANCE WITH WYDEQ REGULATIONS.
4. ALL UTILITY CABLES AND GAS LINES SHALL BE BEDDED IN SAND. SEE TYPICAL TRENCH DETAIL.
5. ALL TRENCH BACKFILL SHALL BE TYPE A. MATERIALS USED FOR BEDDING AND BACKFILL SHALL BE CAREFULLY DEPOSITED IN LAYERS SUITABLE TO THE EQUIPMENT USED FOR COMPACTION, WETTED TO 3% BELOW TO 2% ABOVE OPTIMUM MOISTURE CONTENT, AND COMPACTED TO AT LEAST 95% OF MAXIMUM DENSITY AS D DETERMINED BY AASHTO T-99 (STANDARD PROCTOR). COMPACTION BY FLOODING WILL NOT BE PERMITTED. TYPE B TRENCH BACKFILL SHALL NOT BE ALLOWED, UNLESS AUTHORIZED BY THE ENGINEER.
6. ALL EXCAVATION ACTIVITIES SHALL COMPLY WITH PERMIT REQUIREMENTS ISSUED FOR THE PROJECT. CONTRACTOR SHALL REVIEW AND BE RESPONSIBLE FOR PERMIT COMPLIANCE.
7. CONTRACTOR SHALL NOT INTERRUPT UTILITIES PROVIDING SERVICES TO PROPERTIES ADJACENT TO THE WORK, EXCEPT AS SPECIFICALLY APPROVED BY THE ENGINEER AND OWNER. SERVICES DAMAGED OR INTERRUPTED BY CONTRACTOR'S OPERATION SHALL BE IMMEDIATELY REPAIRED OR REPLACED AT THE CONTRACTOR'S EXPENSE.
8. CONTINUOUS RIGID INSULATION WILL BE REQUIRED AT ALL STORM WATER CROSSINGS OF SEWER AND WATER MAINS AND SERVICES THAT DO NOT CONFORM TO MINIMUM BURY REQUIREMENTS. REFERENCE DETAILS.
9. THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF ALL UTILITIES ENCOUNTERED DURING CONSTRUCTION AND SHALL NOT BACK FILL UNTIL THE ENGINEER HAS MADE A VISUAL AND WRITTEN RECORD OF ITS LOCATION AND CONDITION.

## MATERIALS AND RATES

ITEM	GRADE	ESTMATED RATE	REMARKS
<u>CRUSHED BASE</u>			CONTRACTOR FURNISHED SOURCE
AGGREGATE WATER	H or W	136.0 LBS/FT <sup>3</sup> 25 GAL/TON	(INCIDENTAL - COMPACTION & DUST)
<u>HOT PLANT MIX</u>	PG (58-28) or better	148 LBS / FT <sup>3</sup>	CONTRACTOR FURNISHED SOURCE 1/2-INCH TYPE II, CLASS III-M (50 BLOW) MIX DESIGN IN ACCORDANCE WITH WYOMING DEPARTMENT OF TRANSPORTATION 2010 STANDARD SPECIFICATIONS
WATER		30 GAL/TON	(INCIDENTAL)
<u>SURFACE CONCRETE</u>	CLASS 4000	150 LBS/FT <sup>3</sup>	CONTRACTOR FURNISHED SOURCE FIBERMESH-REINFORCED CLASS 4000 CONCRETE CONFORMING TO WPWSS SECTION 03304, PART 2.07
<u>CHANNEL CONCRETE</u>	CLASS 2000		CONTRACTOR FURNISHED SOURCE FIBERMESH-REINFORCED CLASS 2000 CONCRETE CONFORMING TO WPWSS SECTION 03304, PART 2.07
<u>SEEDING</u>			PROVIDE SEED MIX TO ENGINEER IF REQUIRED

- CACHE CREEK TUBE IS A LIVE STORM DRAIN AND IRRIGATION WATER SUPPLY CONDUIT. FLOW CAN BE EXPECTED AT ALL TIMES. FLOW INTERRUPTIONS ARE POSSIBLE WITH PROPER COORDINATION BETWEEN TOWN AND IRRIGATORS (NATIONAL ELK REFUGE AND REDEEMER LUTHERAN CHURCH)

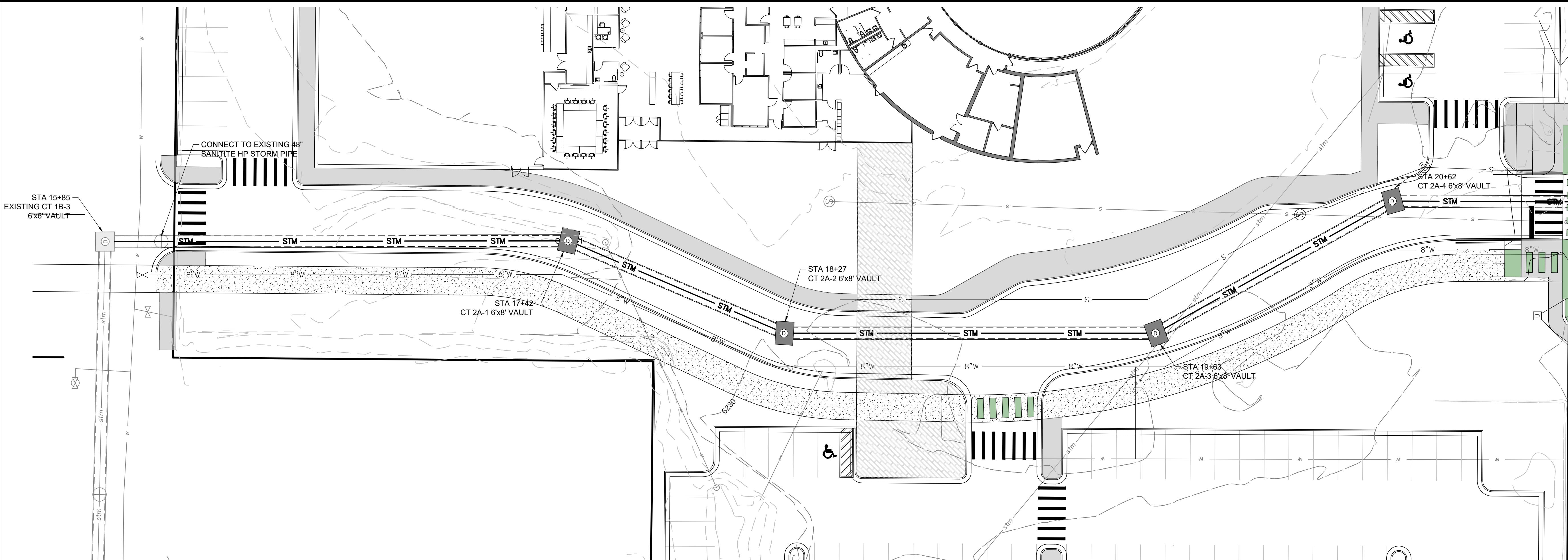
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PROJECT TITLE: **TETON COUNTY/ JACKSON RECREATION CENTER REDEVELOPMENT**

**PROJECT NOTES & LEGEND**

DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	
15063	
SHEET	
C1-1	





EX. MERCILL AVE VAULT  
STA: 15+72  
RIM: 6227.29  
INV IN: 62220.60' 48"

CT 2A-1  
STA: 17+42  
RIM: 6227.78'  
INV: N 6221 53' 48"

CT 2A-2  
STA: 18+27  
RIM: 6230.55'  
INV N: 6222.06' 48"

CT 2A-3  
STA: 19+63  
RIM: 6230.10'  
INV IN: 6222.84' 48"

CT 2A4  
STA: 20+62  
RIM: 6230.25'  
INV IN: 6223.44' 48"  
INV OUT: 6223.34' 48"

POWER UTILITY TO RELOCATE;  
COORDINATE WITH LVE

18LF, 48" SANITITE HP  
S=0.5%

146LF, 48" SANITITE HP  
S=0.5%

80LF, 48" SANITITE HP  
S=0.5%

130LF, 48" SANITITE HP  
S=0.5%

93LF, 48" SANITITE HP  
S=0.5%

=PIPE PROFILE=  
CACHE TUBE  
SCALE: HORIZONTAL. 1"=2  
VERTICAL 1"=4

**— PRELIMINARY —  
SUBJECT TO CORRECTION  
AND APPROVAL**

0 20 40

SCALE: 1 INCH = 20 FEET

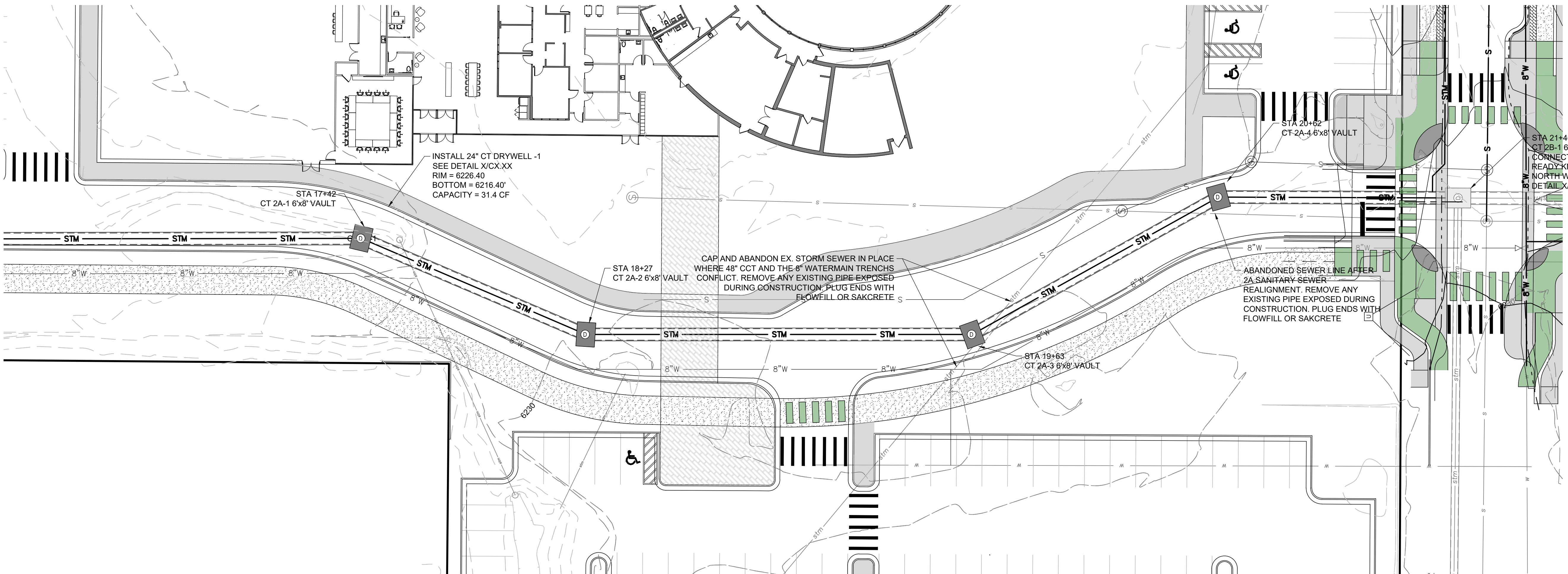
THIS SCALE VALID ONLY FOR 22x34 PRINTS

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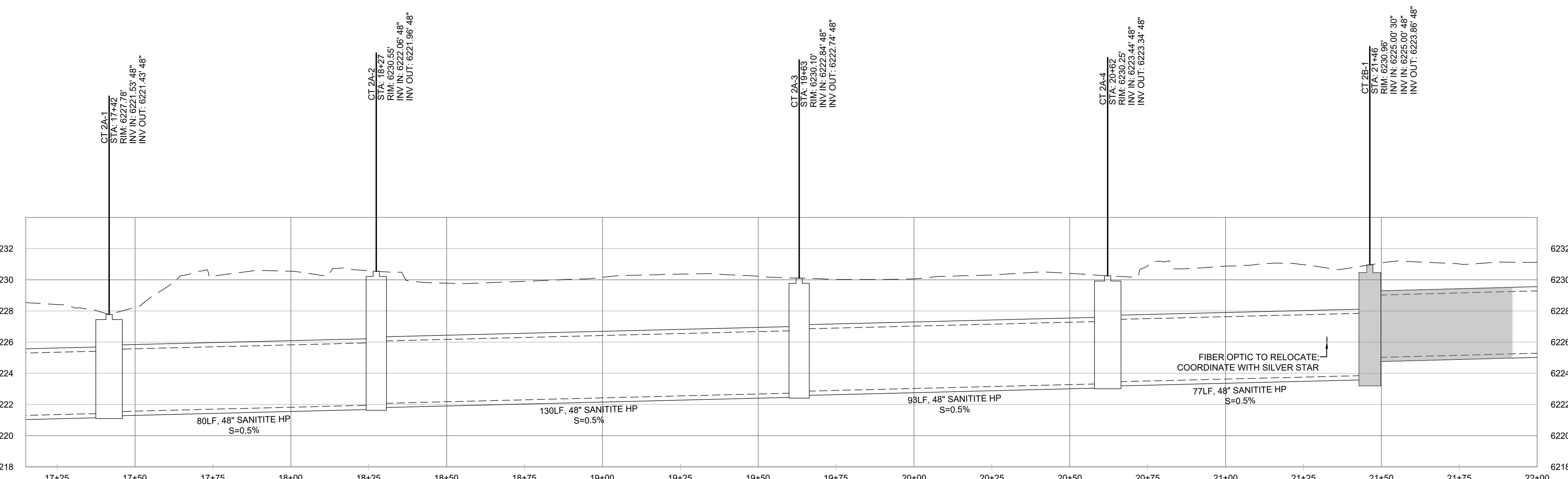
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**TETON COUNTY/ JACKSON RECREATION  
CENTER REDEVELOPMENT**



PROJECT NUMBER  
15063  
SHEET  
C3.0



PROJECT TITLE: CACHE CREEK TUBE REALIGNMENT  
TETON COUNTY/ JACKSON RECREATION CENTER REDEVELOPMENT

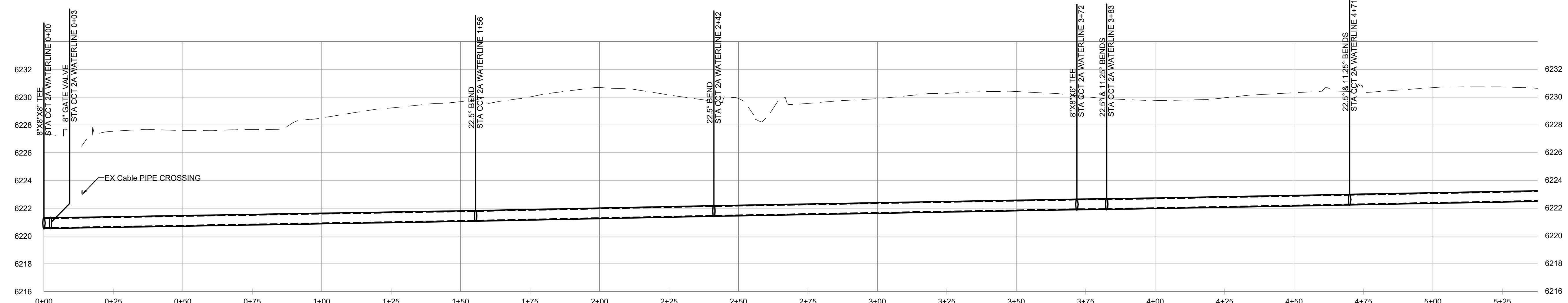
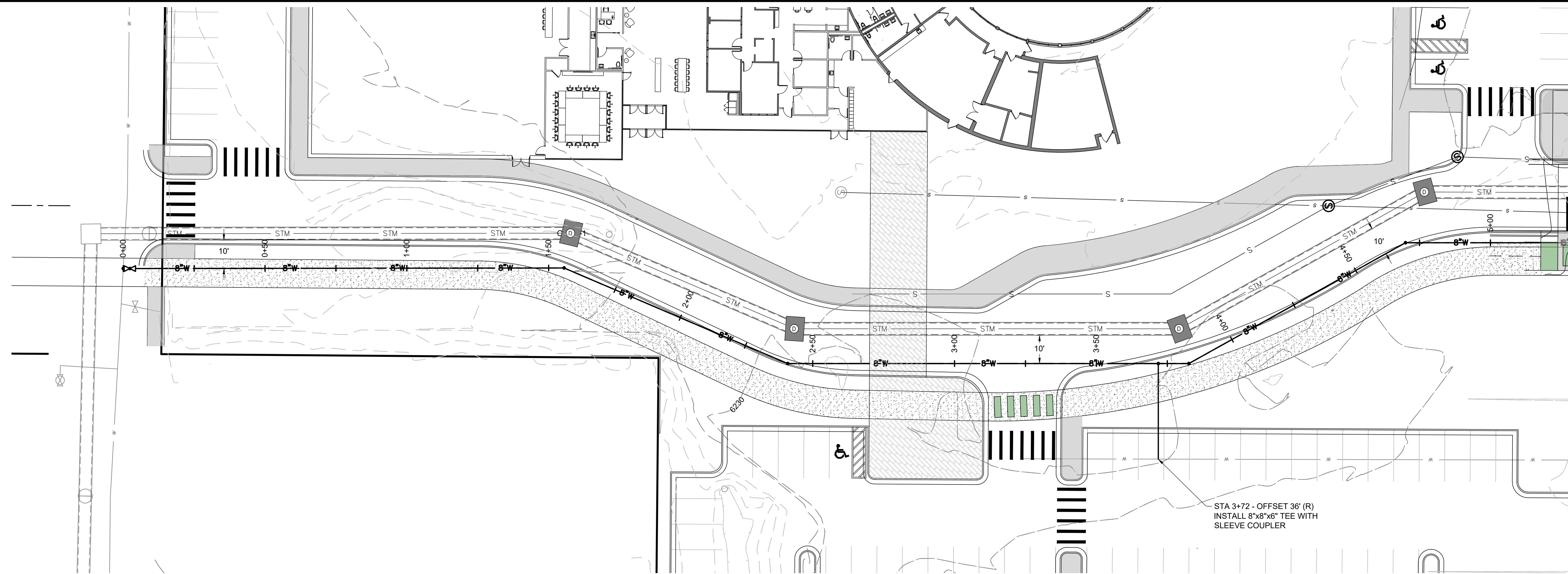


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- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL

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SCALE: 1 INCH = 20 FEET  
THIS SCALE VALID ONLY FOR 22x34 PRINTS

DRAFTED BY: BS  
REVIEWED BY: TK  
PLAN VERSION DATE  
70% SET 2021-08-10  
PROJECT NUMBER 15063  
SHEET C3.1



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CCT 2A WATERLINE  
SCALE: HORIZONTAL 1'=20  
VERTICAL 1'=4

- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL

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SCALE: 1 INCH = 20 FEET  
THIS SCALE VALID ONLY FOR 22x34 PRINTS

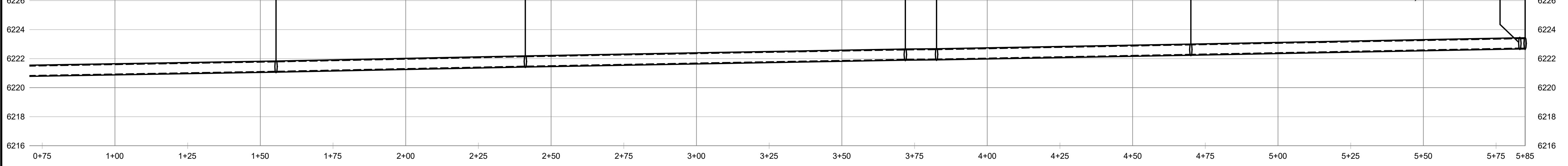
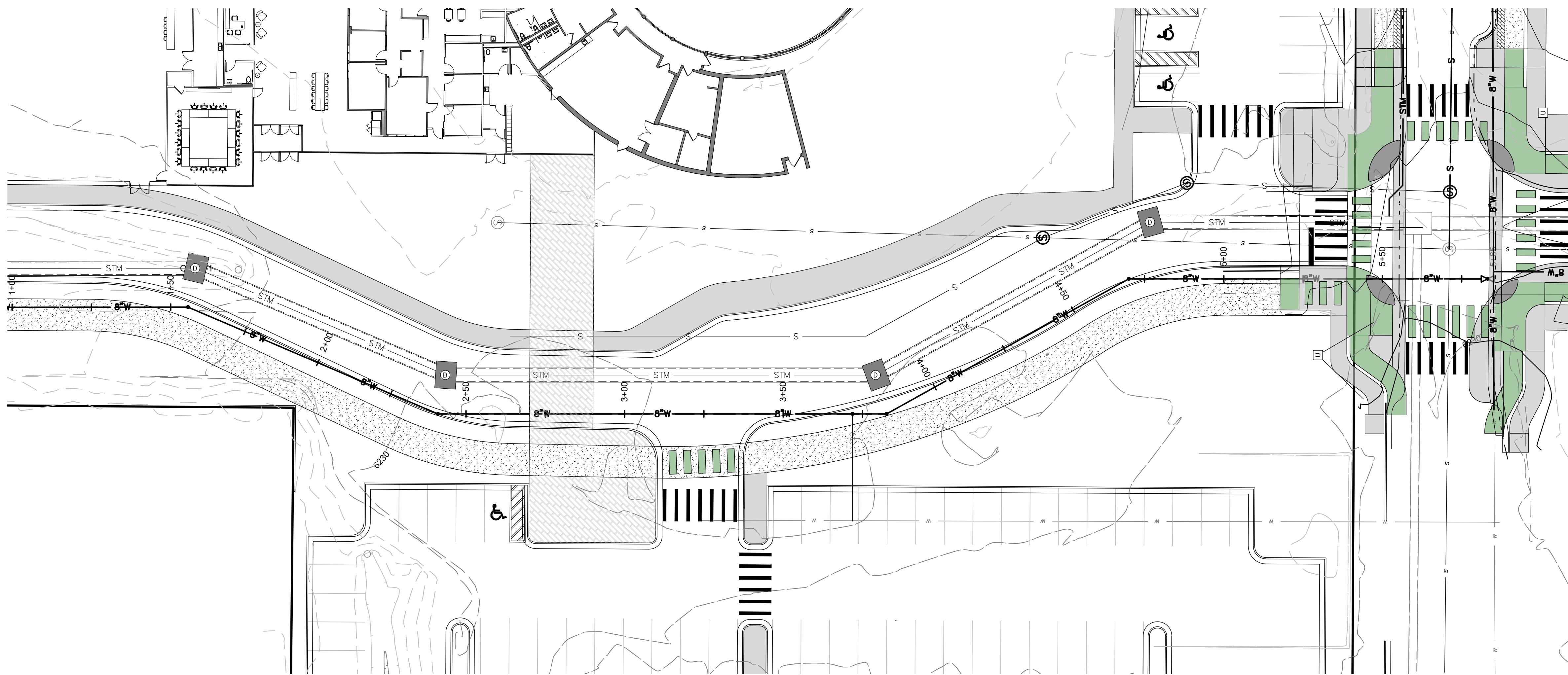
PROJECT TITLE:  
TETON COUNTY/ JACKSON RECREATION  
CENTER REDEVELOPMENT

SHEET TITLE:  
PROPOSED WATER MAIN

DRAFTED BY: BS  
REVIEWED BY: TK  
PLAN VERSION DATE  
70% SET 2021-08-10

PROJECT NUMBER  
15063  
SHEET  
C4.0





=PIPE PROFILE=  
CCT 2A WATERLINE  
SCALE: HORIZONTAL. 1"=20  
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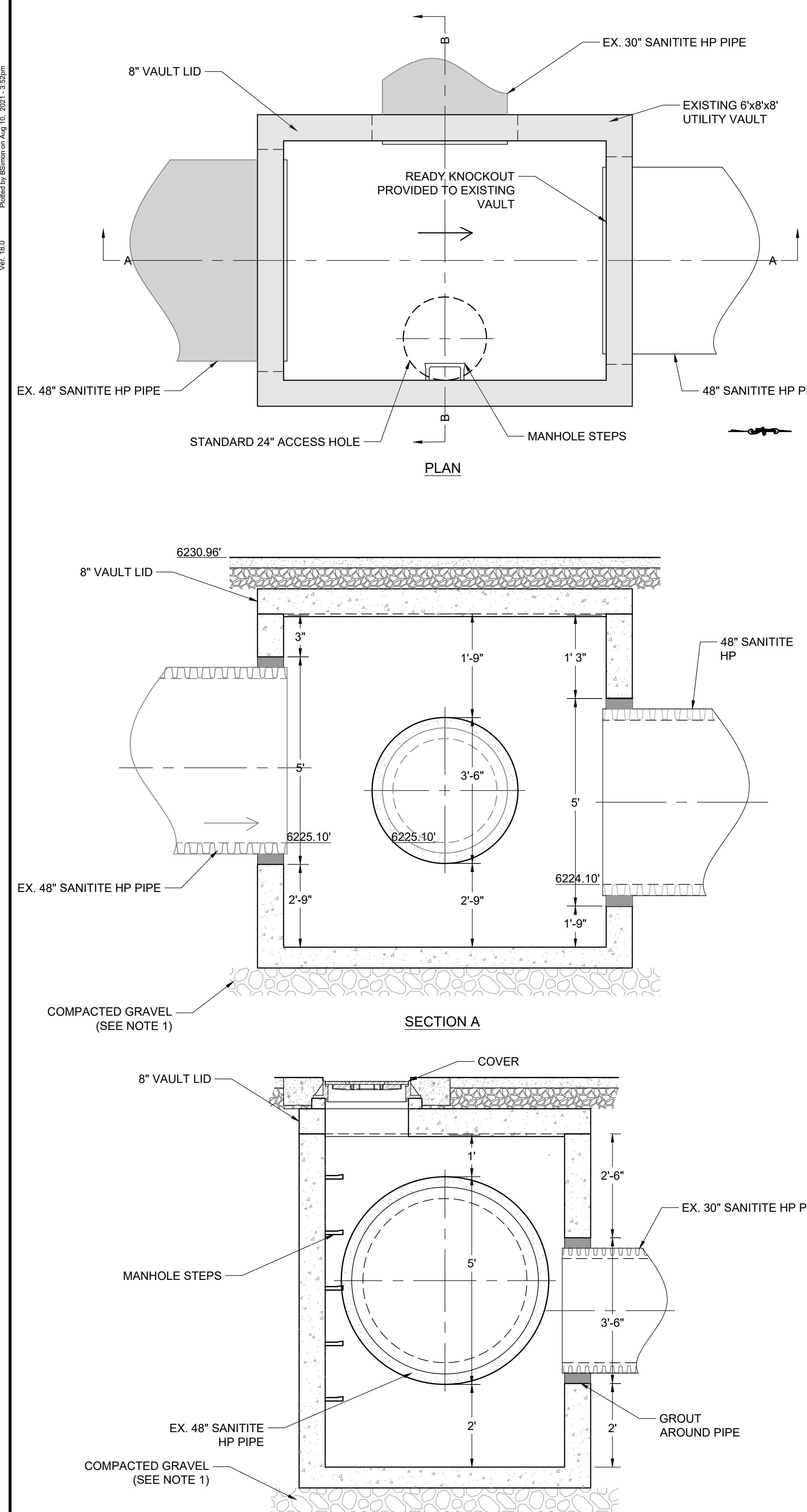
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TETON COUNTY/JACKSON RECREATION  
CENTER REDEVELOPMENT

SHEET TITLE:  
PROPOSED WATER MAIN

DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C4.1

- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL

0 20 40 60  
SCALE: 1 INCH = 20 FEET  
THIS SCALE VALID ONLY FOR 22x34 PRINTS



## NOTE:

1. GRAVEL SHALL BE EIGHT (8) INCH MINIMUM THICKNESS, CONFORM TO WPWSS SECTION 02190, PART 2.03, GRAADING H OR W, AND BE INSTALLED PER WPWSS SECTION 02231, PART 3.03.
2. NO CHANNEL CONSTRUCTION REQUIRED INSIDE OF VAULT
3. STRUCTURE TO BE RATED TO AASHTO HS-20 LOADING CRITERIA
4. PIPES TO BE INSTALLED TO VAULTS USING HDPE WATERSTOP GROUTED MANHOLE CONNECTIONS OR APPROVED EQUAL.
5. VAULT TO BE CONSTRUCTED AND ENGINEERED TO HAVE 60"X60" CUTOUT COMPLETED ON WALL DURING FUTURE WORK TIE IN. SUBMITTAL TO INCLUDE DETAIL ON CUTOUT LOCATION AND CERTIFIED STRUCTURAL RATING.

1  
C4.6 STA 21+54 CT 2B-1 6'x8' TEE VANT  
NOT TO SCALE

## NOTE:

1. GRAVEL SHALL BE EIGHT (8) INCH MINIMUM THICKNESS, CONFORM TO WPWSS SECTION 02190, PART 2.03, GRAADING H, AND BE INSTALLED PER WPWSS SECTION 02231, PART 3.03.
2. STRUCTURE TO BE RATED TO AASHTO HS-20 LOADING CRITERIA
3. POUR CHANNEL IN VAULT TO BE  $\frac{1}{2}$  HEIGHT OF MAIN LINE PIPE WITH SMOOTH TROWEL FINISH. USE 2000 PSI CONCRETE. SLOPE SHELVES 1:12 TO CHANNEL
4. PIPES TO BE INSTALLED TO VAULTS USING HDPE WATERSTOP GROUTED MANHOLE CONNECTIONS OR APPROVED EQUAL.

1  
C3.9

STA 17+42 CT 2A-1 6'x8' VAULT  
NOT TO SCALE

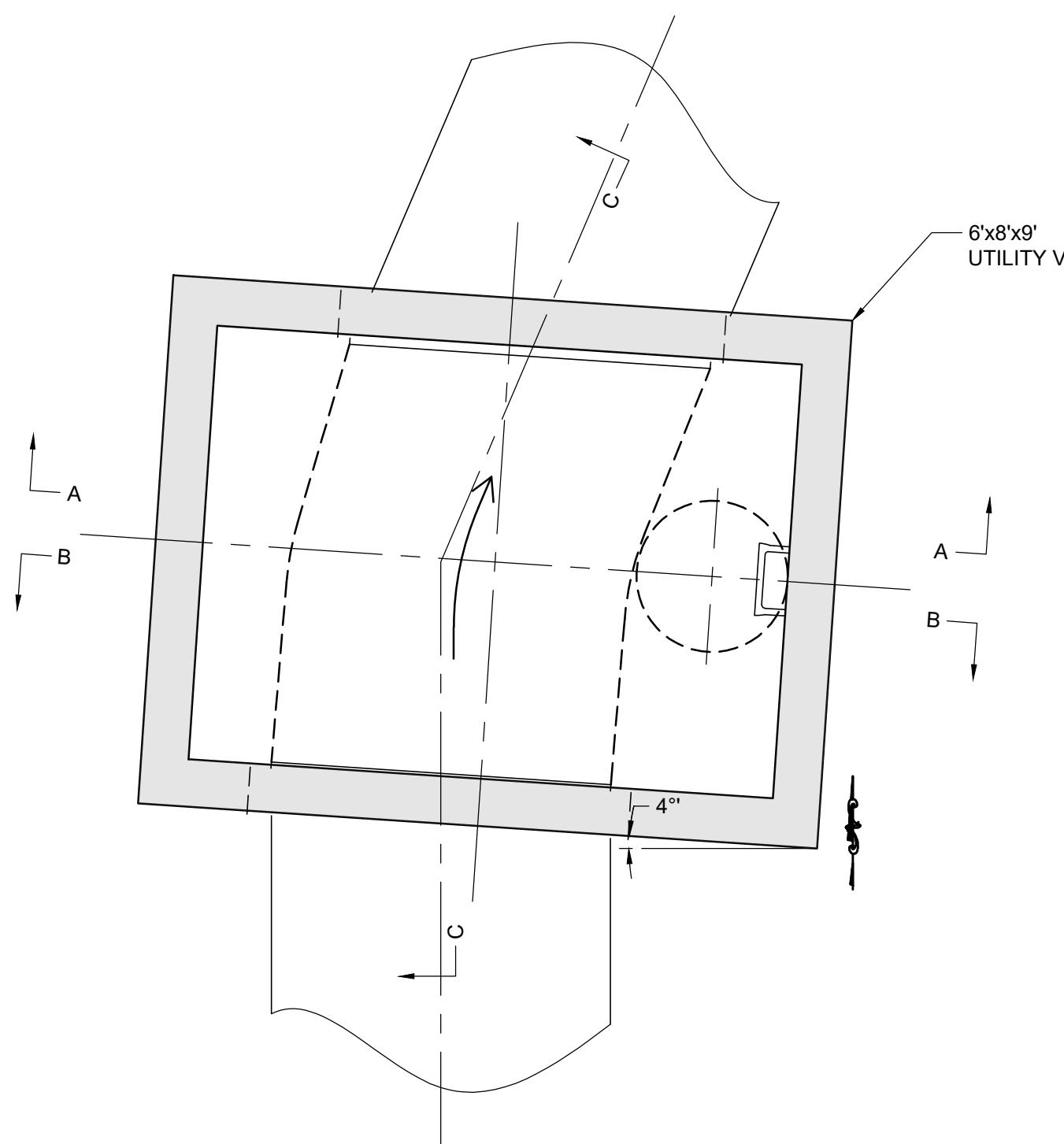
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PROJECT TITLE: TETON COUNTY/JACKSON RECREATION CENTER REDEVELOPMENT

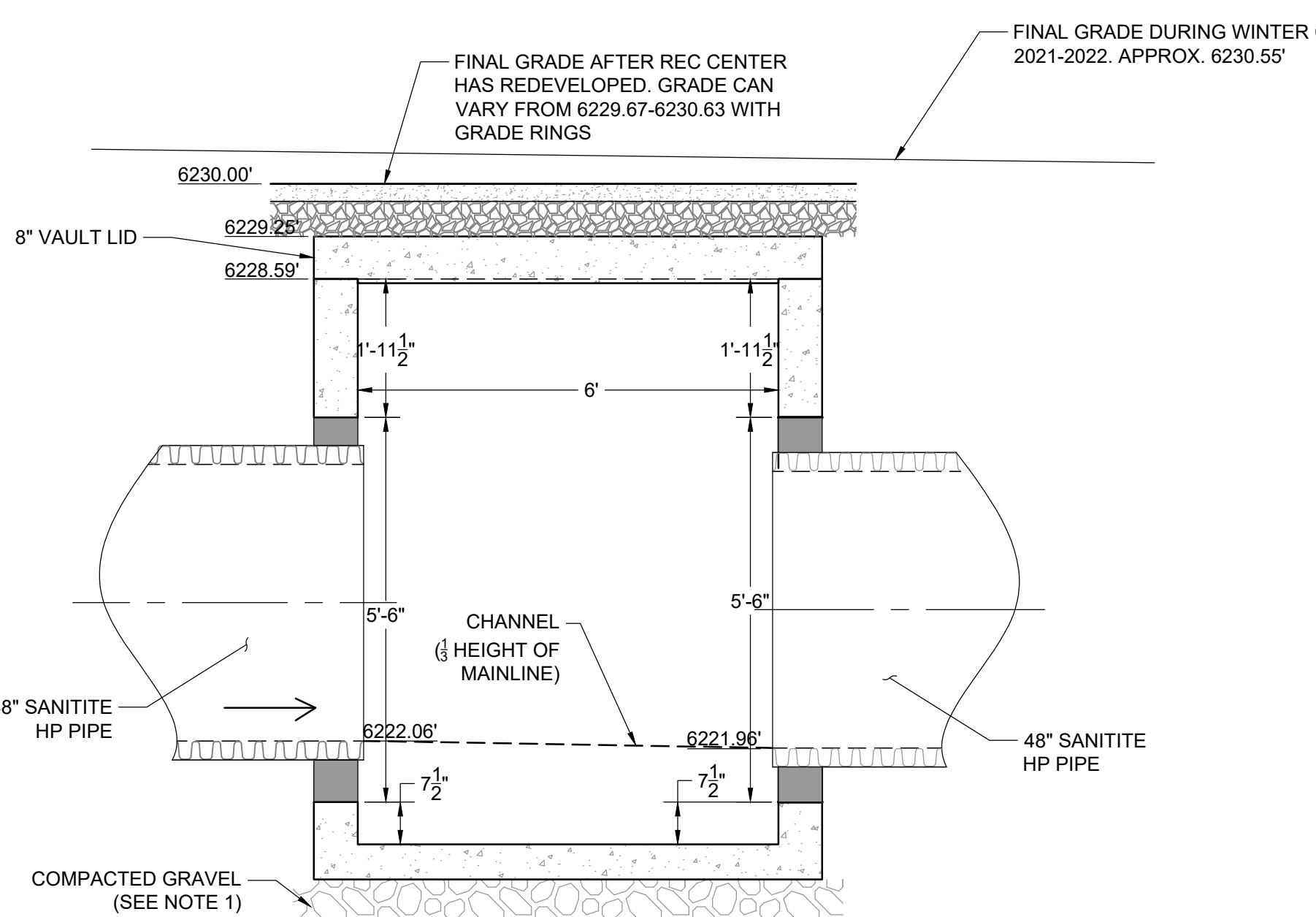
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DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C5.0

- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL



PLAN

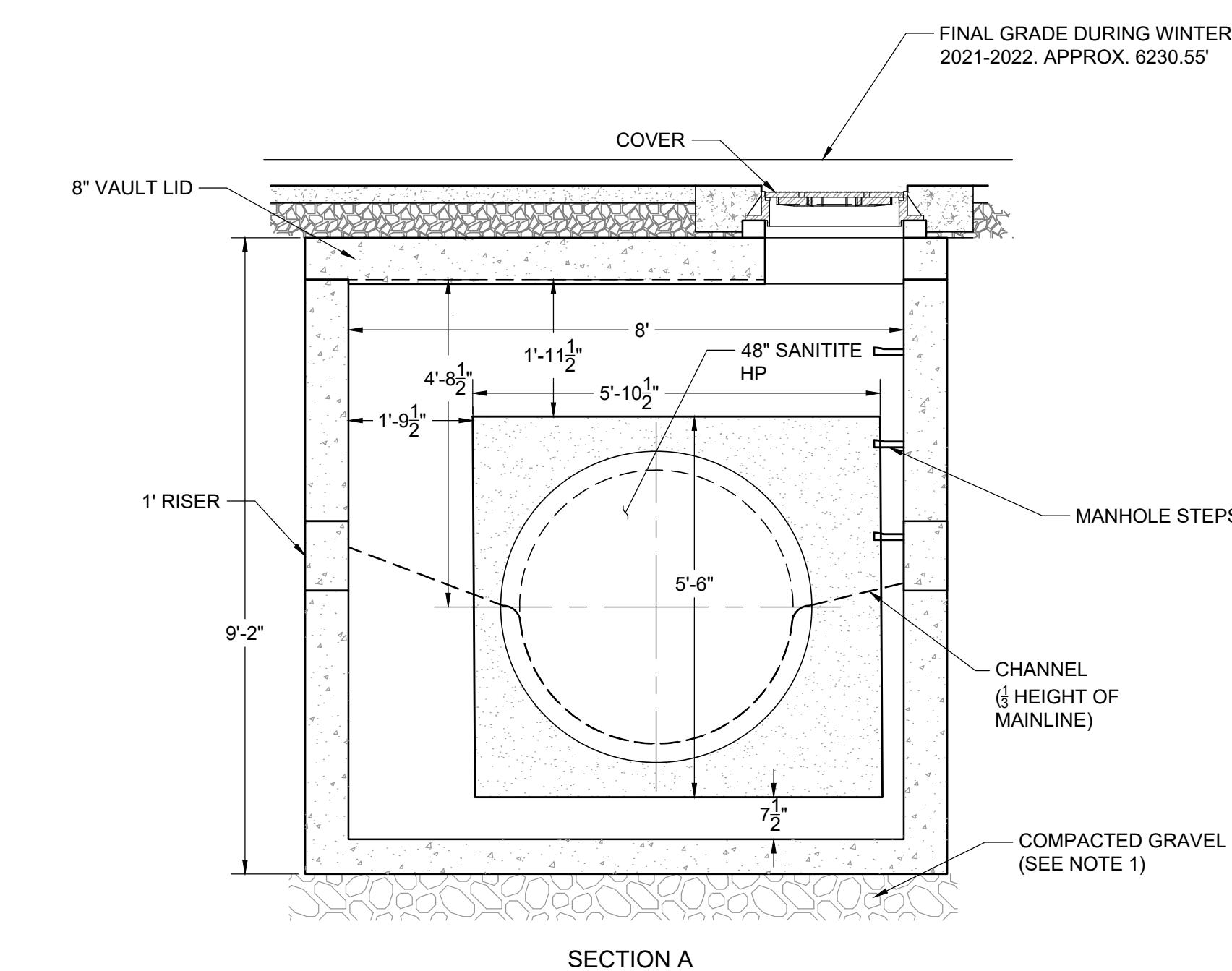


SECTION C

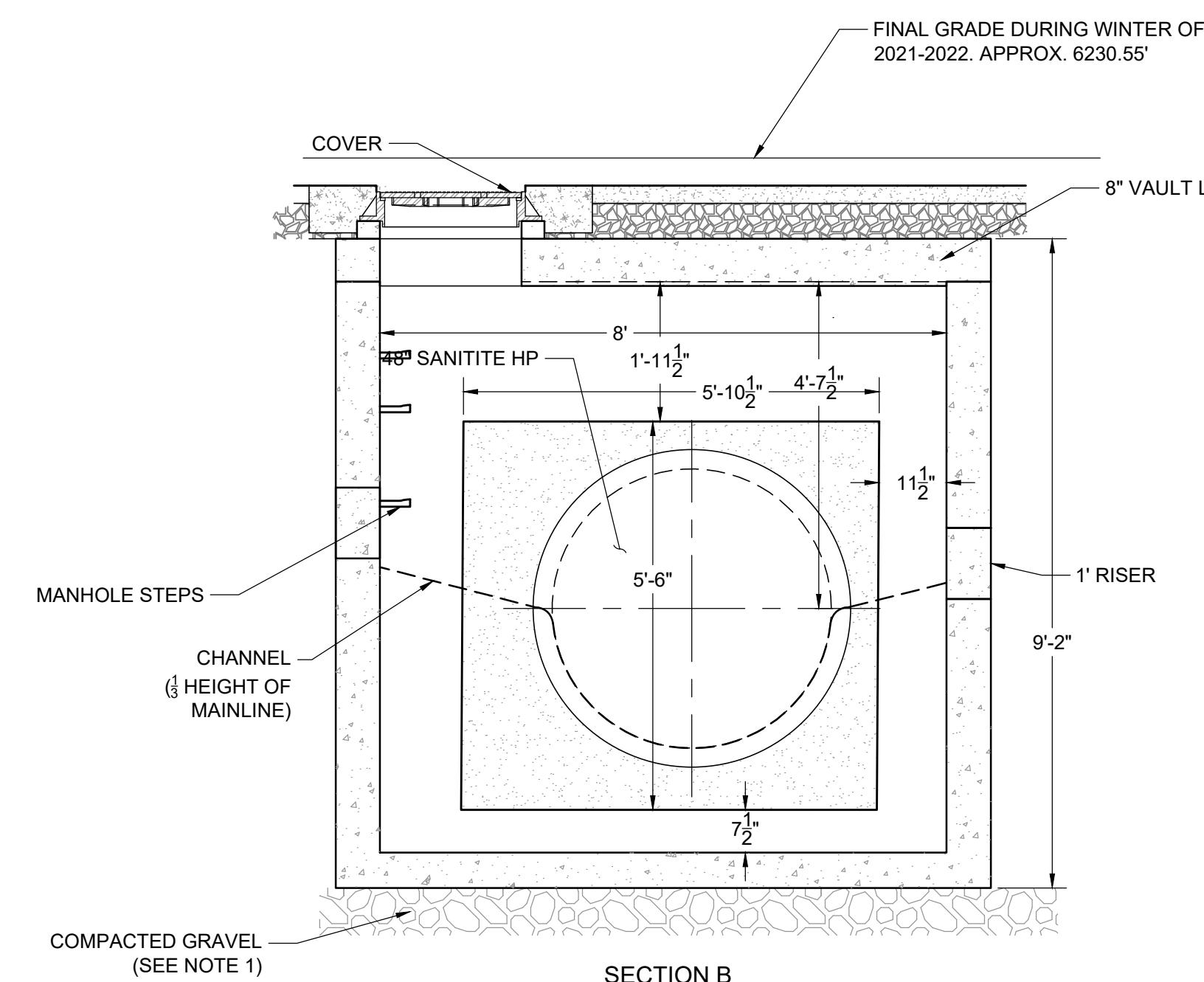
## NOTE:

1. GRAVEL SHALL BE EIGHT (8) INCH MINIMUM THICKNESS, CONFORM TO WPWSS SECTION 02190, PART 2.03, GRADING H, AND BE INSTALLED PER WPWSS SECTION 02231, PART 3.03.
2. STRUCTURE TO BE RATED TO AASHTO HS-20 LOADING CRITERIA
3. POUR CHANNEL IN VAULT TO BE  $\frac{1}{2}$  HEIGHT OF MAIN LINE PIPE WITH SMOOTH TROWEL FINISH. USE 2000 PSI CONCRETE. SLOPE SHELVES 1:12 TO CHANNEL
4. PIPES TO BE INSTALLED TO VAULTS USING HDPE WATERSTOP GROUTED MANHOLE CONNECTIONS OR APPROVED EQUAL.

1  
C3.9  
STA 18+27 CT 2A-2 6'x8' VAULT  
NOT TO SCALE



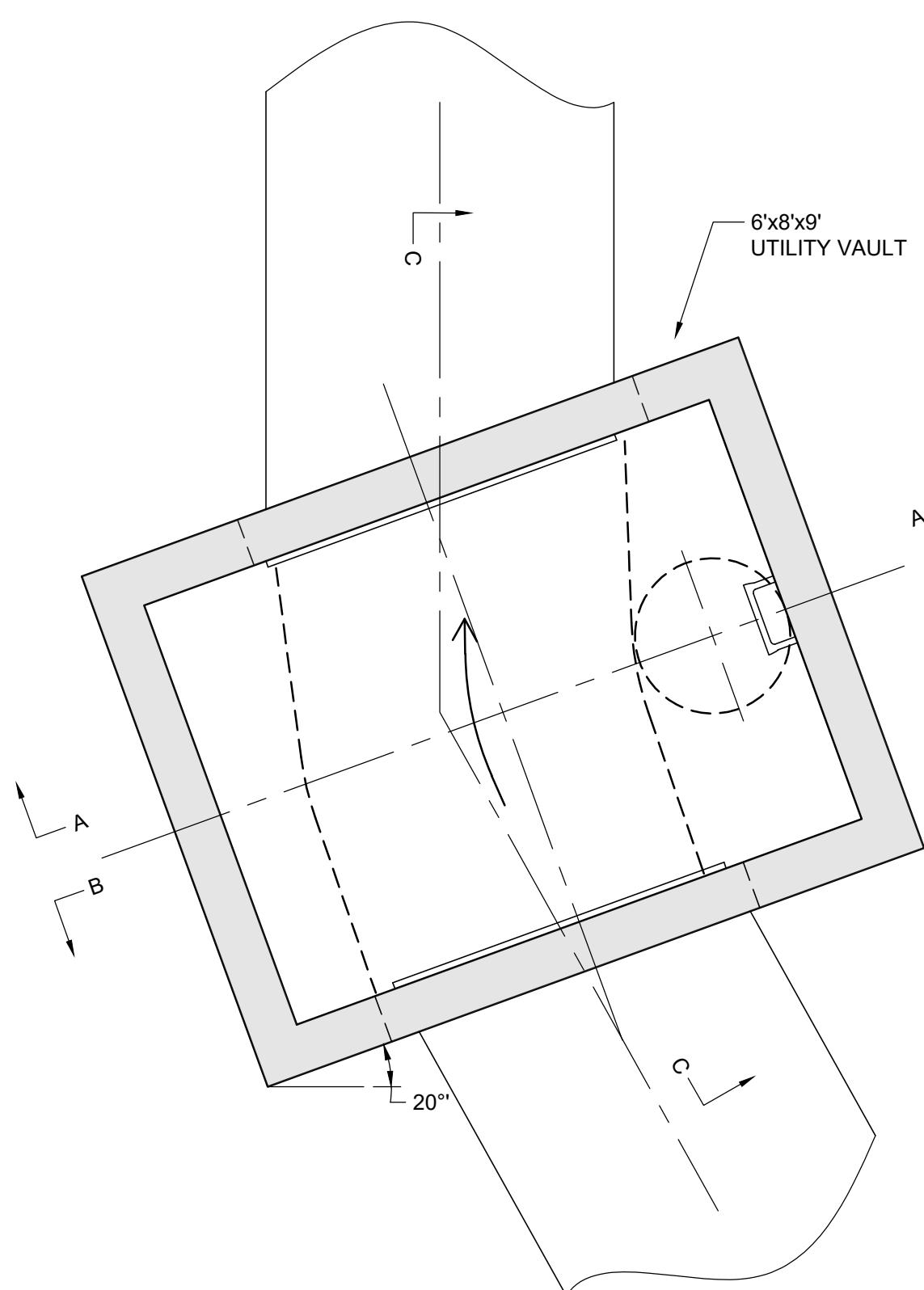
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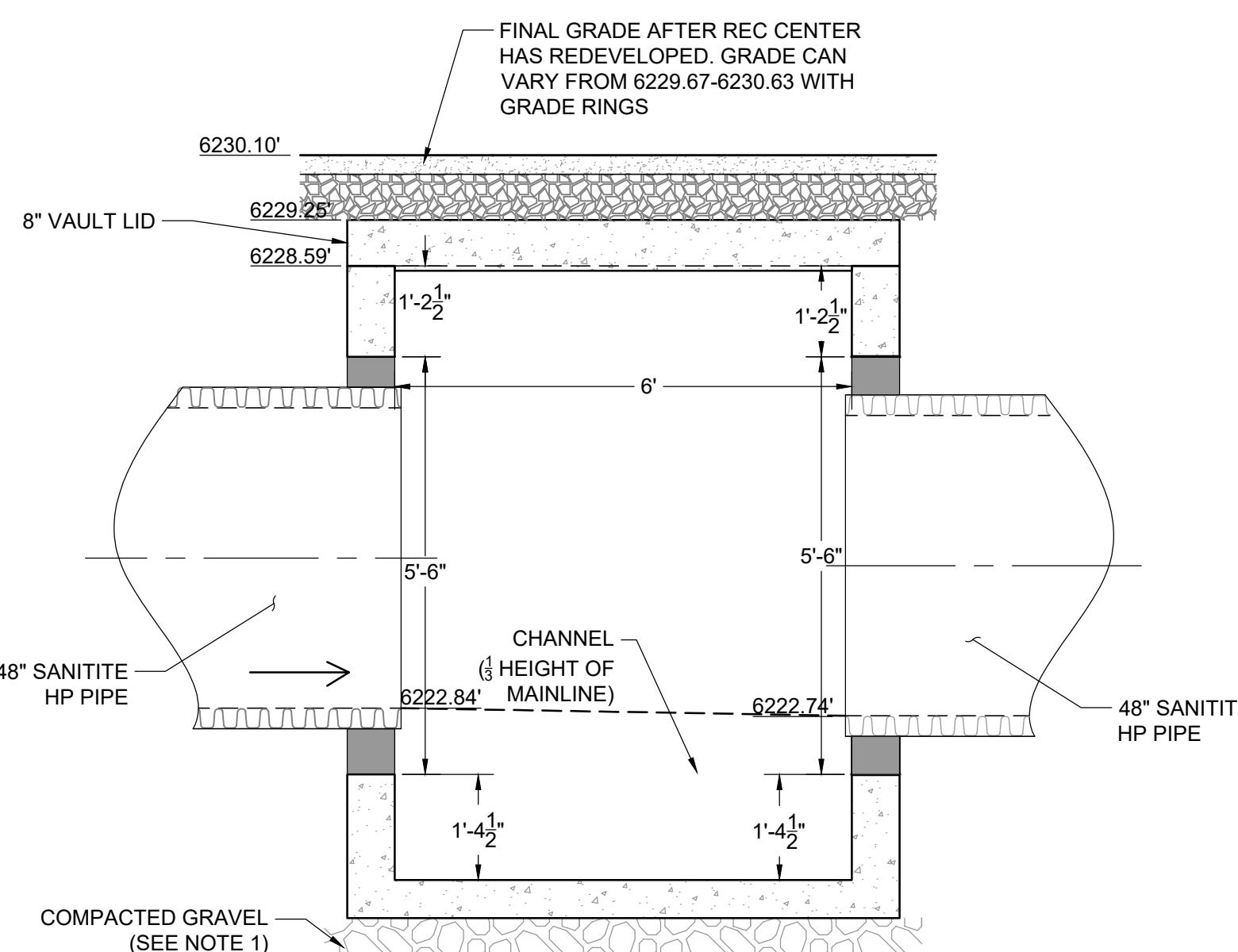
SECTION B

DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C5.1

— PRELIMINARY —  
SUBJECT TO CORRECTION  
AND APPROVAL



PLAN

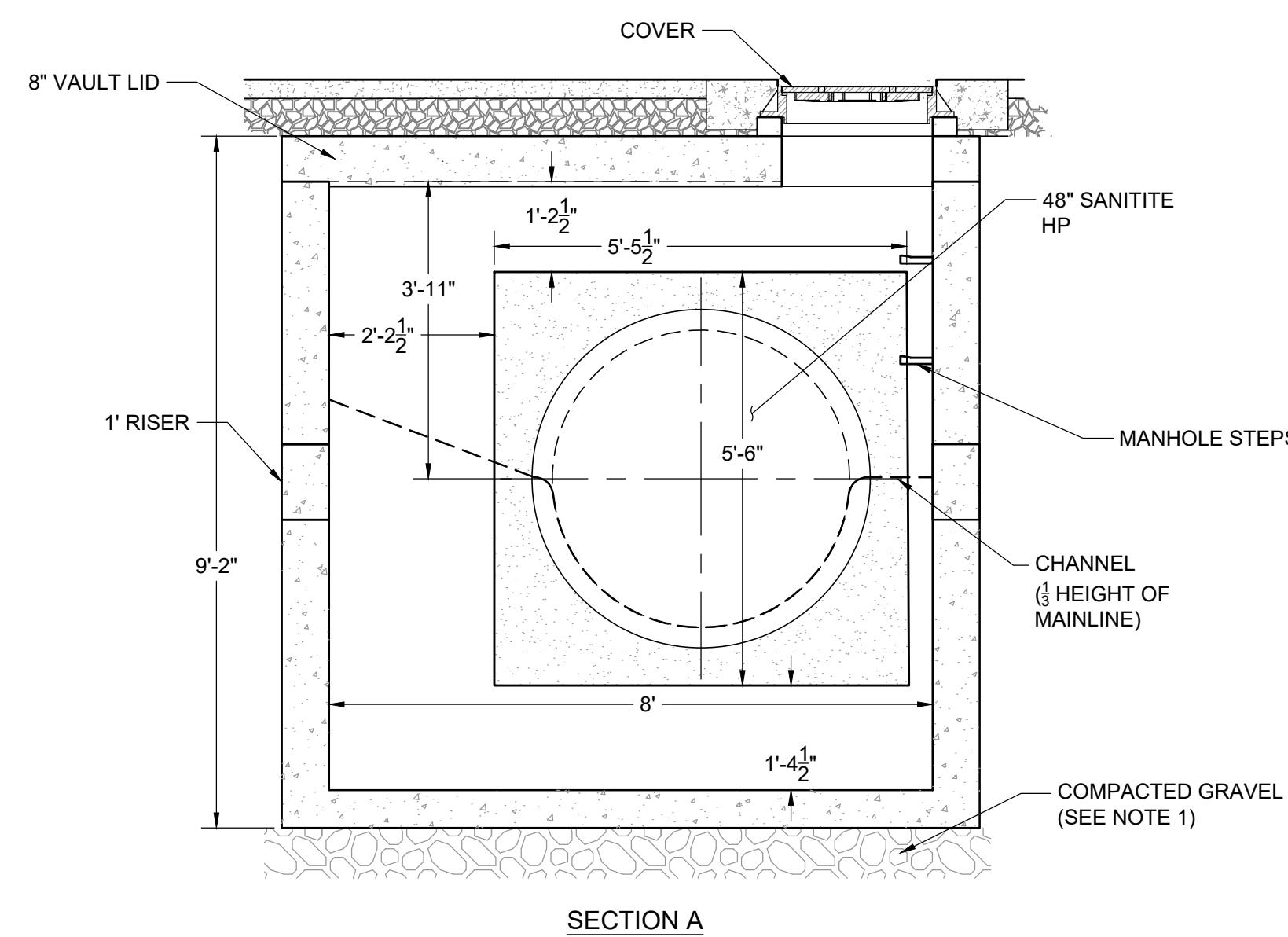


SECTION C

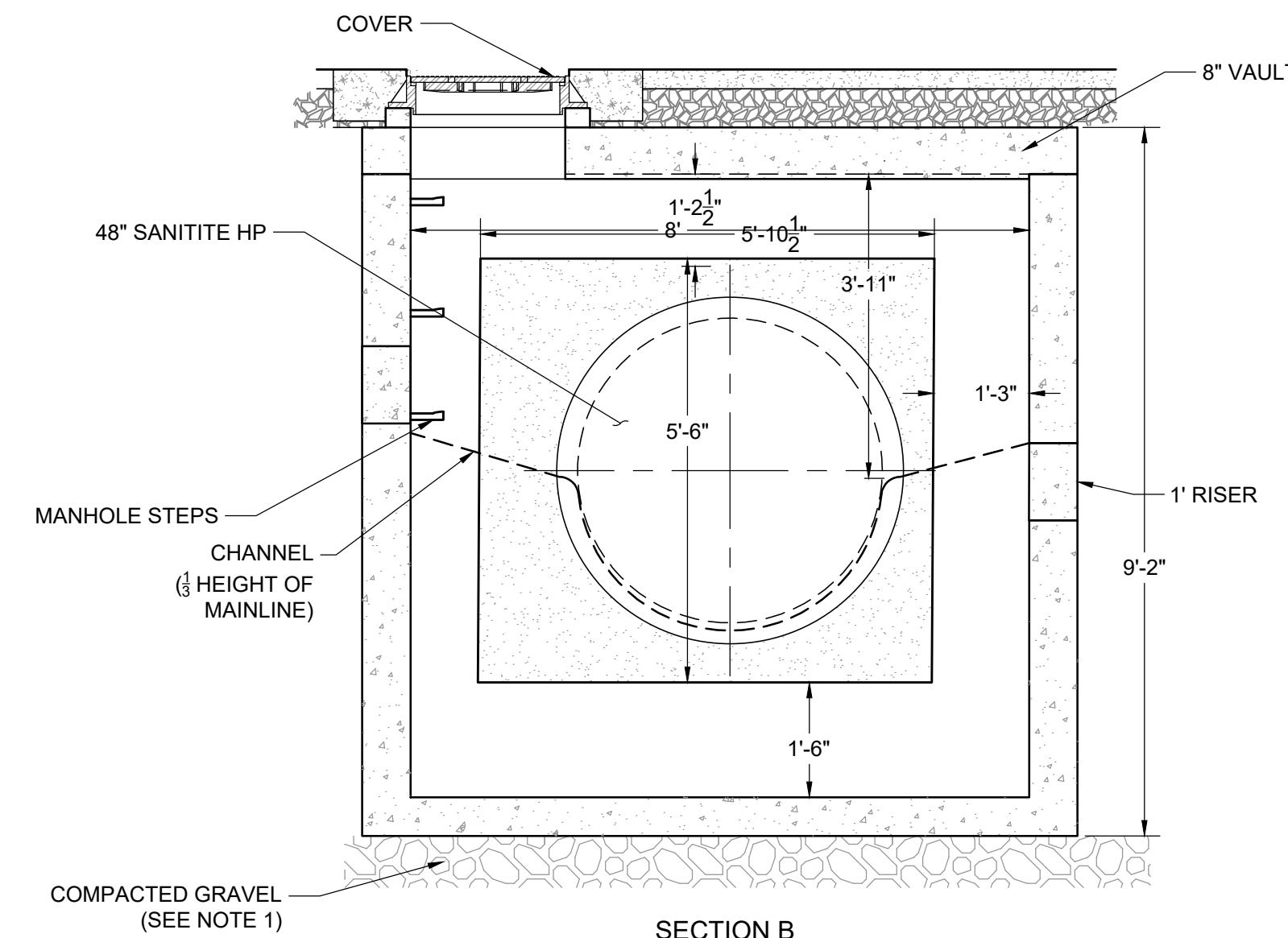
## NOTE:

1. GRAVEL SHALL BE EIGHT (8) INCH MINIMUM THICKNESS, CONFORM TO WPWSS SECTION 02190, PART 2.03, GRADING H, AND BE INSTALLED PER WPWSS SECTION 02231, PART 3.03.
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4. PIPES TO BE INSTALLED TO VAULTS USING HDPE WATERSTOP GROUTED MANHOLE CONNECTIONS OR APPROVED EQUAL.

1 STA 19+63 CT 2A-3 6'x8' VAULT  
C3.9  
NOT TO SCALE



SECTION A



SECTION B

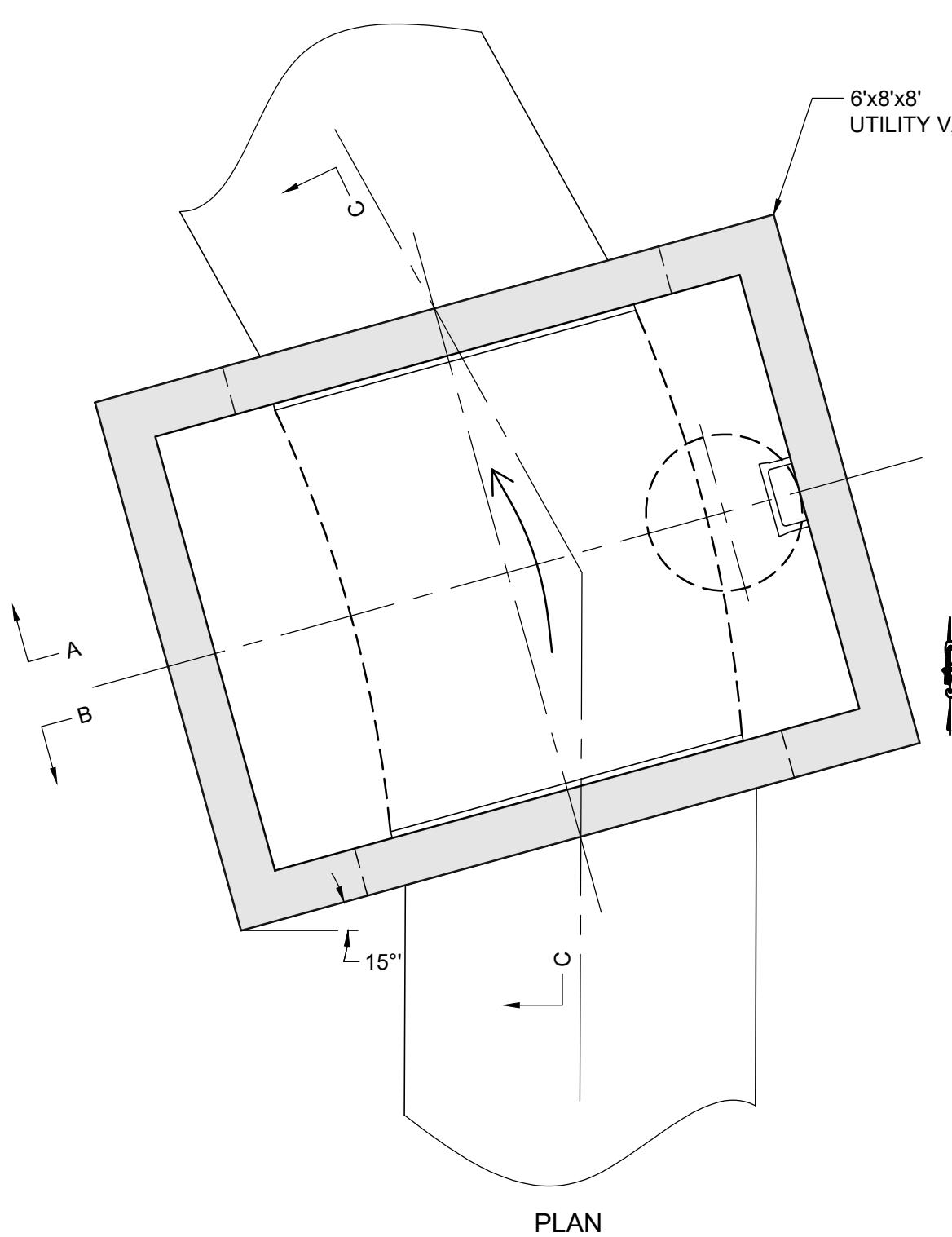
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SHEET TITLE: CCT VAULT DETAILS

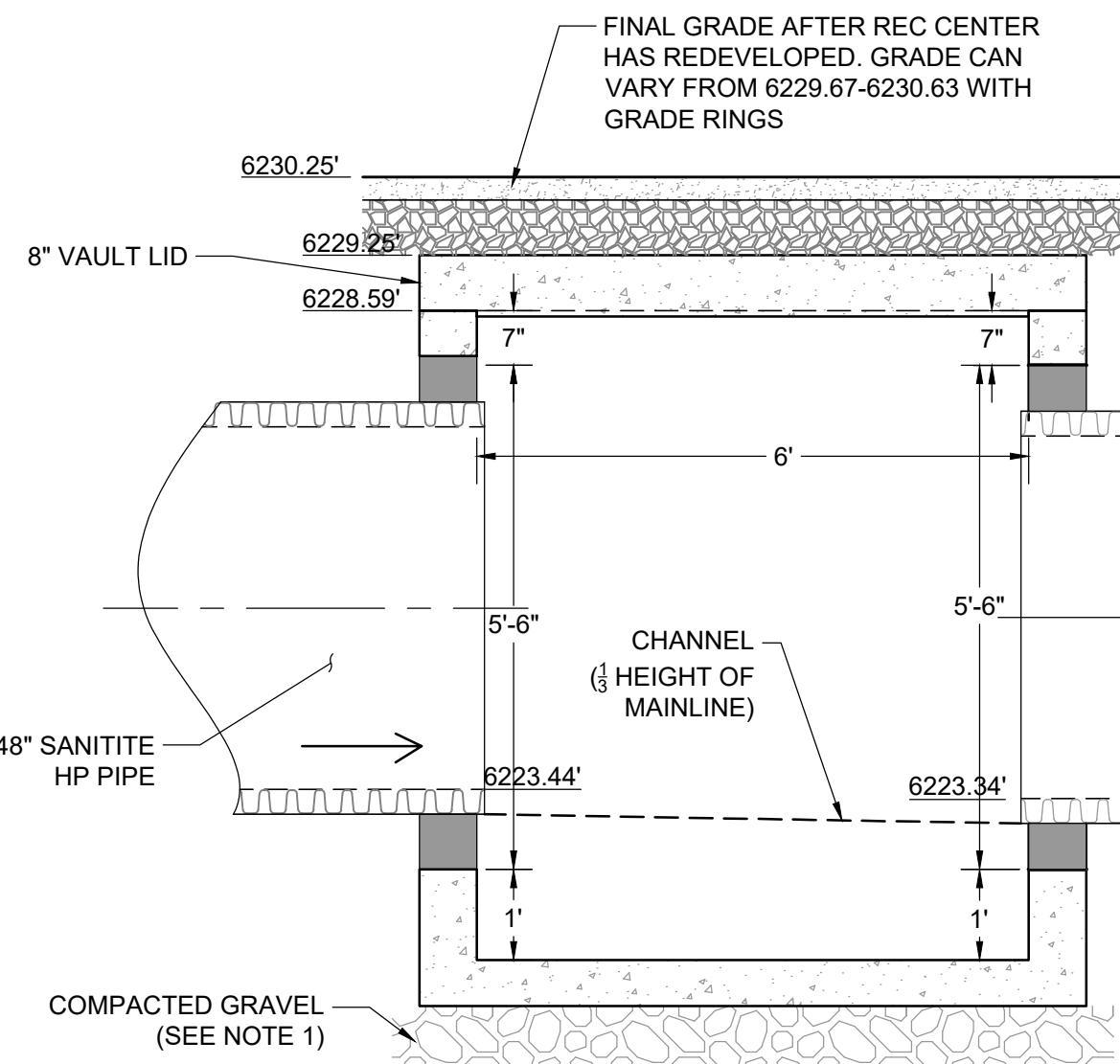
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DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C5.2

- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL



PLAN

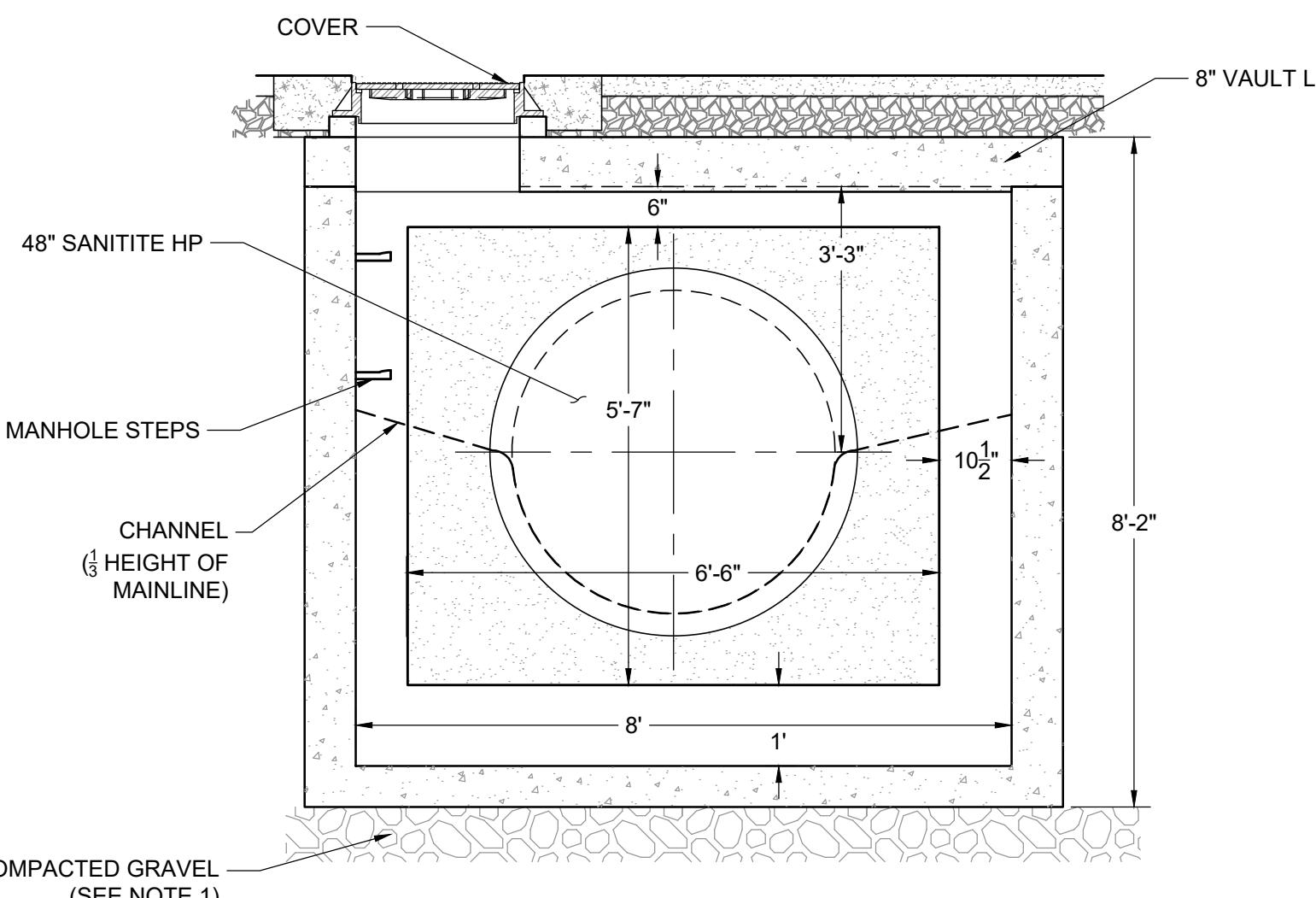
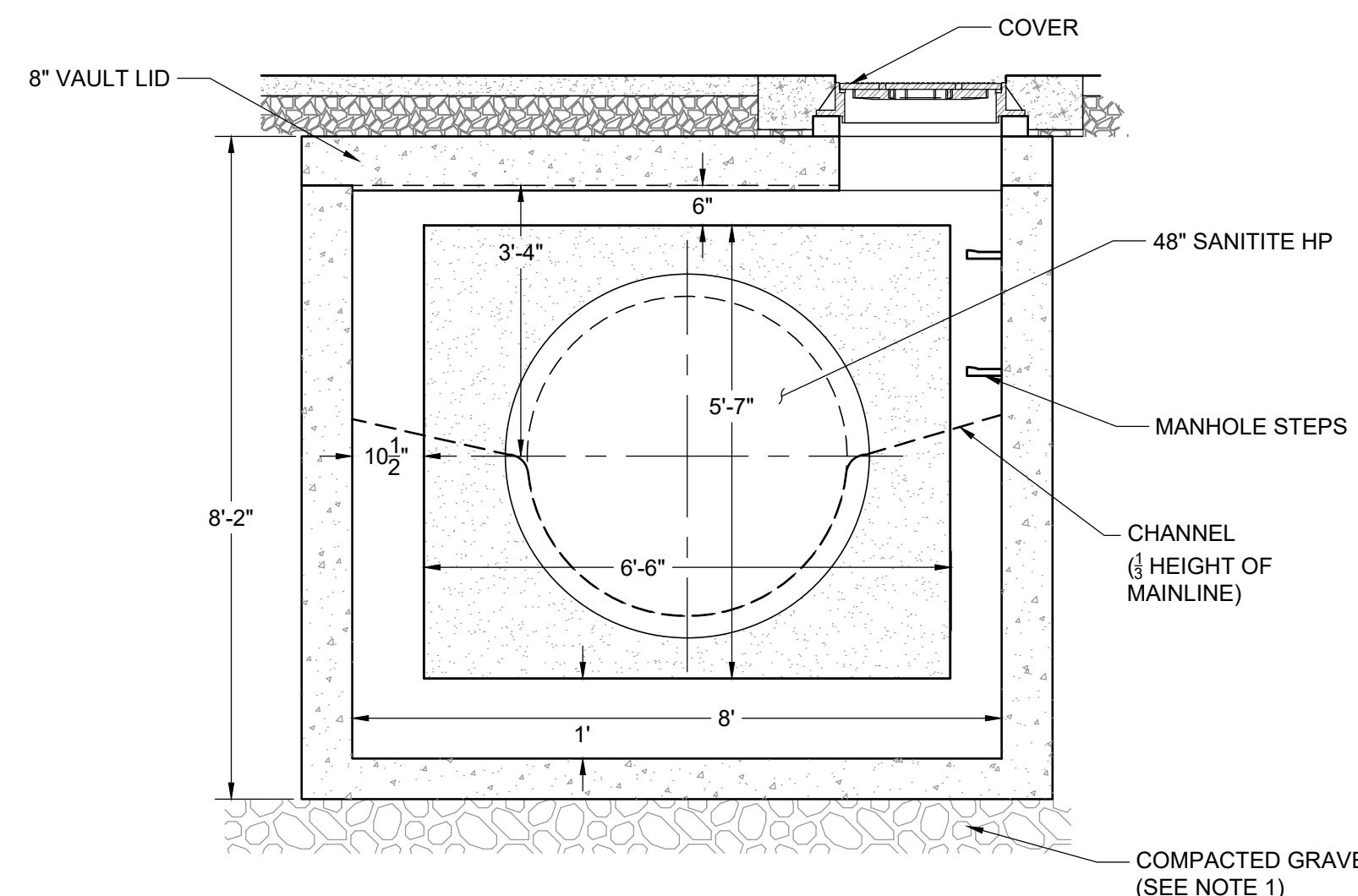


SECTION C

## NOTE:

1. GRAVEL SHALL BE EIGHT (8) INCH MINIMUM THICKNESS, CONFORM TO WPWSS SECTION 02190, PART 2.03, GRADING H, AND BE INSTALLED PER WPWSS SECTION 02231, PART 3.03.
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4. PIPES TO BE INSTALLED TO VAULTS USING HDPE WATERSTOP GROUTED MANHOLE CONNECTIONS OR APPROVED EQUAL.

1 STA 20+62 CT 2A-4 6'x8' VAULT  
C3.9  
NOT TO SCALE



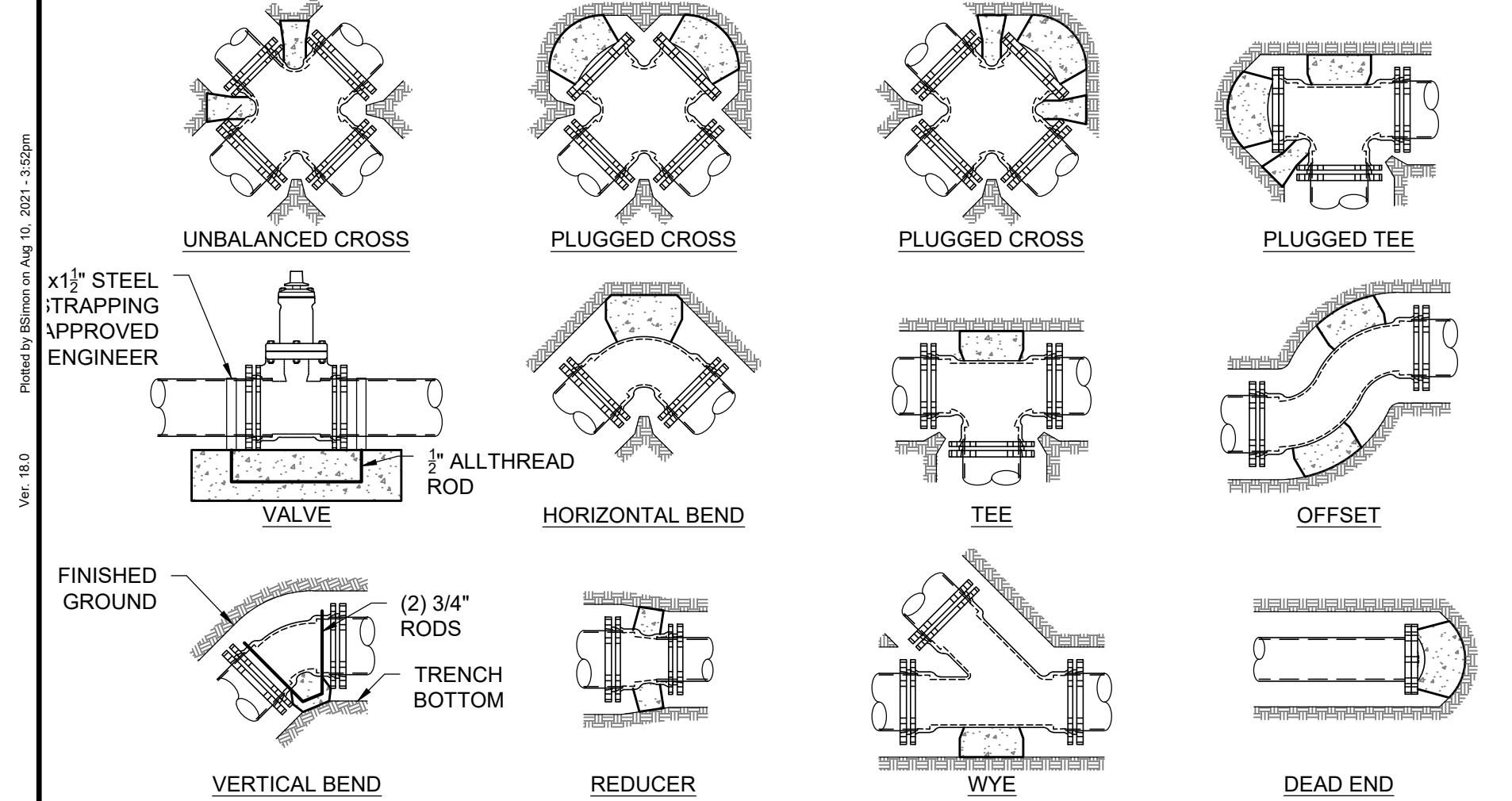
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— PRELIMINARY —  
SUBJECT TO CORRECTION  
AND APPROVAL

PROJECT TITLE: TETON COUNTY/ JACKSON RECREATION  
CENTER REDEVELOPMENT

SECTION: CCT VAULT DETAILS  
SHEET TITLE: CCT VAULT DETAILS

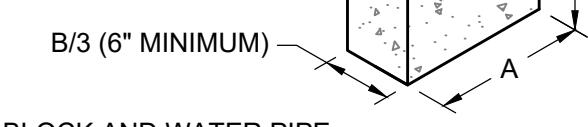
DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C5.3



MINIMUM DIMENSIONS FOR THRUST BLOCKING NOTES											
FITTING SIZE	TEES AND PLUGS		90° BENDS		45° BENDS AND WYES		REDUCERS AND 22 1/2° BENDS		11 1/2° BENDS		
	A	B	A	B	A	B	A	B	A	B	
4"	1'-7"	1'-2"	1'-9"	1'-6"	1'-8"	0'-10"	1'-7"	0'-6"	0'-6"	0'-6"	
6"	2'-0"	1'-11"	2'-5"	2'-2"	1'-10"	1'-7"	1'-9"	0'-10"	1'-0"	0'-6"	
8"	2'-8"	2'-6"	3'-2"	3'-0"	2'-5"	2'-1"	1'-9"	1'-6"	1'-0"	1'-0"	
10"	3'-4"	3'-3"	4'-0"	3'-10"	3'-10"	2'-9"	2'-2"	1'-11"	1'-6"	1'-0"	
12"	4'-0"	3'-10"	4'-8"	4'-8"	3'-8"	3'-3"	2'-7"	2'-3"	2'-0"	1'-0"	
14"	5'-5"	3'-10"	6'-6"	4'-11"	4'-9"	3'-5"	3'-5"	2'-5"	2'-0"	1'-6"	
20"	5'-0"	5'-0"	6'-0"	5'-0"	4'-0"	3'-6"	3'-0"	3'-0"	2'-0"	2'-0"	
24"	6'-0"	6'-0"	7'-0"	7'-0"	5'-0"	5'-0"	4'-6"	3'-0"	3'-0"	3'-0"	
30"	7'-6"	7'-6"	8'-0"	8'-0"	6'-3"	6'-3"	4'-9"	4'-6"	3'-3"	3'-3"	

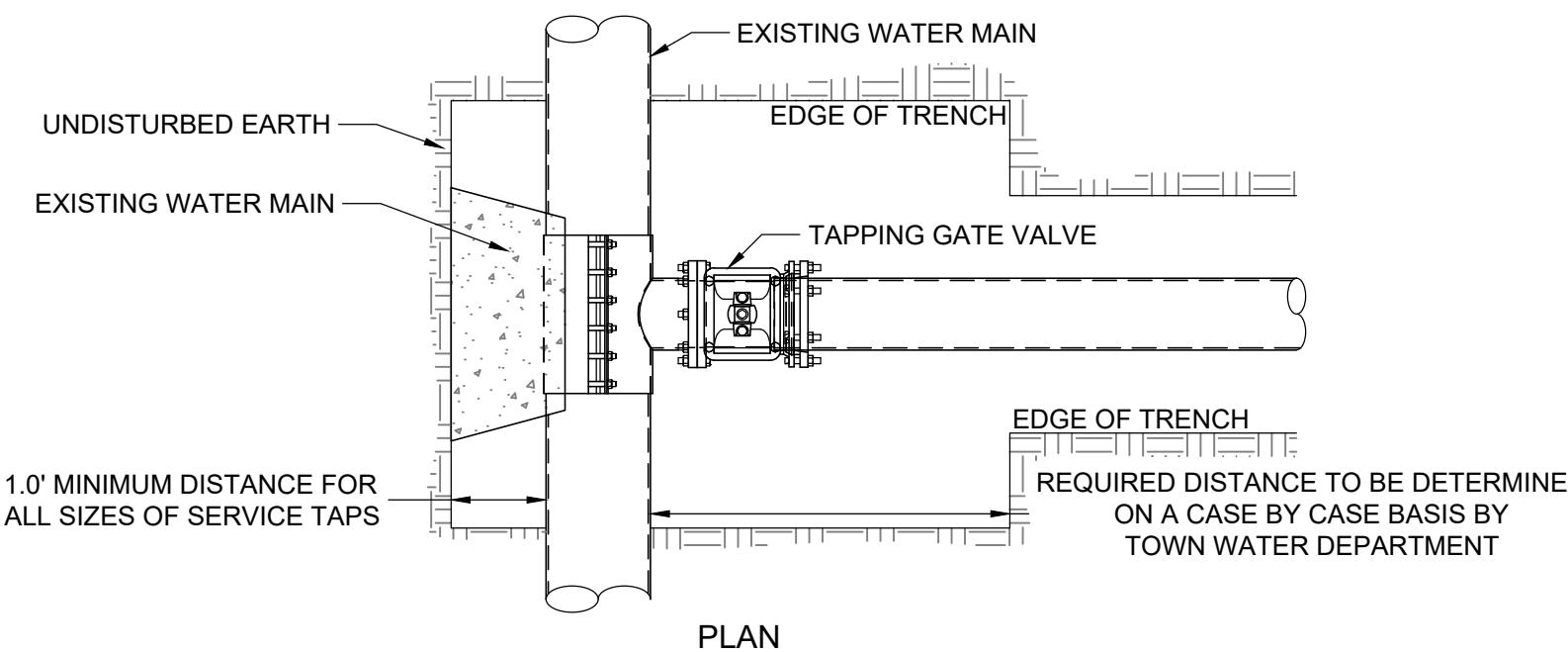
NOTE:

1. SIZE BLOCKS SHALL BE A MINIMUM OF 6" THICK
2. ALL BLOCKING SHALL BEAR AGAINST UNDISTRIBUTED MATERIAL
3. DESIGN IS BASED ON 150 PSI MAIN PRESSURE AND 2000 PSF SOIL BEARING CAPACITY.
4. 4 MIL POLYETHYLENE PLASTIC BOND BREAKER SHALL BE PROVIDED BETWEEN THRUST BLOCK AND WATER PIPE

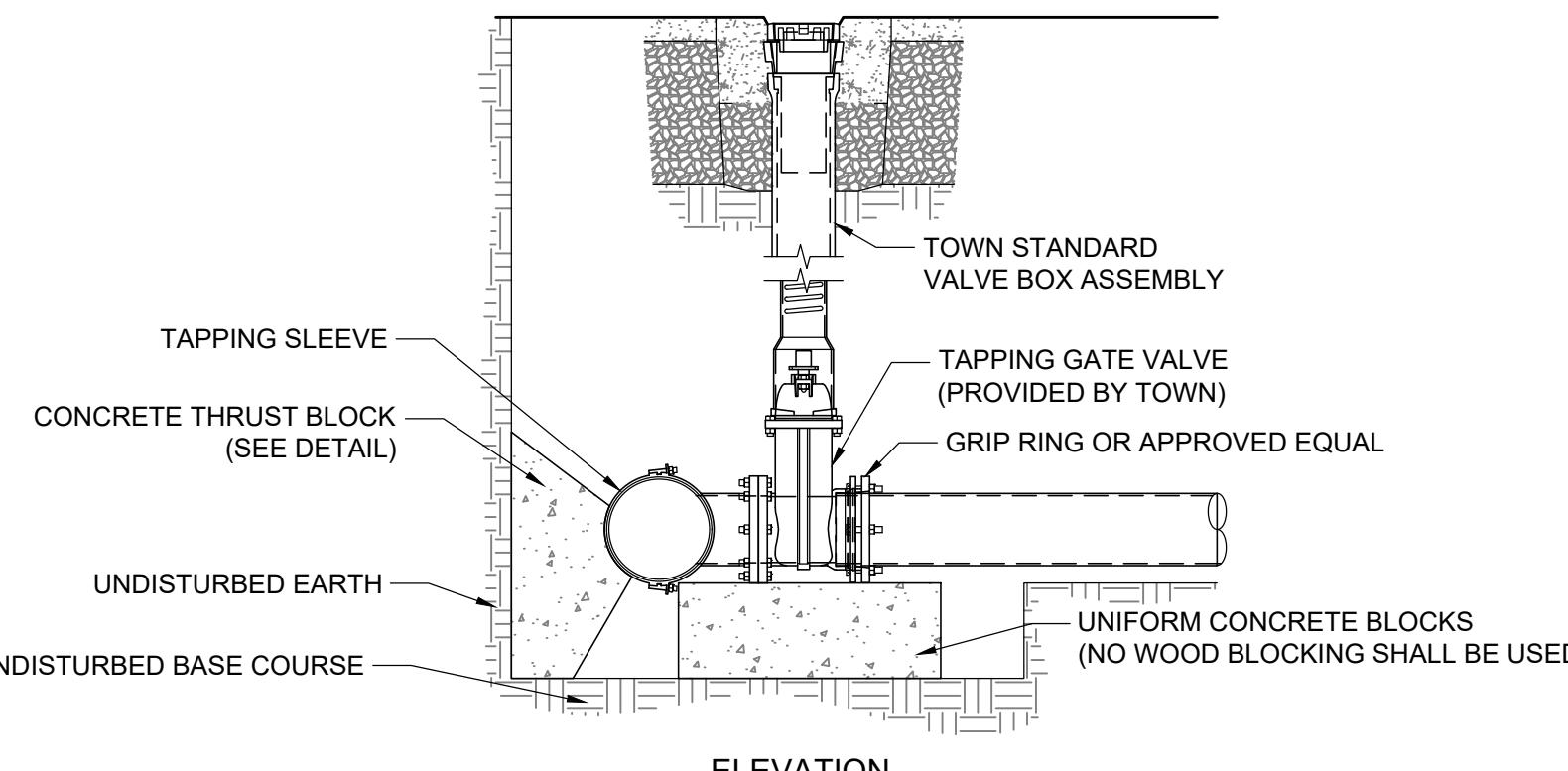


THRUST BLOCK DETAIL  
NOT TO SCALE

TOJ W-111



PLAN



NOTE

1. THE TOWN SHALL COMPLETE THE TAPPING OF THE MAIN. NO OTHER PERSONS SHALL COMPLETE TAP WITHOUT CONSENT OF TOWN. ALL OTHER WATER MAIN WORK SHALL BE THE RESPONSIBILITY OF THE OWNER.
2. TRENCH WILL BE EXCAVATED TO MEET ALL WYOMING STANDARDS PRIOR TO TAPPING.
3. EXCAVATION OF TAPPING LOCATION SHALL BE APPROVED BY TOJ WATER DEPARTMENT PRIOR TO TAPPING.

4  
WATER MAIN TAPPING DETAIL  
NOT TO SCALE

TOJ W-118

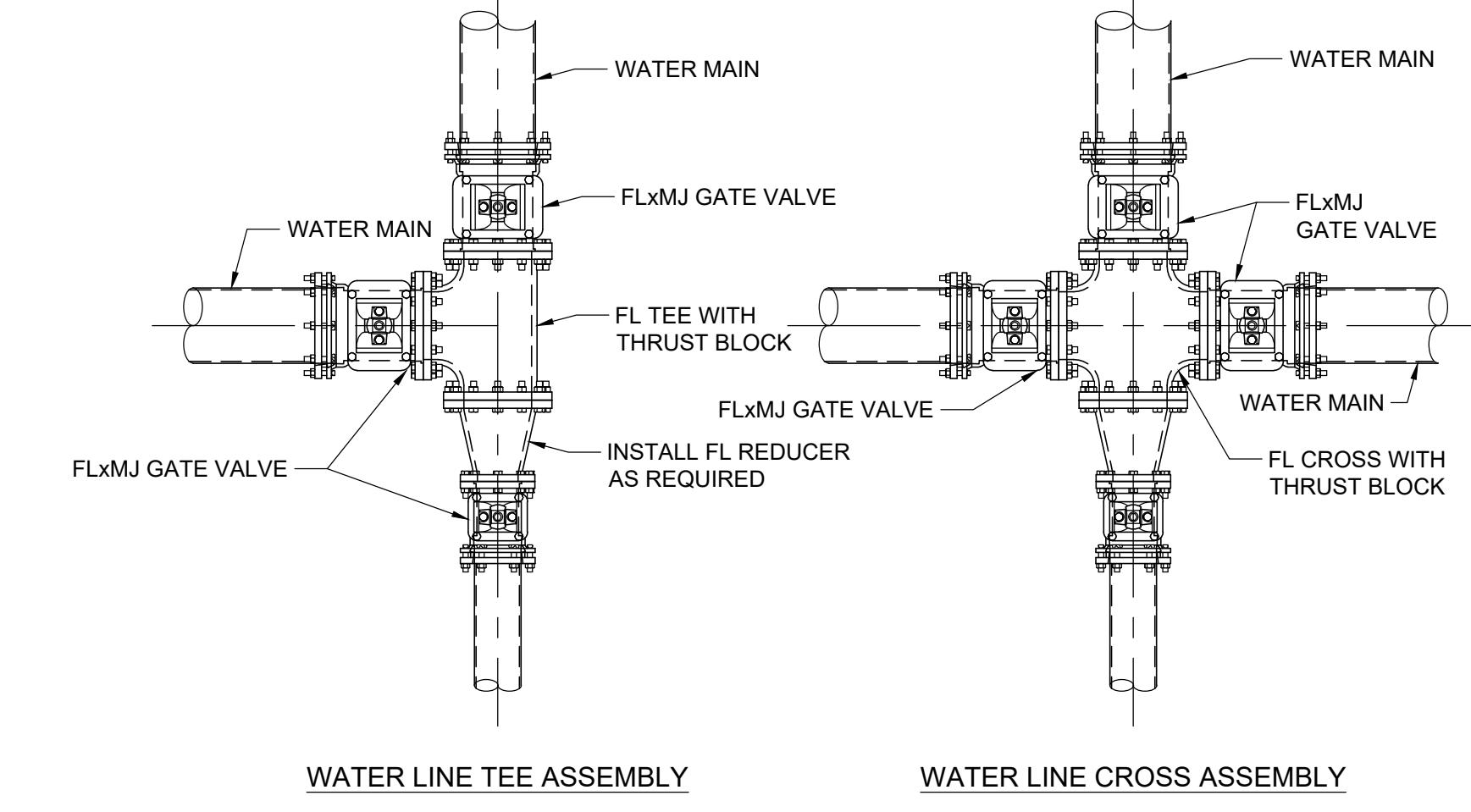
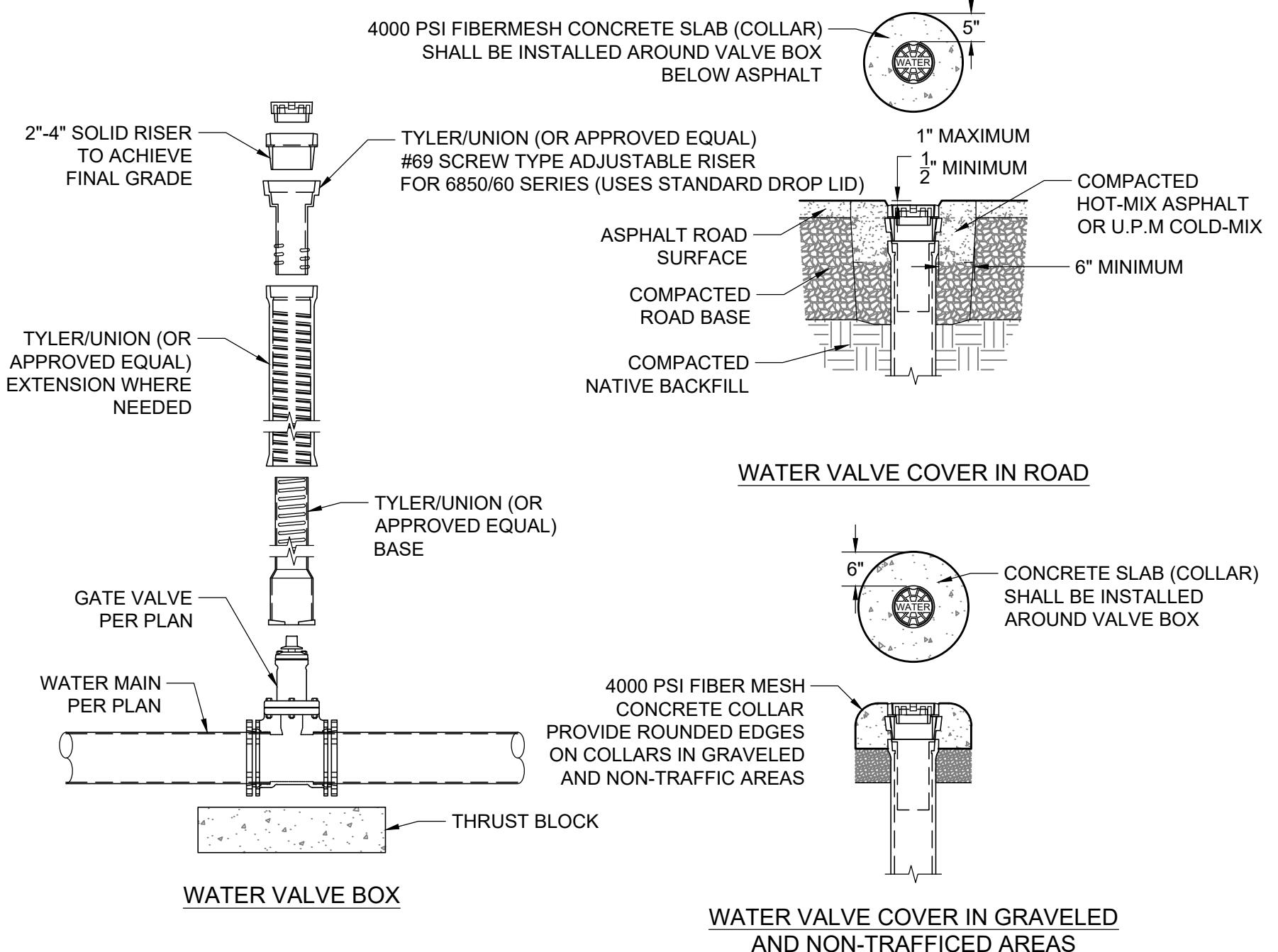
NOTES:

1. ADJUST MANHOLE UPWARD WITH ADJUSTING RINGS UNDER FRAME. ADJUST MANHOLE DOWNWARD BY REMOVING A PORTION OF THE MANHOLE RISER AND REBUILDING TO PROPER HEIGHT. SLOPE MANHOLE RING AS REQUIRED TO MATCH STREET GRADE AND SLOPE. MAKE FINAL MANHOLE ADJUSTMENT AFTER PAVING AND BEFORE SEAL COATING.
2. IF STORM DRAIN IS WITHIN UNPAVED AREA USE TAPERED COLLAR. SEE TOWN SANITARY SEWER DETAIL SS-110.

5  
STORM DRAIN MANHOLE AND VAULT ADJUSTMENT & COLLAR DETAIL  
NOT TO SCALE

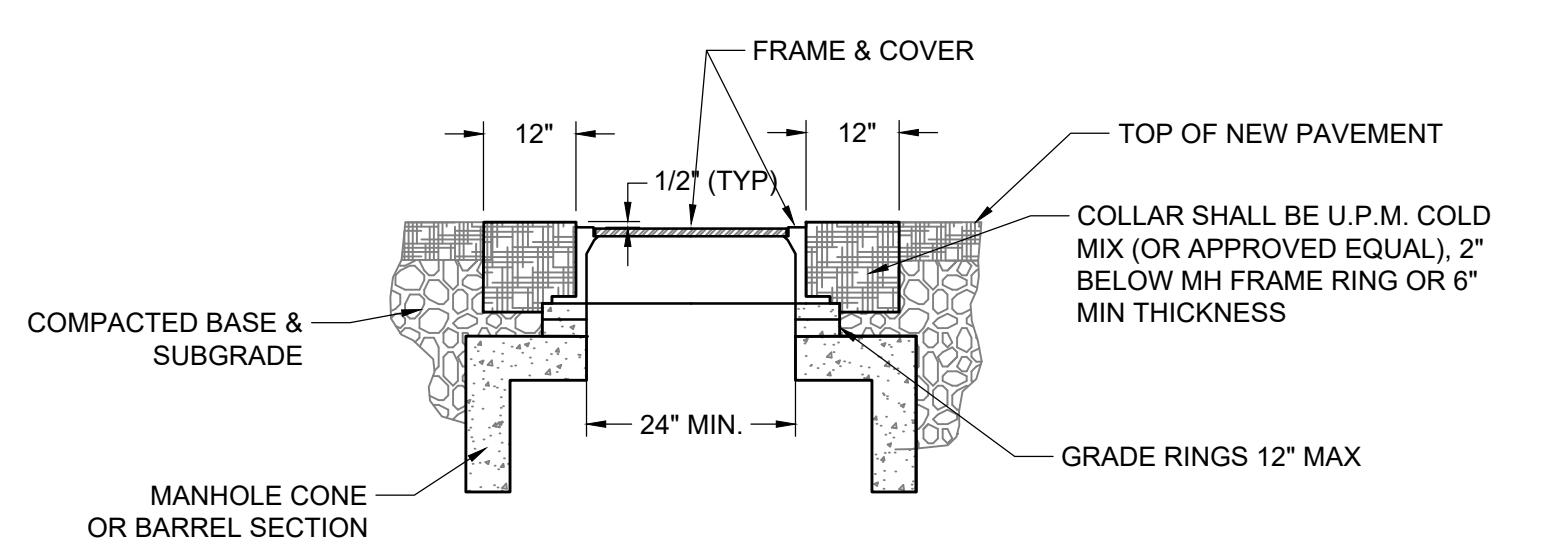
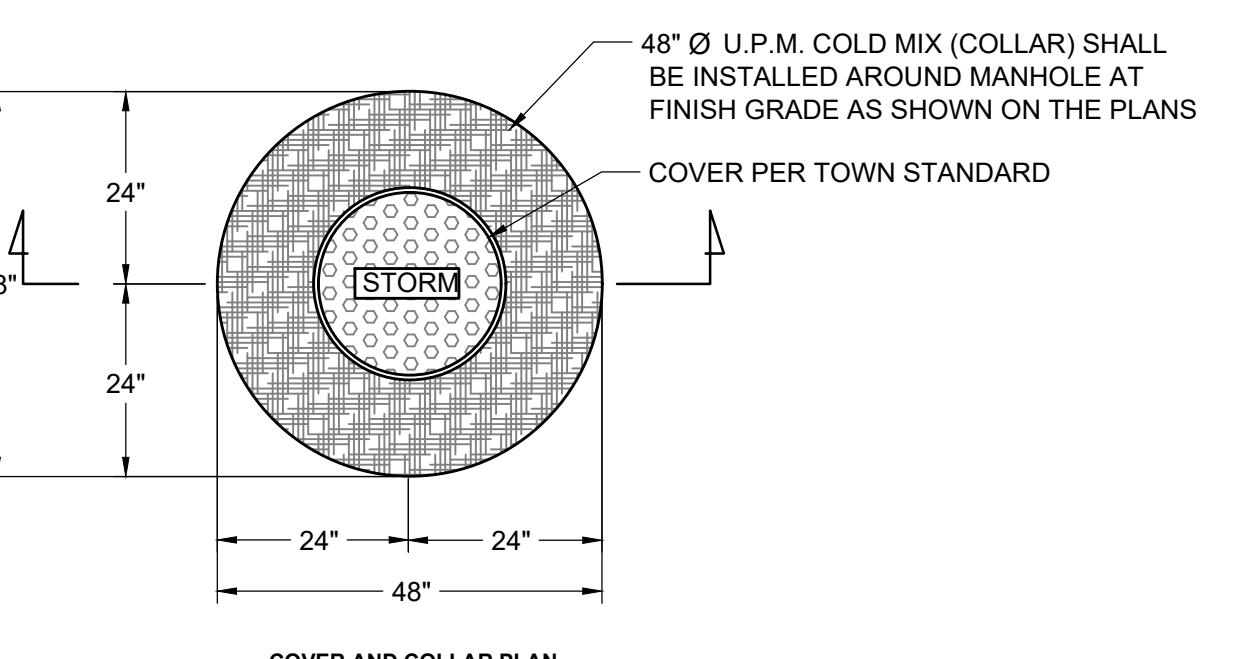
TOJ STM-103

- PRELIMINARY -  
SUBJECT TO CORRECTION  
AND APPROVAL



2  
C6.2  
WATER GATE VALVE DETAIL  
NOT TO SCALE

TOJ W-106



WATER DETAILS

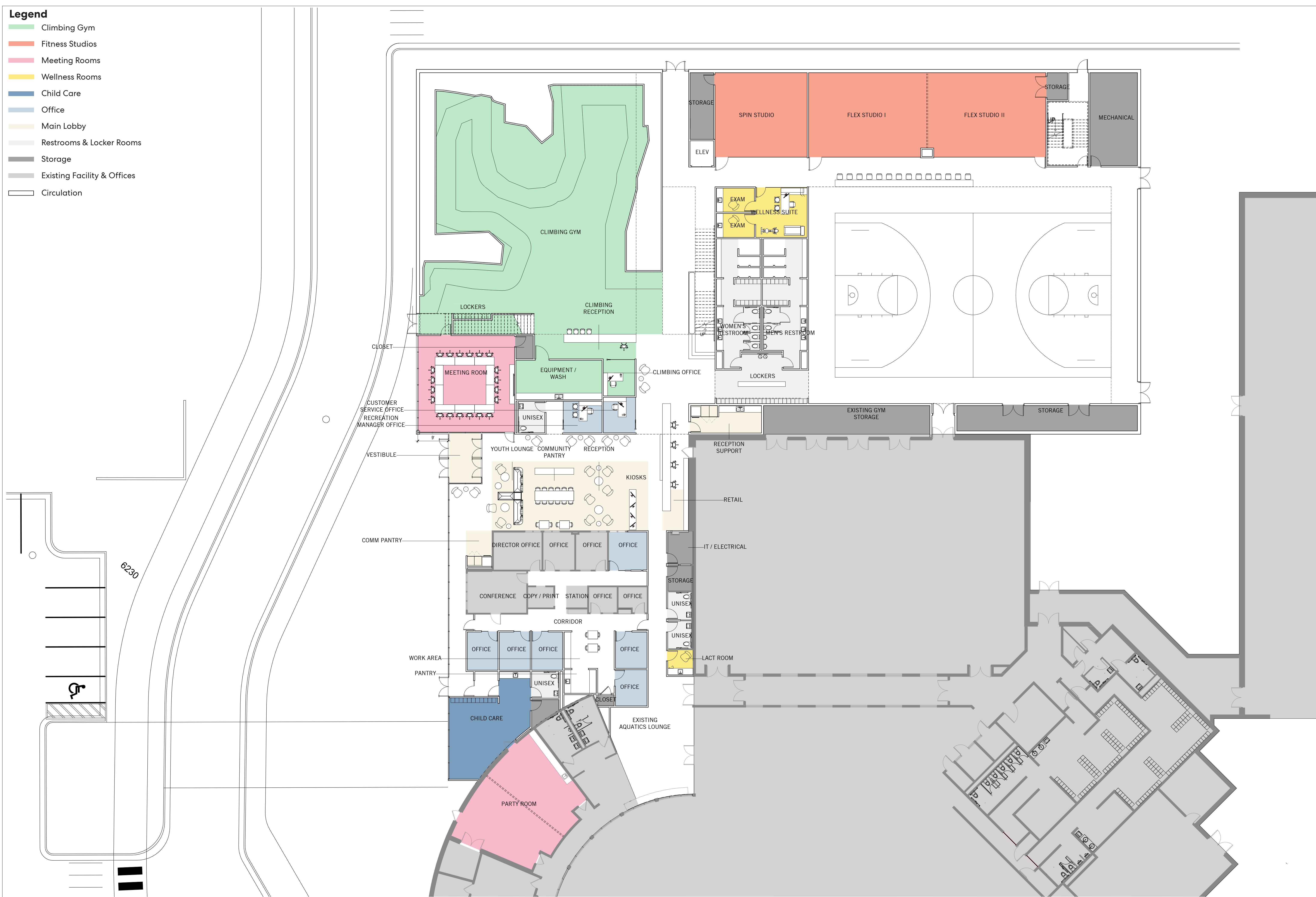
DRAFTED BY:	BS
REVIEWED BY:	TK
PLAN VERSION	DATE
70% SET	2021-08-10
PROJECT NUMBER	15063
SHEET	C6.0

PROJECT TITLE:  
TETON COUNTY/JACKSON RECREATION  
CENTER REDEVELOPMENT

PROJECT TITLE:  
TETON COUNTY/JACKSON RECREATION  
CENTER REDEVELOPMENT

## Legend

-  Climbing Gym
-  Fitness Studios
-  Meeting Rooms
-  Wellness Rooms
-  Child Care
-  Office
-  Main Lobby
-  Restrooms & Locker Rooms
-  Storage
-  Existing Facility & Offices
-  Circulation



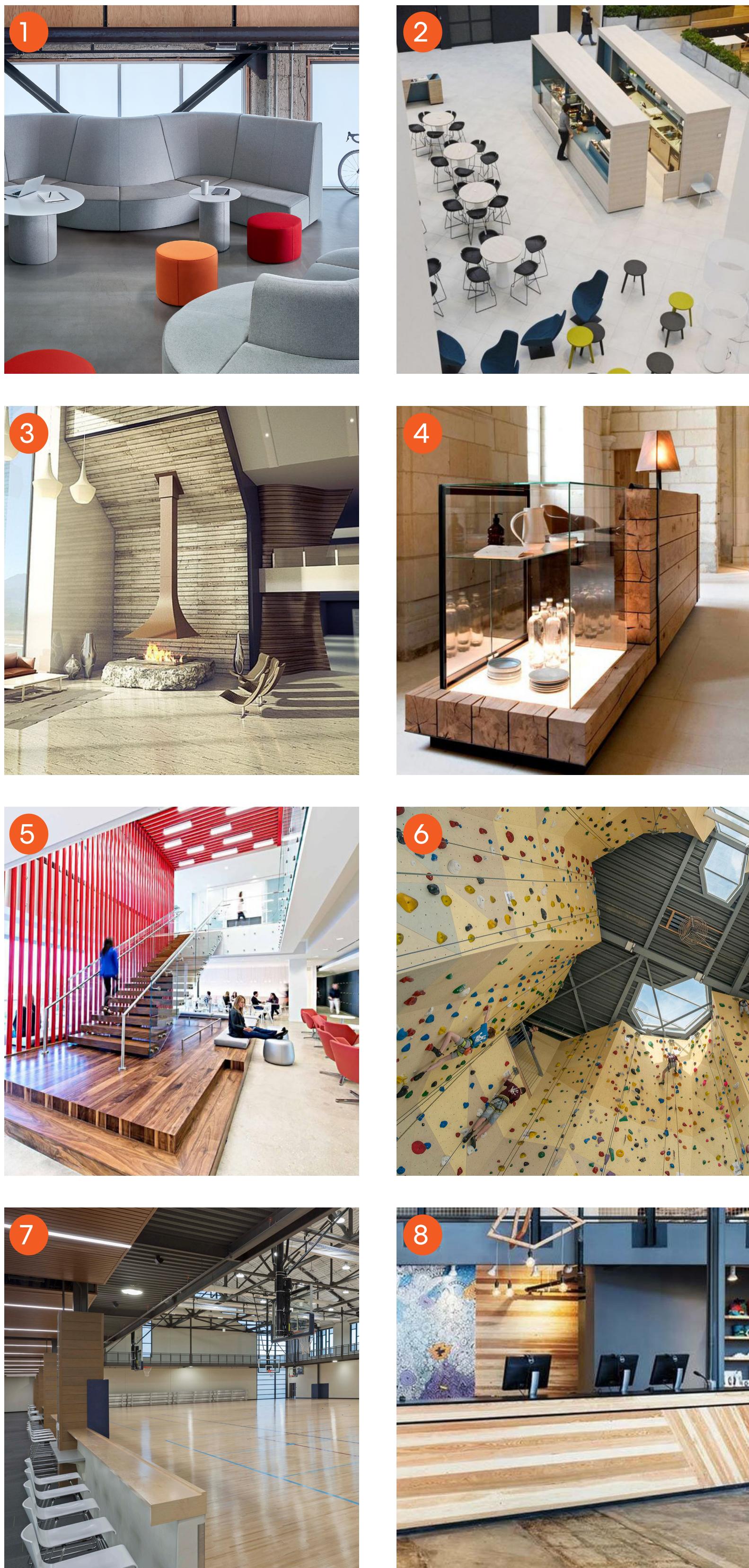
# JACKSON RECREATION CENTER IMPROVEMENTS TETON COUNTY/JACKSON PARKS & RECREATION

# LEVEL 01



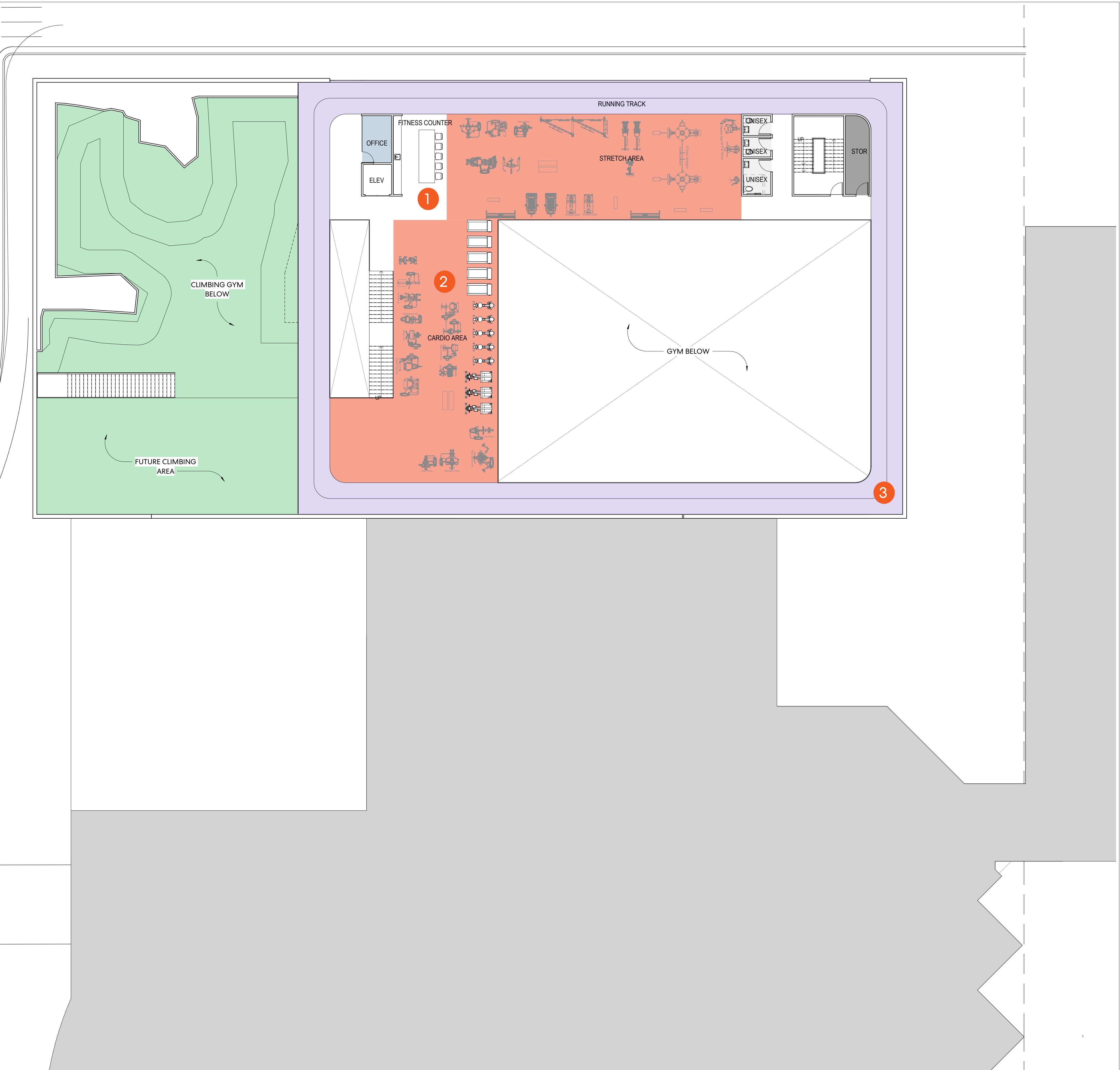
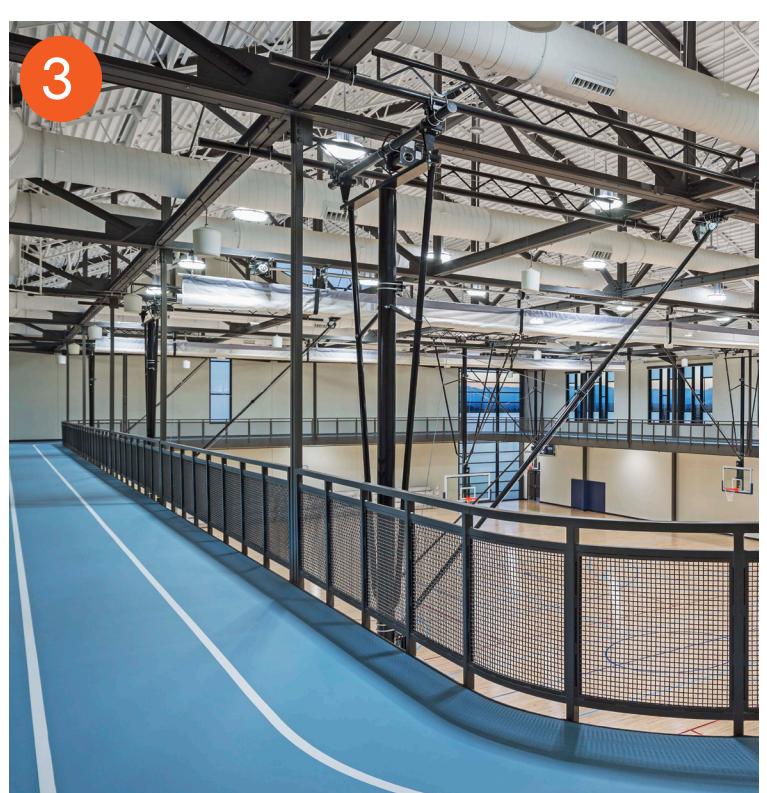
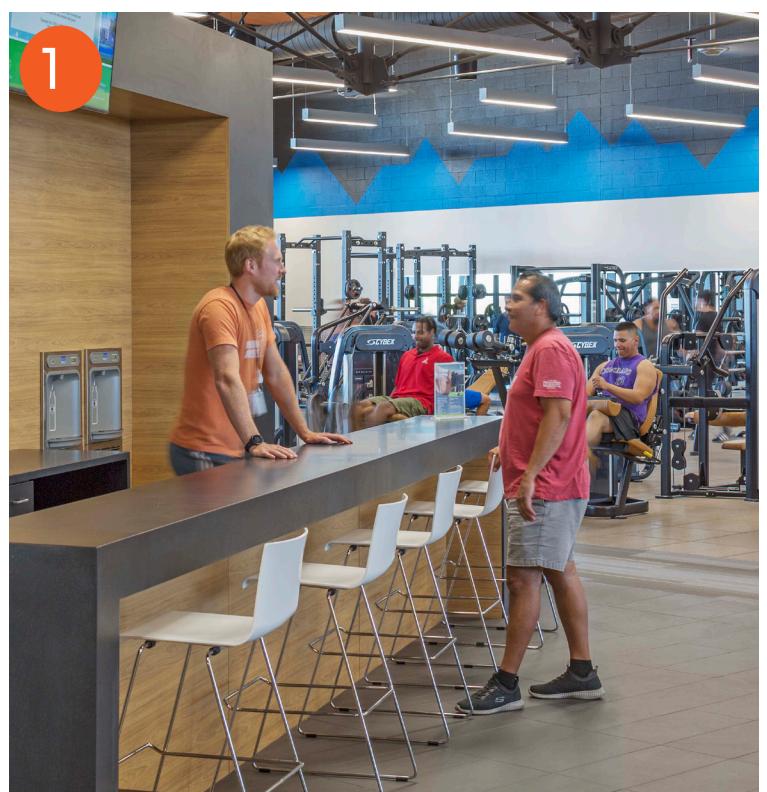
# Perkins&Will

## Concept Imagery

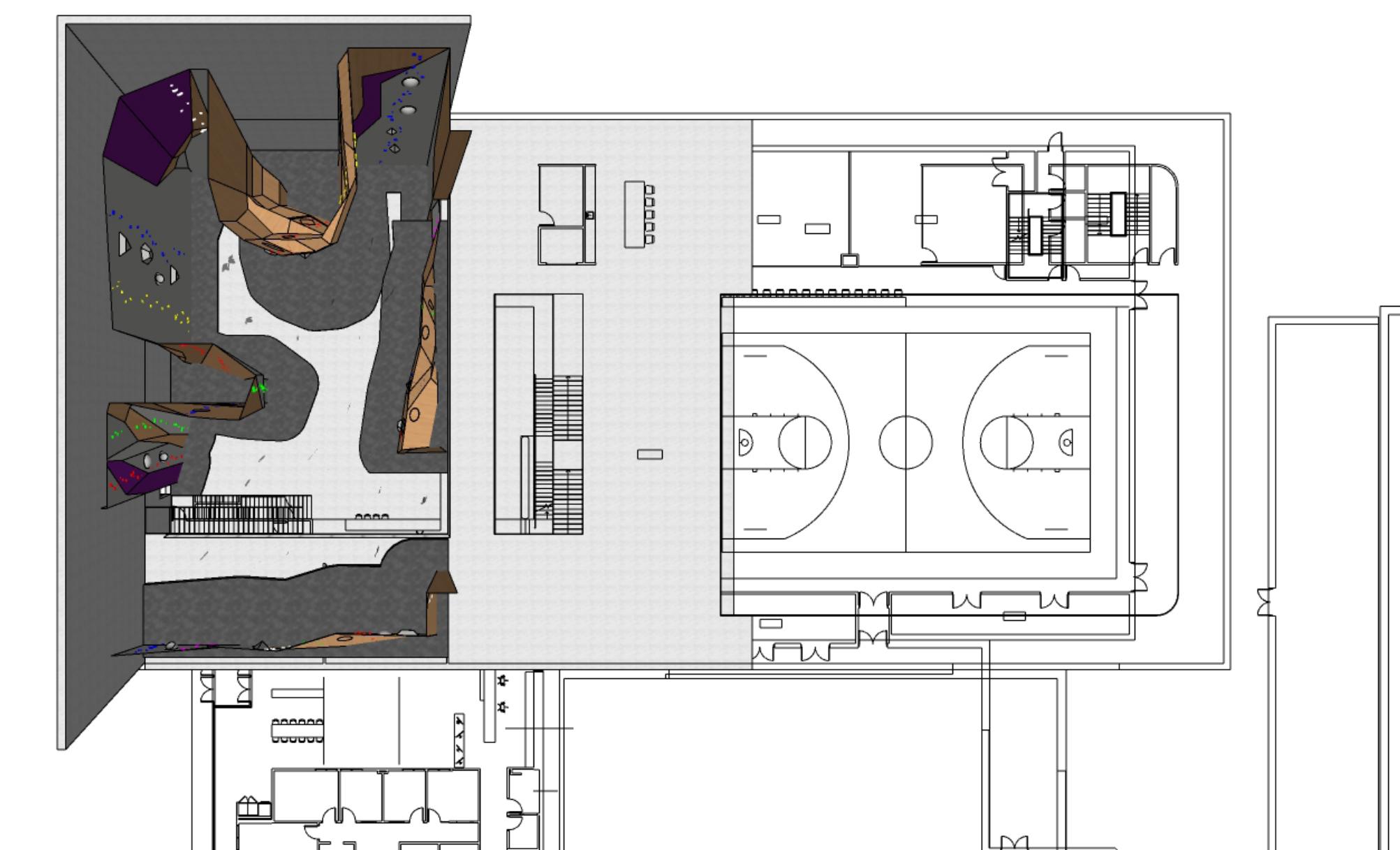
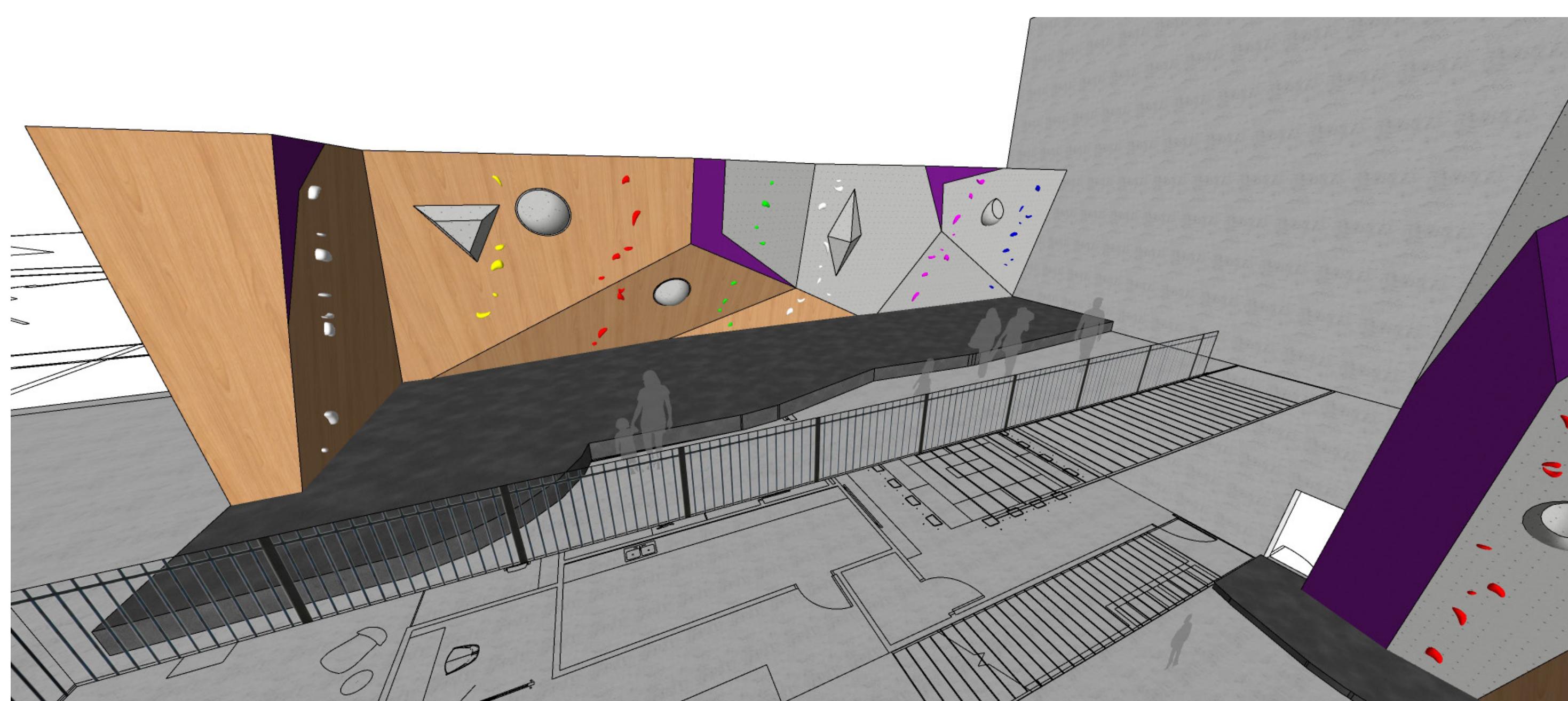
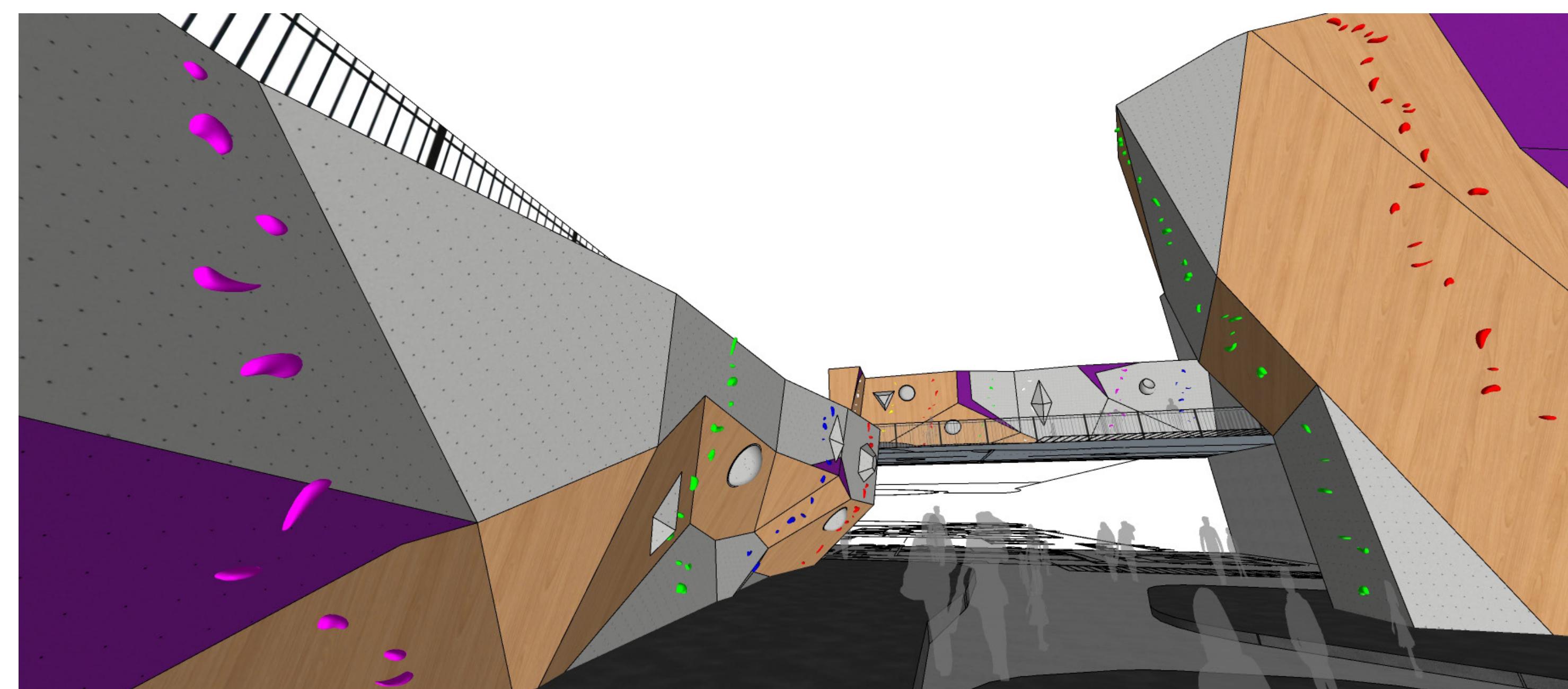
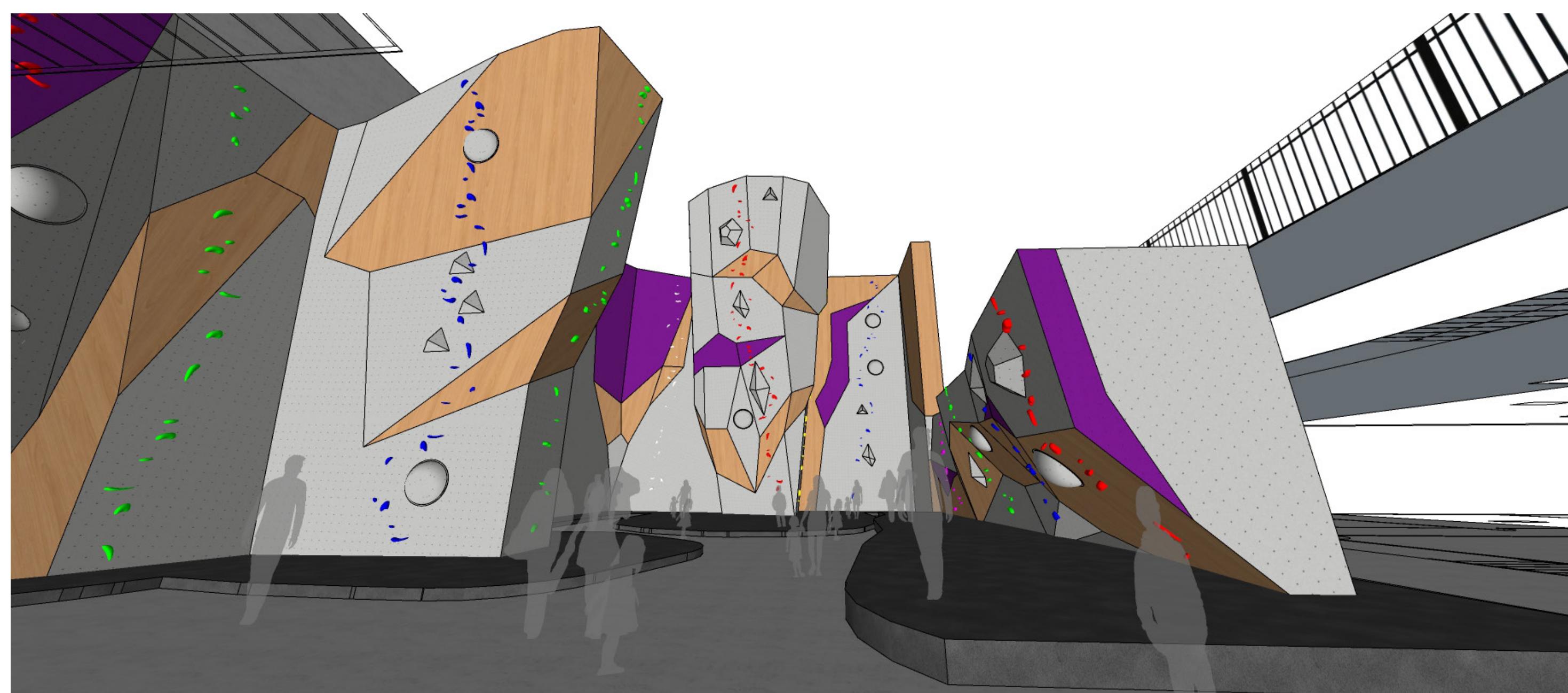
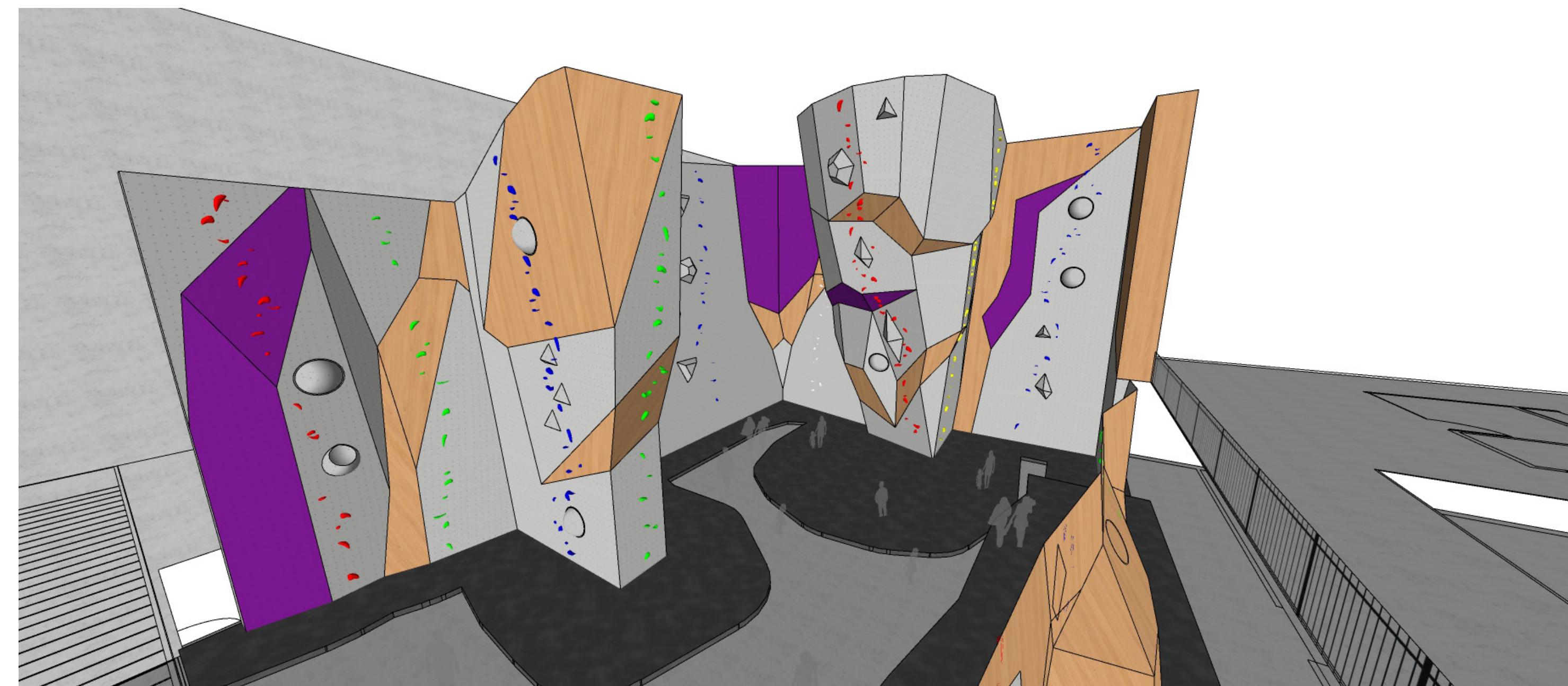
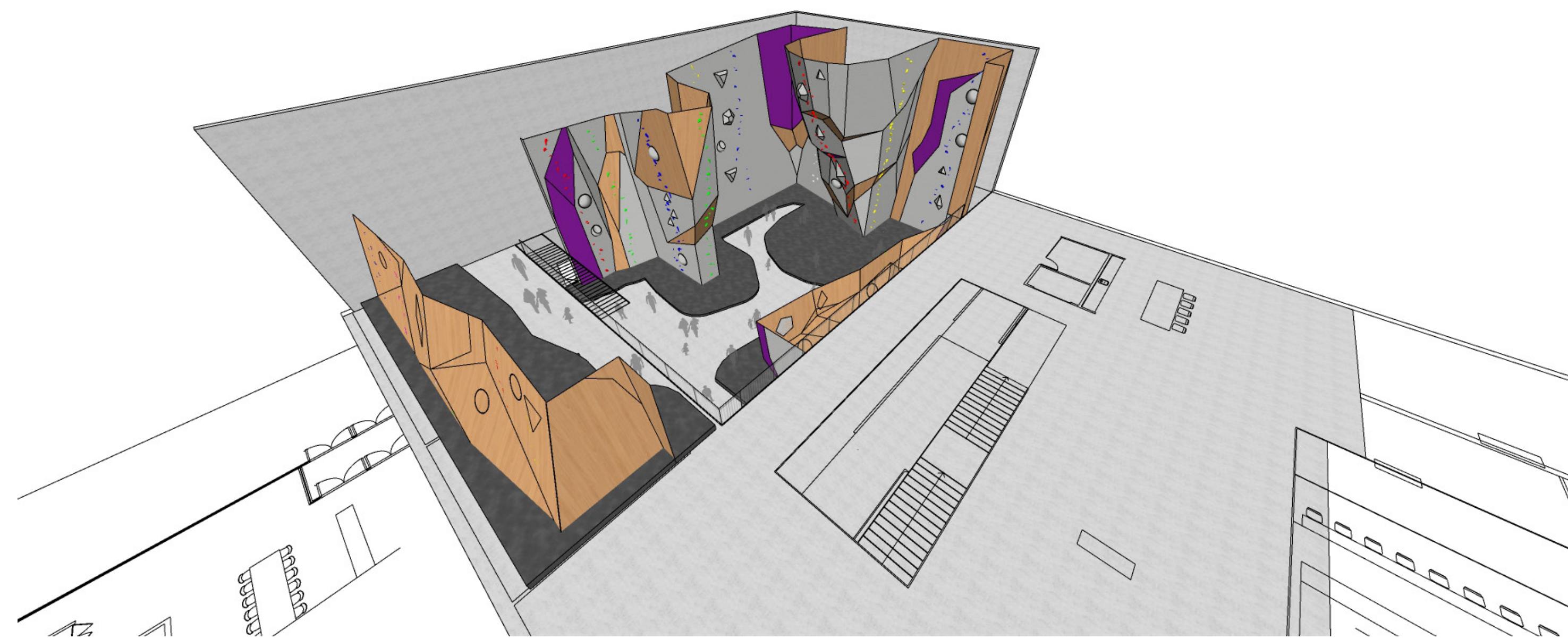


Legend	
	Climbing Gym
	Fitness Studios
	Meeting Rooms
	Wellness Rooms
	Child Care
	Office
	Main Lobby
	Restrooms & Locker Rooms
	Storage
	Existing Facility & Offices
	Circulation

#### Concept Imagery







JACKSON RECREATION CENTER IMPROVEMENTS  
TETON COUNTY/JACKSON PARKS & RECREATION  
08/09/2021

## CLIMBING GYM

Perkins & Will

# Jackson Recreation Center Improvements

---

Teton County/Jackson Parks & Recreation

Jackson, WY

PW Project No: 222011.00

August 13, 2021

## Architectural Design Narrative

### 1.0 INTRODUCTION

#### 1.1 Project Team

Owner:	Teton County/Jackson Parks & Recreation
Owner's Representative:	Wember / Berning Project Management
Architect:	Perkins&Will / Hoyt Architects
Civil & Structural:	Jorgensen
Landscape:	Inside Out
Mechanical/Plumbing/	The Ballard Group, Inc.
Fire Protection:	The Ballard Group, Inc.
Electrical:	Innovative Electrical Systems
AV:	Innovative Electrical Systems
Aquatics:	Aquatic Design Group
Climbing:	Entre-Prises
Energy:	Group 14 Engineering
Code:	West Coast Code Consultants

#### 1.2 Building Square Footage

First Level New Construction	26,890 GSF
First Level Renovation	4,685 GSF
Upper Level New Construction	12,025 GSF
<b>Total</b>	<b>43,600 GSF</b>

#### 1.3 Building Heights

Existing - Highest Building Elevation	Gymnasium + Solar Panels	± 50'-0" above grade
Proposed - Highest Building Elevation	Climbing Gym	45'-0" above grade

#### 1.4 Site Parking

Existing Site Parking	154 parking stalls
Proposed Site Parking	176 parking stalls

#### 1.5 Project Description

The project includes renovations and additions to the existing +/- 31,500 SF building located at 155 East Gill Avenue in the Town of Jackson, Wyoming, along with associated sitework, improvements, and landscaping. Likewise, the extension of North King Street is included in the project scope.

The First Level includes:

- Renovations to include:
  - Renovation of the existing staff offices to remove the existing lobby and add office functionality.
  - Pool party rooms
  - Replacement of the existing natatorium exterior storefront & clerestory windows
  - Renovation of the existing natatorium exterior façade & roofing
  - Renovation to the existing natatorium humidification
- Additions to include:
  - New main entry lobby
  - Climbing gym with support spaces
  - Community meeting room
  - Child care
  - Dry locker rooms & restrooms
  - Wellness suite
  - New gymnasium to incorporate another basketball court and additional storage area
  - Spin room
  - Large group exercise room, divisible into two separate spaces
  - Storage
  - Stairs and elevators to upper level spaces

The Upper Level includes:

- 2-lane elevated track around expanded the new gymnasium and fitness areas.
- Parks and Recreation staff office
- Fitness areas for cardio and strength training
- Staffed fitness counter

- Restrooms
- Storage
- Future climbing wall

## 2.0 ARCHITECTURAL DESIGN NARRATIVE

The Schematic Design Drawings illustrate the proposed improvements to the Jackson Recreation Center.

### 2.1 Building Envelope

The existing building is a combination steel-frame and load-bearing masonry structure with CMU veneer. New building additions will likewise be a combination of steel-frame and load-bearing masonry construction. New exterior wall construction shall meet R-21 thermal requirements.

New exterior façade materials include wood cladding, metal panels, and glazing systems.

Steel-frame sections of exterior walls will be infilled with 6" metal stud framing at 16" O.C., R-19 batt insulation, 5/8" exterior grade gypsum sheathing, vapor barrier, and 3" thick continuous rigid insulation systems, beneath applicable façade materials. Continuous sill gaskets shall be installed at all exterior stud walls.

Load-bearing masonry sections of exterior walls will consist of 8" or 12" CMU (see structural for reinforcing requirements), with ladder-type horizontal joint reinforcement at 16" O.C. Fluid applied waterproofing and 3" thick continuous rigid insulation shall be installed beneath applicable façade materials.

Wood-clad façade sections shall be installed atop 3" continuous rigid insulation systems over vapor barrier, 5/8" exterior gypsum sheathing over metal stud / steel or masonry structural substrates.

Metal panel sections shall be installed atop 3" continuous rigid insulation systems over vapor barrier, 5/8" exterior gypsum sheathing over metal stud / steel or masonry structural substrates.

Glazed façade sections shall include storefront and curtainwall systems. Clear low-E insulated glazing units with a variety of mullion depths and possible sunshades are anticipated. Sill pan flashings shall be set in continuous sealant bed, when glazing extends to Finish Floor Elevation.

## 2.2 Building Roof

The majority of existing building roofs are ballasted, EPDM membrane roofing systems over tapered insulation on rigid insulation board, over vapor barrier layer on protection board on existing structure. There are some sections of standing seam metal roofing systems, particularly over the existing Natatorium space.

New roofing systems to match existing shall be employed where tying into existing systems occurs (i.e., Gymnasium and Natatorium). An existing solar array atop the Gymnasium roof will also likely be extended.

Where new additions are not tied to existing roof systems, unballasted membrane systems over tapered- and rigid-insulation are anticipated. New roof assemblies shall meet R-49 thermal requirements.

Exterior building exits shall have prefinished metal canopy systems overhead.

## 2.3 Building Foundations and Structure

See Structural Narratives.

## 2.4 Cold-Formed Metal Framing

As indicated in Section 5.1, 6" metal studs shall be used at portions of the building perimeter.

Likewise, some locations of interior non-load bearing walls shall be constructed with 6" metal studs at 16" O.C. However for the majority of interior non-load bearing walls, 3-5/8" metal studs at 16" O.C. will be employed.

See Structural Narratives for further information.

## 2.5 Metal Stairs and Railings

Enclosed egress stairs will be steel-framed stringers with metal risers, sub-tread pans, and sub-platforms (for concrete fill). Hand- and guard-rails in egress stairs shall be painted steel with decorative metal mesh infill panels.

Monumental stair design is anticipated to incorporate open risers with decorative wood / stainless steel hand- and guard-rails, with decorative stainless steel / glass / etc. infill panels. Likewise, the Mezzanine Level's balcony overlook into the Lobby shall utilize a decorative guardrail of stainless steel / glass / etc. infill panels.

Guardrails for the elevated Track are anticipated to be painted steel with decorative metal mesh infill panels.

Guardrails for the Wellness Area that overlooks the Climbing Area shall utilize a decorative guardrail of stainless steel / glass / etc. infill panels.

## 2.6 Casework

The Control Desk shall be a custom design and may incorporate wood, stone, glazing and metal. Work surfaces shall be solid surface with undercounter base cabinetry.

Restrooms/locker rooms shall have solid-surface/concrete/quartz/etc. lavatory countertops with undermount stainless steel bowls. Additional vanity counters provided in restrooms shall also be solid-surface/concrete/quartz/etc.

Break areas shall have plastic laminate base- and wall-cabinets with solid-surface countertops.

Child Watch & Pool Party shall have plastic laminate base- and wall-cabinets with solid surface countertops. Single-bowl stainless steel sinks are also anticipated in these rooms.

Upper Level fitness counter shall have both base- and full-height wood casework with a solid-surface/concrete/quartz/etc. countertop.

Storage areas' shelving units shall be furnished by Owner, installed by Contractor.

## 2.7 Building Insulation

3-1/2" and 5-1/2" unfaced sound attenuating insulation is anticipated for use at all interior metal stud partition walls, full height of walls.

Multi-layer polyisocyanurate insulation is anticipated under roofing systems.

5-1/2" R-19 thermal batt insulation is anticipated for use at all metal stud framed exterior wall systems.

Masonry foam insulation for exterior CMU walls is anticipated.

## 2.8 Through-Penetration Firestop Systems

Includes fire-stop systems at rated walls.

## 2.9 Doors, Frames and Hardware

Existing doors varieties include aluminum storefront, insulated hollow metal, and solid core plastic laminate clad doors. All existing doors and hardware shall be evaluated for refurbishment / repair / replacement.

New Lobby Entrance and Vestibule doors are anticipated to be an all-glass system.

Other exterior doors and frames shall be a combination of aluminum storefront and 1-3/4" insulated hollow metal doors with 16 gauge fully-welded hollow metal frames.

Interior doors and frames shall be a combination of aluminum storefront and 1-3/4" hollow metal doors in 16 gauge fully-welded hollow metal frames.

Some interior doors shall have vision panels.

Door hardware shall be mortised and heavy-duty.

Security access controls are anticipated for all exterior doors and some interior locations as well.

#### 2.10 Glazing

Exterior doors – 5/8" insulating glass, tempered where required by code.

Exterior windows in storefront, or curtainwall – 1" insulating glazing, tinted, tempered where required by code; some with ceramic frit patterns.

New exterior skylights shall be installed in the Gymnasium Expansion, to match the existing systems.

Interior non-rated windows and door vision panels will be 1/4" float glass.

Meeting room will have full glass walls and doors. Sliding and swinging doors are being considered.

#### 2.11 Gypsum Board Assemblies

Interior partition walls shall be constructed of either 3-5/8" or 6" metal studs, 20 gauge minimum.

Gypsum board to be 5/8", Type X where indicated for fire-rated conditions.

Shaftwall systems are anticipated for interior chases and shafts.

Provide water-resistant gypsum board at all areas exposed to moisture (plumbing walls for toilets and lavatories, ceramic tile finish, etc.).

All fire-rated walls shall extend to the structural deck above.

#### 2.12 Ceilings

It is anticipated that the majority of new space will have exposed ceilings to the floor/roof structure above – particularly in the Gymnasium Addition & Climbing Spaces.

Gypsum board ceilings, bulkheads and light-cove details are planned for both new and renovation work. Access panels shall be provided as required by code in all hard ceiling systems.

Wood ceiling systems are also anticipated in some locations.

Acoustical ceiling tile systems are planned for most enclosed rooms – private and open offices, storage rooms, multipurpose rooms, meeting rooms, etc. Basis of Design: Armstrong “Dune”, regular edge with 15/16” white grid suspension system.

Service areas such as Mechanical Rooms, Receiving Areas, etc. shall have exposed ceilings to floor/roof structure above.

Sprinkler head shall be centered in ceiling tiles.

Existing solar tubes shall be incorporated into the ceilings of renovated areas.

See Reflected Ceiling Plans for further information.

## 2.13 Finishes

### A. Lobby / Control Desk

1. Floor – combination porcelain tile / natural stone tile / polished concrete, with carpet tile seating areas (32 oz./yard). Vestibule to have integral, recessed entry mat.
2. Base – porcelain tile
3. Walls – combination painted gypsum board, glass, stone and wood veneers
4. Ceiling – combination gypsum board, wood ceiling systems and exposed to painted structure above

### B. Corridors

1. Floor – polished concrete
2. Base – 4” rubber base
3. Walls – painted gypsum board
4. Ceiling – combination gypsum board and acoustical ceiling tile systems

### C. Offices (Private and Open) / Conference Rooms

1. Floor – carpet tile (32 oz./yard)
2. Base – 4” rubber base
3. Walls – combination painted gypsum board and frameless glass storefront at office entry walls.
4. Ceiling – acoustical ceiling tile systems
5. Specialties / Equipment –
  - i. A/V systems at all conference rooms

D. Pool Party Room

1. Floor – modular linoleum system
2. Base – 4" rubber base
3. Walls – painted gypsum board / painted CMU
4. Ceiling – acoustical ceiling tile systems

E. Child Watch

1. Floor – carpet tile (32 oz./yard)
2. Base – 4" rubber base
3. Walls – painted gypsum board
4. Ceiling – acoustical ceiling tile systems

F. Locker Rooms / Restrooms

1. Floor – 2"x2" ceramic tile
2. Base – 6" ceramic tile base
3. Walls – combination painted gypsum board and glazed tile in wet areas (full height of walls)
4. Ceiling – water-resistant gypsum board and water-resistant acoustical ceiling tile systems
5. Specialties / Equipment –
  - i. New lockers shall be 15" phenolic resin lockers, double tier with lockable doors
  - ii. Miscellaneous toilet accessories
  - iii. Solid plastic toilet- and shower-partitions and urinal screens

G. Gymnasium

1. Floor – Resilient rubber sports flooring
2. Walls – painted concrete block & wall padding
3. Ceiling – exposed painted structure
4. Specialties / Equipment –
  - i. (2) wall-mounted scoreboards
  - ii. Motorized divider curtain
  - iii. (6) retractable backboards

H. Climbing Area

1. Floor – sealed concrete
2. Walls – painted gypsum board / CMU
3. Ceiling – painted exposed structure
4. Specialties / Equipment –
  - i. Climbing wall system via the Design/Build method with climbing wall designer

I. Group Exercise & Fitness Areas

1. Floor – resilient rubber tile sports flooring

2. Base – 4" rubber base
3. Walls – painted gypsum board
4. Ceiling – exposed painted structure or acoustical ceiling tile systems (see Reflected Ceiling Plans)
5. Specialties / Equipment –
  - i. Ceiling fans
  - ii. Sound systems

J. Mechanical / Electrical / Etc.

1. Floors – sealed concrete
2. Base – 4" rubber base
3. Walls – epoxy painted CMU / gypsum board
4. Ceilings – exposed epoxy-painted structure

#### 2.14 Louvers / Vents

Prefinished metal louvers will occur on the building exterior as required for HVAC ventilation.

#### 2.15 Signage / Graphics

Departmental, directory and other signage shall be included as an allowance (interior and exterior).

Likewise, graphics shall be included as a separate line item allowance.

#### 2.16 Fire Protection Specialties

Fire extinguishers and stainless steel cabinets shall be included as required by code.

#### 2.17 Equipment

Some existing equipment will be relocated.

Appliances shall be Owner-furnished, Contractor-installed.

#### 2.18 Furnishings

New furniture shall be provided and installed by the Owner's vendor.

#### 2.19 Special Construction

Marker boards and other visual display boards are anticipated in meeting areas.

A motorized folding panel partition wall system is required in the First Floor Multi-purpose Fitness Room.

Three (3) ground-set flagpoles should be included.

2.20 Conveying Systems

One machine room-less electric traction elevator is included.

END OF NARRATIVE



## Teton County/ Jackson Recreation Center Redevelopment Engineer's Narrative - Site Civil

### **General Description**

The Teton County/ Jackson Recreation Center looks to renovate and expand recreation amenities on to the existing Recreation Center built in 1994, with a partial renovation completed in 2019. The scope of the project includes building expansion for the following uses:

#### ***Interior Improvements:***

- Gymnasium
- Elevated Walking/ Running Track
- Climbing Gymnasium
- Multi-purpose Fitness Studios
- Cardio Studios
- Health Consultation Rooms
- Drop-in Daycare
- Multi-purpose/ Birthday Party Room
- Classroom
- Study Lounge
- Associated Restrooms, Dry Locker Rooms, Storage, Mechanical and Circulation

#### ***Exterior Improvements:***

- Zero-depth Splash Pad and Patios
- Outdoor Bouldering
- Outdoor Playground

### **Surface Improvements**

This narrative covers the site civil components to the work. As part of the overall redevelopment of the Rec Center site and the development of housing to the north of the Rec Center, the Town of Jackson approved the extension of North King Street from Gill Avenue to Merill Avenue through the Rec Center site. The interior and exterior expansion to the existing Rec Center requires a slight realignment of the approved North King St. Extension. North King St. will connect from Gill St to Mercill Ave with the approved streetscape section. This section provides a 10' multi-use path and 5' landscaping buffer along the west side of the road, a 21' driving corridor, an 11' wide bus pullout, and variable width sidewalks with a minimum width of 6' along the east side and a maximum width of 10' adjacent to the bus pullout.

The realignment of North King St. and expansion of the building will require the redevelopment of the 3 existing parking areas. New vehicle and pedestrian circulation is proposed. The parking areas have 9' wide spaces with variable length between 18' and 20' depending on their location.

#### ***South Parking Area:***

- 43 Total Spaces
- 5 Handicap Spaces



***West Parking Area:***

- 106 Total Spaces
- 1 Handicap Spaces

***North Parking Area:***

- 27 Total Parking Spaces

The pavement section currently being considered for King Street is the same as has been used on other Town streets. The parking lots will get a pavement section that is slightly less robust. Curb and gutter, parking lot islands, and other streetscape elements are incorporated. The King and Gill intersection is being redone through a separate Town project, but the configuration will show up in plans for the Rec Center to illustrate the connection of the two projects.

***4" King Street Pavement Section***

- Mirafi 380I geotextile fabric
- 12" of pit run
- 6" of crushed gravel

***3" Parking Lot Pavement Section [not sure about this but it is worthy of consideration]***

- Mirafi 380I geotextile fabric
- 9" of crushed gravel

***Underground Utility Improvements***

***Storm Sewer:***

The Town has made the realignment of the Cache Creek Tube (CCT) a priority in recent years. The CCT is a 48" storm sewer conveyance system that will be routed down the centerline of the North King St. extension in front of the Rec Center from Gill St to Mercill Ave. This will require the installation of four precast storm sewer vaults at the CCT angle points. A stormwater treatment unit will be installed parallel to the CCT as part of this project that will require additional vaults and piping.

With the redevelopment of the parking area, new storm water inlets, branch lines, and a storage and infiltration system will be required. Overflow to the CCT will be provided.

***Water Main:***

A new 8" water main will be installed from Gill St. to Mercill Ave. Multiple gate valves, services and a fire hydrant will be installed.

***Sanitary Sewer:***

The sanitary sewer will require realignment after the addition of the CCT to the road corridor. Multiple manholes and services will be a part of the sanitary sewer realignment. An extension to the sanitary sewer main through King Street is being considered to service the addition. A main line extension with the project is being considered to avoid connecting the new building drains to the existing interior piping.

Teton County Parks and Recreation  
Recreation Center Expansion  
Schematic Development Narrative – Landscape

Overall Concept – Water in the Landscape

The Rec Center is associated with water, with the indoor pool being a destination for many Jackson residents and visitors. This concept of water in the landscape will be apparent throughout the new landscape design. Conservation of water, a new splash pad, and a dry stream bed will be essential features in the design.

Splash Pad

While designing the splash pad, we will keep in mind that it needs to be an attractive feature through all four seasons. Considering that it will only have water for four months, it is essential to have beautiful elements all year round.

Water Conservation

Drought tolerant plant material will be used in this design. These will include native perennials, ornamental grasses, turf, trees and shrubs. The amount of turf will be limited to keep our goal of water conservation in mind.

Dry Stream Bed

The dry stream bed will further the idea of water in the landscape and act as a drainage area where necessary.

Site Furniture and Site Amenities

Tables, chairs, bike racks, trash cans, tree grates, and raised planters will be critical in the landscape design. The Recreation Center has always been a focal point of the community and these design elements will further this idea by having a common theme throughout the project.

Public Art

The outdoor space at the Rec Center will be a perfect spot for public art. We feel that one spot should be dedicated to a piece of art that can change with seasons or particular activities at the Rec Center.



August 11, 2021

Perkins & Will Architects  
Mr. Brandon Lucero  
475 Lincoln Street, #100  
Denver, CO 80203

RE: Structural Narrative for Schematic Design Documents for the Teton County Recreation Center Expansion Project in Jackson, Wyoming, (JA# 15063)

Dear Mr. Lucero,

This narrative is meant to describe the anticipated structural building elements of the Teton County Recreation Center Expansion. These elements will need to be designed and sized during the Design Development phase of the project but should give other design teams and contractors the necessary information to aid in the design and cost estimating for the project. Below are the anticipated building elements:

### **Building Foundation**

- Based on the geotechnical investigation information provided by Nelson Engineering for the project, the foundation system for the building will be helical piers with grade beams or pile caps to support the building above.
- The at grade floor will be a reinforced concrete slab over reinforced engineered fill.
- Special considerations will need to be taken to ensure the locations where the new foundations butt up against the existing building structure perform in a similar manner to ensure similar building movements.

### **Building Structure**

- The exterior structure of the building will be concrete masonry units, (CMU), matching the existing building.
- The exterior supports for the interior building elements will be CMU or concrete pilasters incorporated into the exterior walls.
- The interior structure of the building will be structural steel beams and columns with steel stud framing interior partition walls.
- The upper level floors will be composite concrete and metal deck floors supported on open web joists. The floor under the exercise equipment area will need to be tuned mass damped to account for the anticipated vibrations from the equipment use.
- The running track on two sides of the new gymnasium will be composite concrete slab with struts from the roof structure to support the track structure.

- The roof structure will be open web trusses on steel clear span girders, and a corrugated metal deck diaphragm. The roof is anticipated to have a gravel ballast to match the existing building.
- For the open web trusses supporting the roof diaphragms, there has been a request to evaluate both steel and wood options for the building. For open web wood trusses, the roof diaphragm material will need to change to a  $\frac{3}{4}$ " wood panel.

### **Lateral Force Resisting Systems**

The seismic and wind force resisting systems of the building will be primarily the CMU and metal decked roof. Supplementary steel frames and bracing may be required in locations where the CMU construction is discontinuous and to augment the proposed building tie in locations to the existing building.

### **Miscellaneous Design Items**

- Structural support for athletic equipment
- Frames and anchorage for the climbing rappelling walls
- Lintels for new openings in the existing building
- Structural support columns/beams for the store front glazing
- The steel stair structures and associated railings and guards
- The steel guard structures at the open edges of the upper level floor
- Modifications to the existing building to support the building elements above
- Roof access elements
- Support for roof top HVAC units
- Parapet supports/bracing

This document has been provided to aid in future design and cost estimating. No structural design has been performed. Efforts and contingencies should be taken to allow for changes in the design elements listed above.

Please contact me at (307)733-5150 should you have any questions regarding this narrative.

Sincerely,  
JORGENSEN ASSOCIATES, P.C.



Jason Mann, P.E.  
Structural Engineering Project Manager



## **Jackson Recreation Center**

**Jackson WY**

**August 11, 2021**

### **I. Project Description**

A. Project is primarily an addition with minor renovation to the existing Jackson Recreation center originally constructed in 1993. Project scope includes an addition with the following programs, gymnasium, administration, fitness studio, indoor climbing and gym locker room. The project also includes an interior renovation of the pool party rooms.

### **II. Design Criteria**

#### **A. Temperatures:**

1. Summer Outdoor: 85°F db, 61.5°F wb
2. Summer Indoor:
  - a. Gymnasium/Fitness: 72°F
  - b. Administration: 75°F
  - c. Remainder of Building: 75°F
  - d. Note: Where ceiling fans exist, the operational set point may be 5°F higher than the temperatures listed.
3. Winter Outdoor: -20°F
4. Winter Indoor:
  - a. Gymnasium/Fitness: 70°F
  - b. Administration: 72°F
  - c. Remainder of Building: 70°F

#### **B. Humidity:**

1. Gymnasium/Fitness: Specific dehumidification steps will be taken to assure a maximum of 60% RH.
2. Constant volume rooftop units serving the gym shall utilize hot gas reheat for humidity control.
3. In the remainder of the building, humidity is not specifically controlled other than dehumidification that occurs with the cooling process. Spaces will likely fluctuate between 20% to 60% RH.

#### **C. Outside Air Ventilation shall be provided in accordance with applicable International Mechanical Code:**

#### **D. Lighting/Power:**

[https://perkinswillinc-my.sharepoint.com/personal/brandon\\_lucero\\_perkinswill\\_com/Documents/Desktop/Jackson WFH/SD Narrative/Mechanical/21100 Jackson Recreation Center Mechanical Narrative-21-08-06.doc](https://perkinswillinc-my.sharepoint.com/personal/brandon_lucero_perkinswill_com/Documents/Desktop/Jackson WFH/SD Narrative/Mechanical/21100 Jackson Recreation Center Mechanical Narrative-21-08-06.doc)

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Lakewood: 2525 South Wadsworth Blvd., Suite 200 Lakewood, CO 80227 P: 303-988-4514 F: 303-988-4517  
Fort Collins: 4730 South College Ave., Suite 203 Fort Collins, CO 80525 P: 970-568-8762 F: 303-988-4517

1. Lighting – 1.5 watts/sf

2. Power – 0.5 watts/sf

E. Occupancy:

1. Meeting: 20 sf/person

2. Fitness Studio: 30 sf/person

3. Entry Lobby: 33 sf/person

4. Gymnasium: 50 sf/person

5. Administration: 100 sf/person

6. Locker Rooms: 50 sf/person

7. Occupancy quantities as dictated by the architect/owner.

F. Occupant Heat Gain:

1. Meeting: Sedentary Work 550 BTUH/person

2. Fitness Studio: Medium Work 750 BTUH/person

3. Entry Lobby: Sedentary Work 550 BTUH/person

4. Gymnasium: Medium Work 750 BTUH/person

5. Administration: Seated at Rest 350 BTUH/person

6. Locker Rooms: Sedentary Work 550 BTUH/person

7. Remaining Areas: Sedentary Work 550 BTUH/person

G. Building Components:

1. Walls:  $U = .05$

2. Roof:  $U = .033$

3. Glass:

a.  $U_{winter} = .35$

b.  $U_{summer} = .35$

c. S.C. = .40

**III. Mechanical System Narrative**

A. Heating:

1. **Base:** The existing boilers in the boiler plant shall remain. The existing boilers are oversized and could accommodate the additional load. The existing pumping system utilizes (2) primary pumps, (15) secondary pumps and (2) injection pumps. These existing pumps are not sufficiently sized to accommodate the addition. Connection of the addition heating devices to the existing plant would require significant re-work of the existing boiler plant piping and pumps. Recommended solution for the addition includes a new condensing boiler plant installed in the addition mechanical room with dedicated piping to the new addition equipment.

2. **Alternate:** Boiler Plant System:

Heating hot water boiler, (1) Reillo Array – 4,000, modular boiler with integral primary circulation pumps and integral redundancy in a single boiler cabinet. Include complete system with Spirotherm air/dirt separator, expansion tank, glycol feeder and (2) split-coupled vertical inline secondary pumps, B&G e-80SC @ 130GPM and 85' each.

3. VFDs for the heating water pumps shall be wall mounted and provided by the Mechanical Contractor.
4. Terminal Heating Devices: The primary heating devices will be heating coils installed in the new packaged rooftop units, VAV boxes with heating coils and fan coil units. Miscellaneous heating devices will consist of cabinet heaters at entries, unit heaters in storage rooms and mechanical rooms. All rooftop units and fan coil units shall be provided with heating coil circulation pumps for coil freeze protection.
5. Distribution: The heating system fluid will consist of 30% propylene glycol for water treatment and freeze protection. Piping shall be either Schedule 40 steel or Type "L" copper, at the contractor's option. All heating piping shall be insulated with fiberglass. Piping distribution to the existing building will be unchanged. The new additional will include 4" HWS and HWR piping mains routed from the existing boiler room to the addition.

B. Heating/Cooling/Air Distribution

1. Packaged direct expansion cooling and hot water heating rooftop units with supply and exhaust fans and economizer controls will provide heating, cooling and air distribution. All units shall be variable volume with VFDs installed on both the supply and exhaust fans. Also all heating coils shall be provided with coil circulation pumps for freeze protection. Listed tonnages are approximate to be finalized as design progresses.

a. RTU-1

- i. Areas served: Gymnasium
- ii. 28 tons
- iii. 550 MBH (hot water heating coil), Circ pump = 1.0 hp.
- iv. Variable Volume single zone unit.
- v. Unit to be provided with outside air flow measuring station and return air CO<sub>2</sub> sensor for use in factory demand controlled ventilation sequence.

b. RTU-2

- i. Areas Served: Indoor Climbing.
- ii. 25 tons

- iii. 400 MBH (hot water heating coil), Circ pump = 0.75 hp.
- iv. Variable Volume single zone unit.
- v. Unit to be provided with outside air flow measuring station and return air CO<sub>2</sub> sensor for use in factory demand controlled ventilation sequence.
- c. RTU-3
  - i. Areas Served: Fitness Studios.
  - ii. 25 tons
  - iii. 350 MBH (hot water heating coil), Circ pump = 0.75 hp
  - iv. Variable Volume multiple zone unit. Provided with (4) VAV terminals for individual space zoning.
- d. RTU-4
  - i. Areas Served: Administration, Meeting and Lockers.
  - ii. 28 tons
  - iii. 500 MBH (hot water heating coil), Circ pump = 1.0 hp
  - iv. Variable Volume multiple zone unit. Provided with approximately (15) VAV terminals for individuals space zoning.
  - v. Unit to be provided with outside air flow measuring station and associated high occupancy zones shall be provided with room mounted CO<sub>2</sub> sensors for use in factory demand controlled ventilation sequence. (4) zone CO<sub>2</sub> sensors anticipated.
  - vi. Provide unit with variable capacity compressors on lead refrigerant circuit.
- e. RTU-5
  - i. Areas Served: Upper Level Cardio.
  - ii. 28 tons
  - iii. 500 MBH (hot water heating coil), Circ pump = 1.0 hp
  - iv. Variable Volume single zone unit.
  - v. Unit to be provided with outside air flow measuring station and return air CO<sub>2</sub> sensor for use in factory demand controlled ventilation sequence

2. Rooftop Unit Specification – Basis of Design = Daikin Rebel or equal by Aaon or Trane.

- a. Double Wall Construction
- b. Foam injected insulation (R-12 minimum)
- c. Modulating gas heat with stainless steel heat exchanger (single zone VAV units only)

- d. Modulating cooling capacity with inverter scroll compressor technology
- e. 100% Outside air economizer with variable speed exhaust fan and active building pressurization control of fan speed
- f. Direct drive, SWSI Class II, airfoil exhaust fan with EC motor, factory mounted and wired to the unit's single point power connection
- g. Direct drive, SWSI Class II, airfoil supply fan with EC motor, factory mounted and wired to the unit's single point power connection
- h. Variable capacity fans, modulating heating capacity and modulating cooling capacity.
- i. 2" Merv 8 filters with slide out filter rack.
- j. Roof curbs height as required for minimum 12" above roof surface or 18" curbs for 6" roof insulation. Heights to be coordinated with exact roofing insulation depths.
- k. Part Load IEER efficiency of 17.0 or better.

3. General:

- a. Starters and VFDs shall be provided integral with the mechanical equipment purchased by the Mechanical Contractor.
- b. Provide fire/smoke dampers at all rated penetrations per local code requirements.

4. Ductwork:

- a. Materials:
  - i. Galvanized sheetmetal ductwork shall be used throughout, except as noted.
  - ii. All exposed ducts in the gymnasium, climbing and upper cardio areas shall be spiral and shall have a Grip-Lock primer to facilitate painting by the GC.
  - iii. Diffusers located in excess of 15' AFF shall be of high capacity, long throw drum louver type.
- b. Ductwork Insulation: All rectangular supply and return ductwork shall have 1" duct liner. Round ductwork concealed above ceilings shall be wrapped with 1" insulation without duct liner. Exposed spiral ductwork in the gym and multipurpose spaces shall be provided with direct mounted 1" duct liner (John Manville Spiroacoustic round or equal).
- c. Piping Insulation: All heating water piping shall be insulated with minimum 1-1/2" insulation or as required to meet applicable energy conservation code. Piping insulation shall be fiberglass with ASJ jacketing. Hangers for piping shall utilize sheet metal shields with high density calcium silicate inserts as required to prevent crushing of insulation.

## d. Sizing:

- i. All low velocity supply, return and exhaust ducts shall be sized at 0.08"/100'.
- ii. Medium pressure ductwork upstream of VAV boxes shall be sized at 0.15"/100' with a maximum of 2,300 fpm.

## 5. Duct Chases:

- a. The Fitness Studio, RTU-3, ductwork will require a duct chase through the upper level Stretch Area to the lower level below. Approximate chase size (clear inside) = 44"x40" or 80"x20".
- b. The main restroom exhaust fan will require a duct chase through the upper level Cardio Area to the level below. Approximate chase size (clear inside) = 18"x18".

6. Exhaust: Existing exhaust fans to remain in the existing building. Exhaust fans shall be provided for the addition areas and high volume low speed (HVLS) ceiling fans shall be provided in the gym.

7. Roof exhaust fans shall be direct drive with EC motors for fan balancing.

## a. Provide the following exhaust fans:

FAN	FAN TYPE	SERVING
EF-1	Inline Fan (1/10 hp)	Child Care Restroom
EF-2	Inline Fan (1/10 hp)	Administration Restroom
EF-3	Inline Fan (1/10 hp)	Reception Restroom
EF-4	Roof Fan (1/2 hp)	Locker Room
EF-5	Inline Fan (1/10 hp)	Mechanical Room
EF-6	Inline Fan (1/10 hp)	Cardio Restrooms
TF-1	Inline Fan (1/4 hp)	Electrical
TF-2	Inline Fan (1/4 hp)	Elevator Machine

## 8. Provide the following ceiling fans:

CF-1	Ceiling Propeller Fan	Gymnasium
CF-2	Ceiling Propeller Fan	Gymnasium
CF-3	Ceiling Propeller Fan	Indoor Climbing

## C. Vibration Control:

- 1. All rooftop equipment is recommended to be mounted on the roof with a 6" concrete pad for vibration and noise mitigation.
- 2. Equipment fans shall be internally isolated.

3. Equipment hung from the structure shall be provided spring vibration isolation hangers.
4. The first (5) piping within a connection to a pump or other vibration generating device shall be spring vibration isolation pipe hangers.
5. Return air ductwork and supply air ductwork shall be internally lined for sound attenuation. Where duct runs are short lengths or in sensitive locations elbow sound attenuators shall be reviewed and provided where needed, preliminary review anticipated locations for attenuators include, RTU-4 and RTU-5.

D. Miscellaneous Devices:

1. (1) Hydronic cabinet unit heater for the main entry vestibule.
2. (1) Hydronic unit heater for the mechanical room.
3. (1) Ductless split system air conditioning unit (1.0 ton) with low ambient controls for the new addition IT room.

E. Temperature Controls:

1. General: The existing Staefa / Siemens Talon direct digital control (DDC) system shall remain in the existing building.
2. DDC controls for the addition areas shall include a separate independent control system including a central network controller, communication bus, local controllers, unitary control devices, dampers and control valves as required for a complete system. System shall operate on the BACnet MS/TP communication protocol.
3. The central control system shall be sufficiently sized to allow interface of the existing building systems with a future control renovation project.
4. Packaged Rooftop Units: Factory controllers with a BACnet MS/TP interface.
5. VAV Terminals: Field installed VAV controllers with associated temperature sensors. Additionally humidity sensors shall be provided in the fitness rooms.
6. Exhaust fans for restrooms: Occupied/unoccupied control via the nearest VAV terminal DDC controller.
7. Transfer air fans: Reverse acting temperature sensor control via the nearest VAV terminal DDC controller.
8. The system will be computer based and will allow for the mechanical systems to be controlled and monitored from a remote location or from within the building itself. Provide a full graphics package.
9. All other mechanical equipment shall also interface with and be controlled through the BAS system with the following exceptions:
  - a. Cabinet Unit Heaters and Unit Heaters: To be controlled by line voltage thermostatic controls.

- b. Sewage Ejector/Sump Pumps.
- c. Ceiling Propeller Fans.

#### IV. Plumbing Systems

##### A. Domestic Water:

- 1. Site Utilities:
  - a. The existing combination 4" fire and domestic water service is anticipated to be reused for this renovation.
  - b. It is anticipated that the existing 2" water meter will need to be replaced with a 3" water meter due to the new water demands of (132 gpm old demand and 151 gpm new demand). However, we will need to review with water district based on water meter flow requirements, city water pressure etc to make sure this increase is required since we are at the maximum capacity of the existing 2" water meter.
- 2. Piping:
  - a. The domestic cold water, hot water and hot water recirculation, condensate piping above ground in the building shall be Type "L" hard copper with no-lead solder and fittings.
  - b. The cold water service entry at this time doesn't have a reduced pressure backflow preventer. New backflow will be provided.
- 3. Water Heater:
  - a. **Base:** Provide (2) high efficiency, condensing gas-fired tank type domestic hot water heater (PVI #20-L100A-GCL, 199 MBH input at SL) with thermostatic mixing valve (TMV) to deliver 120°F hot water to the building with point of use thermostatic mixing valves at all public lavatories as required by code. (Approved TMV manufacturers: Powers, Leonard, Symmons, Bradley and Lawler). System is designed for 30 minutes an hour of shower usage.
  - b. **Alternate:** Existing heat exchanger/storage tank water heater located in the boiler room and the existing electric water heater for the community areas will be removed and replaced with the following: Provide (3) high efficiency, condensing gas-fired tank type domestic hot water heater (PVI #40-L130A-GCL) with thermostatic mixing valve (TMV) to deliver 120°F hot water to the building with point of use thermostatic mixing valves at all public lavatories as required by code. (Approved TMV manufacturers: Powers, Leonard, Symmons Bradley and Lawler). System is designed for 30 minutes an hour of shower usage.
- 4. Domestic Water Recirculation Pump:

- a. The domestic hot water will be circulated to provide instantaneous hot water at all fixtures and will operate continuously in the occupied mode.

B. Waste and Vent Piping:

1. Utilities:

- a. We plan on adding a new 4" waste line that will discharge to the west for this addition. Continuation will be by Civil Engineer.

2. Piping:

- a. Construct below ground waste piping of schedule 40 PVC (solid core) with solvent welded joints within  $\pm 5'-0"$  of the building.
- b. Waste and vent piping above grade in building shall be service weight cast iron with no-hub fittings. All plumbing VTR's shall be located 15' minimum from any outside air intakes.

C. Storm Piping:

1. Roof drains and overflow roof drain systems shall run totally independent of each other and the roof drainage system will terminate below grade. The overflow roof drainage system will discharge above grade with a downspout nozzle to a splash block or at a catch basin. The limit of responsibility shall stop at  $\pm 5'-0"$  outside of building. Material shall be the same as the waste and vent system. It is anticipated that overflow scuppers will be used when roof drains are located on the exterior wall of the building.

D. Gas Piping:

1. Natural gas piping shall be Schedule 40 black steel. Piping sizes 2" and smaller shall be screwed joints. Piping sizes 2-1/2" and larger shall have welded joints. Gas piping will be routed to the water heaters.

E. Plumbing Fixtures:

Fixture	Quantity
Water Closets	13
Lavatories	13
Urinals	2
Showers	6
Sinks	7
Electric Water Coolers	4
Mop Service Basin	2
Washer Box	1

1. Water Closets: Wall hung vitreous china, siphon jet type (1.28 GPF) and operated with a battery operated electronic flush valve.
2. Urinals: Vitreous china, siphon jet type (.125 GPF) with a battery operated electronic flush valve.
3. Lavatories: Vitreous china, self-rimming counter-top or wall hung type. Faucet shall have an electronically operated faucet with a .5 GPM flow restrictor for water saving feature.
4. Sinks: 18-gauge stainless steel self-rimming type. Faucet shall be manually operated with a 1.5 GPM flow restrictor for water saving feature.
5. Mop Service Basins: Floor type, molded stone, 24"x24"x10" size.
6. Electric Water Cooler (High/Low with bottle fill station): Stainless steel, ADA compliance with R134A refrigerant.
7. Shower: The enclosure will be recessed concrete and tile sloped to drain. Provide pressure balancing shower valve. All handicap showers will have a handheld shower and fixed showerhead. Approved manufacturers: Powers, Bradley, Symmons and Leonard.

F. Insulation:

1. Domestic cold water will have 1" of fiberglass insulation.
2. Domestic hot and hot water recirculation will have 1" of fiberglass insulation for up to 1" piping, 1-1/2" fiberglass for piping above 1".
3. Roof drain and overflow roof drainage will be 1/2" fiberglass insulation for up to 6" piping, 1" fiberglass for 6" and larger. Provide insulation on all horizontal piping including drain bodies. Indoor condensate piping from air conditioning units and similar equipment shall have 1/2" of fiberglass insulation.

G. Miscellaneous Plumbing:

1. Provide exposed, chrome hose bibbs with vacuum breaker in mechanical rooms.
2. Provide hose bibbs, stainless steel box type with door in each shower area for floor wash down.
3. Provide wall hydrant spaced on the exterior of the building at maximum 150'. Also included wall hydrants on the roof for HVAC unit cleaning.
4. Provide floor drains as shown on architectural plans and/or as follows:
  - a. Showers.
  - b. Shower hallways wet areas within the locker rooms.
  - c. Shower drying area.

- d. Toilet rooms.
- e. Mechanical equipment rooms.
- f. Janitors Closets

5. Provide an elevator sump pump with oil minder control system and route discharge to nears floor sink/mop service basin with airgap.

**V. Fire Protection**

- A. Connect to the existing fire entry with new zones for the addition and provide a complete sprinkler system for the entire building in conformance with NFPA 13. All heads shall be fully recessed, concealed type in finished areas, brass pendant in all exposed ceiling and unfinished areas.
- B. Smoke detectors at the rooftop units shall interface with the fire alarm system.
- C. It is anticipated that the entry canopy and overhangs will be non-combustible construction and allowed by the local fire district to be non-fire sprinkled. However, please carry an alternate price to provide a dry fire sprinkler system for this area until approval can be obtained.



## **TETON COUNTY/JACKSON PARKS AND RECREATION**

### **Jackson Hole, Wyoming**

#### **Electrical Service:**

The building is served from a 300KVA utility transformer. Service voltage is 480/277V, 3 phase, 4wire. The service size is 1200A. The rough existing peak demand on the building as reported by the utility company is roughly 350A, this should leave enough capacity to feed the addition. The utility company will probably want to upsize the service transformer to at least 500KVA.

#### **Electrical Distribution:**

Refer to the attached one-line diagram indicating existing panels and new panels. New panels or relocated existing panels are shown in a heavier line weight than the existing equipment.

Existing service gear will be replaced with new service gear. This will have the breaker capacity for the new feed to the additions distribution panel. The new gear will have GFI and an arc flash mitigation maintenance switch on the service main breaker bringing the service up to code and making it safer for personnel working on the electrical system. The gear will be provided with breakers that match existing fused switches to feed existing panels and equipment. In addition it will have a breaker to feed the addition sub panel "MDP-B".

A new distribution panel, "MDP-B", will be provided in the new electrical room of the addition. This sub panel will feed new panels and loads that are part of the addition. These panels will include a new high voltage 480/277V panel "HC" for lighting, low voltage 208/120V panel "L5" for general power requirements and fitness equipment, new 480/277V "HD" and new 208/120V low voltage panel "L6" for small mechanical loads. It will also have feeds to larger equipment like mechanical rooftop units and the elevator.

Where possible all the other existing distribution will remain as is. Existing panels "HB" and "L3" in the office area will be relocated to a near by storage room. The transformer feeding "L3" currently above the ceiling will be relocated with the panels. Existing circuits to remain will need to be extended to the new panel location.

#### **General Power/Telecom:**

##### **First Level**

###### **Pool Party Room**

Provide a total of 6 duplex receptacles around the room perimeter. Provide 6 GFCI above counter duplex receptacles on three circuits for warming trays, coffee makers and other equipment like this that is used for party rooms.

Provide a wifi WAP on the ceiling of this space.

###### **Child Care**

Provide 4 tamper resistant duplex receptacles around the room perimeter. Provide 4 GFCI above counter duplex receptacles on two circuits.

###### **Individual Offices**

Provide 1 duplex on each wall. At the desk location provide an additional quad receptacle with USB ports.

Provide 1 data outlet with two drops located at the desk and on the wall across from the desk.

###### **Open Work Area**

Provide 2 duplex floor receptacles with USB outlets at the free-standing desk locations. In addition, provide 4 above counter receptacles, GFCI type. Also provide 2 USB ports adjacent to 2 of those receptacles for phone charging. Provide a receptacle on the wall opposite the counter for general purpose.

Provide 2 data floor outlets with two drops at each floating desk. Provide a wifi WAP device in this area.

**Pantry/Laundry**

Provide a duplex receptacle for a washing machine and an electrical outlet for a dryer. Provide 4 GFCI above counter duplex receptacles on two circuits.

**Lobby**

Provide dedicated duplex GFCI receptacles for 3 owner furnished vending machines. Provide (2) floor boxes under the pantry area table. Provide 4 floor box outlets under the kiosk station. Provide 3 additional duplex outlets around the lobby for general use.

Provide 4 data floor boxes with two drops under the kiosk stations. Provide a wifi WAP device for this area.

**Reception Desk**

Provide 4 quad receptacles with USB at each chair location. Provide 4 above counter duplex outlets at the retail area.

Also provide a data outlet with two drops at each of the 4 desk locations.

**Unisex Bathroom**

Provide 1 GFCI duplex receptacle adjacent to the sink at +48" AFF.

**Rec Manager/Customer Service Office**

Provide 1 duplex on each wall. At the desk location provide an additional quad receptacle with USB ports.

Provide 1 data outlet with two drops located at the desk and on the wall across from the desk.

**Rec Support**

Provide 5 duplex receptacles above the counter.

**Climbing Coord/Rentals**

Provide 4 duplex floor outlets with USB under the rental counter. Provide 1 duplex floor outlet with USB under the climbing coordinator desk.

Provide 4 data floor outlets with two drops under the rental counter and 2 data floor outlets with two drops under the climbing coordination desk. Provide a wifi WAP at this location.

**Equipment/Wash**

Provide 4 GFCI duplex receptacle on the counter. Provide a duplex on the 3 remaining walls.

**Meeting Room**

Provide 2 duplex receptacles on each of 4 perimeter walls. Provide 10 floor mounted duplex receptacles under the desk configuration in the center of the room. Provide a duplex receptacle located behind the wall mounted television.

Provide a wifi WAP on the ceiling of this space.

**Climbing Gym**

Provide 3 wall mounted receptacles on the perimeter walls.

**Lactation Room**

Provide a duplex outlet with USB next to the nursing chair. Provide a dedicated duplex GFCI for an undercounter refrigerator. Provide 2 above counter outlets.

**Exam Rooms**

Provide 1 duplex on each wall of the exam rooms.

**Wellness Office**

Provide a duplex on each wall of the wellness office. Provide a quad floor box with USB ports under the desk.

Provide a floor data outlet with two drops under the desk. Provide a wifi WAP in this area.

#### Restrooms

Provide 2 GFCI duplex receptacle on each side of the sink at +48" AFF. Provide a duplex for the locker area.

#### Spin Studio

Provide 6 duplex receptacles around each perimeter wall. Provide a duplex behind a wall mounted TV.

#### Flex Studios

Provide 8 duplex receptacles around each perimeter wall. Provide a duplex behind the TV.

Provide a wifi WAP around the center of this space.

#### Gym

Provide 4 duplex on each perimeter wall. Provide 4 duplex outlets with USB at observation table. Provide an electrical connection for each basketball hoop.

Provide two wifi WAP devices I this area.

#### Support Areas (Storage, Mechanical, Electrical Rooms)

Provide 1 duplex receptacle at +48" AFF in each of these spaces.

### **Second Level**

#### Office

Provide 1 duplex on each wall. At the desk location provide an additional quad receptacle with USB ports.

Provide 1 data outlet with two drops located at the desk and on the wall across from the desk.

#### Fitness Counter

Provide 4 GFCI duplex receptacle on the counter. Provide 2 floor mounted duplex receptacles under the free stand counter.

#### Cardio

Provide 25 floor mounted dedicated duplex receptacles for each piece equipment.

Provide 25 data and coax floor boxes for each piece of equipment. Provide a wifi WAP in this area.

#### Stretch

Provide 4 wall mounted duplex receptacles.

Provide a wifi WAP in this area.

#### Unisex Restrooms

Provide 1 GFCI duplex receptacle adjacent to the sink at +48" AFF.

#### Running Track

Provide a duplex receptacle at the ceiling for a timing clock. Provide duplex outlets on 25' centers around the track.

### **Mechanical Equipment:**

Power wiring, conduit, disconnects and over current protection to all mechanical equipment shall be provided by electrical contractor. All starters, control wiring and controls will be provided by others. 120V connections to control transformers will be provided by the electrical contractor.

Electrical contractor shall provide the electrical for (5) new roof top units. Each unit will be provided with a condensate pump of minimal HP. Units will be DX cooling and hot water heating.

### **Interior Lighting (Fixture type and light levels):**

#### **First Level**

Pool Party Room:

Illuminate the party room to 30 footcandles using a combination of recessed LED linear fixtures and LED downlights. The downlights may be RGBW so that users of the space can add color to the room.

#### Child Care

Illuminate the child care area to 30 footcandles. The child care area will be illuminated using LED pendant fixtures with varying shapes and colors. An option for these could be fixtures with an acoustical treatment to help keep noise levels down in the space.

#### Mechanical, Electrical, Storage and Pool Equipment rooms:

These spaces will be illuminated to 15 footcandles using 4'-0" LED strip lights.

#### Corridors:

Small corridors connecting the spaces will be illuminated to 20 footcandles using 2x2 recessed LED troffers or 6" downlights depending on the ceiling type and width of the space.

#### Office/Work Area

The new offices and work area will be illuminated to 40 footcandles. These areas will be lit using recessed LED 2'x2' or 2'x4' troffers.

#### New Vestibule:

The vestibule will be illuminated to 20 footcandles using recessed LED downlights.

#### Small Restroom off Lobby:

The small restroom will be illuminated to 20 footcandles using LED downlights and sconces next to the mirror.

#### Rec Manager and Cust Service Offices

Individual offices will be illuminated to 30 footcandles using LED 2x4 troffers.

#### Lobby/Reception

Illuminate lobby to 20 footcandles. Add a punch of light over the desk to about 30 footcandles. The lobby will be illuminated with decorative LED pendants. The reception desk will be illuminated with pendants over the desk, and a tape light to was the face of the desk. The retail area will be lit using LED shelf lighting as well as LED cabinet lighting to make sure merchandise stands out.

#### Recreation Support

Illuminate this area to 30 footcandles. This area will be lit using LED 2'x2' troffers.

#### Climbing Restrooms/Lockers

Light area to 20 footcandles. The restrooms will be lit using LED recessed downlights, small aperture LED wall washers at the locker faces, and LED wall sconces at the vanities.

#### Climbing Wall:

The climbing area will be illuminated to 30 footcandles. The lighting will greatly depend on the shape of the wall. We illuminate these areas from two sources. Typically, there is an LED mounted high for general illumination as well as the emergency. Then spot lights are used to add texture, shadows, and additional light to the vertical surfaces of the climbing wall. This can be done with track lights, pipe mounted fixtures or even spots mounted to a pole.

#### Rental/Climbing Coordinator

Illuminate this area to 30 footcandles. This area will be illuminated using 2'x2' or 2'x4' troffers. Possible add some LED tape to was the face of the desk or some decorative pendants or downlights above the desk to make them more focal.

#### Equipment/Wash

Illuminate this area to 30 footcandles. This area will be lit using 2'x4' troffers.

#### Meeting Room:

These rooms will be illuminated to 30 footcandles. This room will be illuminated using recessed LED linear fixtures. Around the perimeter will be recessed 2" LED downlights.

#### Gym:

Gym will be illuminated to 50 footcandles. The gym will be lit using LED indirectighbays.

**Spin Studio & Flex Studios:**

The spin studio and flex studios will be illuminated to 30 footcandles. Spin studios and the flex studios should be dynamic spaces. The space will be a combination of white light for general illumination as well as color. The color lighting can be provided as an indirect component of linear fixtures, some downlights located around the space or even a cove within the space.

**Second Level**

**Office:**

The new offices and work area will be illuminated to 40 footcandles. These areas will be lit using recessed LED 2'x2' or 2'x4' troffers.

**Support Areas (Storage Room/Electrical/IT Rooms):**

These spaces will be illuminated to 15 footcandles using 4'-0" single LED strip lights.

**Small Restrooms:**

The restrooms will be illuminated to 20 footcandles using 6" LED downlights and LED sconces at the vanities.

**Running Track:**

The track will be illuminated from the overhead lights in the gym but supplemented with small LED pendants where light drops off.

**Cardio and Stretch Area**

These areas will be illuminated to 30 footcandles. Lighting will depend on ceilings. If an open ceiling is provided we will provide direct/indirect pendants. If clouds are provided we will provide recessed LED linear lights in the clouds.

**Exterior Lighting:**

Back of house areas will be illuminated using LED wall packs. These wall packs will be supplied with motion sensors so the lights remain on at 50% lighting level until motion is sensed. Wall packs will match the existing Beta fixtures on the building now.

Any expansion of the parking lot will have poles that match the existing Beta LED poles on site now. Any work that expands into city property will require a matching city standard pole. This will be coordinated with the city once the site plan is further developed.

The splash pad will be illuminated using pedestrian scale light fixtures that match the existing fixtures at the site.

**Lighting Controls:**

The lighting controls will be provided in two ways. Offices, storage rooms and other small individual rooms will be controlled with motion sensors in conjunction with manual switches and dimmers for occupant use. Large public areas like the climbing gym will be controlled with a central relay control system. The relays will be controlled by low voltage controls located at the front desk. Lights along areas of exterior windows will be controlled separately and connected to daylight sensors that will dim or turn off lighting when daylight is present. Existing lights and lighting controls will remain as is. Any controls will be relocated to new front desk.

**First Level**

**Pool Party Room:**

The pool party room will be connected to a local relay system that will tie lighting control in with AV control. It will be controlled by a touch screen at the front of the space as well as pushbuttons by the entries. This will allow the programming of scenes and also tie into the AV system for a single point of connection. Lights will be zoned and dimmed. RGB control of the color changing lights will happen at the touch screen. Motion sensors will automatically turn lights off after 20 minutes of no motion.

**Child Care**

The child care space will be controlled by a local control system. This system will have a wall dimmer located in an area that is not easily accessed by kids to control the lights in the space. Ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **Mechanical, Electrical and Storage:**

Mechanical and electrical rooms for safety will be controlled by toggle switches. Small storage rooms will be controlled by a wall motion sensor with an on/off switch on it. Large storage rooms will be controlled with a wall switch and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **Corridors:**

Large public halls will be connected to the relay panel. They will be controlled at the front desk. They will also be swept off at the end of the day. Small halls in areas like the office core will be controlled by a local system that has on/off switches by the entry to the corridor and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **Office/Work Area**

Offices will be controlled by a wall motion sensor that has a dimmer switch on it. The open work area will be controlled by a dimmer switch and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **New Vestibule:**

The vestibule will be connected to the relay system. The lights will be on/off from the front desk. A photosensor will automatically dim lights. Lights will be automatically swept off at the end of the day.

#### **Small Restroom off Lobby:**

The small restroom will be controlled by a wall motion sensor with an on/off switch on it.

#### **Rec Manager and Cust Service Offices**

Offices will be controlled by a wall motion sensor that has a dimmer switch on it.

#### **Lobby/Reception**

The lobby and reception area will be connected to the relay system. The lights will be dimmed at the front desk. Any lights near windows will be automatically dimmed by photosensors. Lights will automatically be swept off at the end of the day.

#### **Recreation Support**

This area will be controlled with a small local system with a dimmer switch next to the door. Ceiling sensors will automatically turn lights off after 20 minutes of no motion.

#### **Climbing Restrooms/Lockers**

The restrooms will be connected to the relay system. Lights will be automatic on/off with motion sensors in the room. An override on/off button will be located at the front desk.

#### **Climbing Wall:**

The climbing wall area will be connected to the relay panel. The overhead lighting will be controlled separate from the spot lighting. Both types of lights will be dimmable from a control at climbing desk. A photosensor will dim any lights near windows automatically.

#### **Rental/Climbing Coordinator**

These areas will be controlled by a dimmer switch and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **Equipment/Wash**

These areas will be controlled by a dimmer switch and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

#### **Meeting Room:**

The meeting room will be connected to a local relay system that will tie lighting control in with AV control. It will be controlled by a touch screen at the front of the space. This will allow the programming of scenes and also tie into the AV system for a single point of connection. Lights will be zoned and dimmed. Motion sensors will automatically turn lights off after 20 minutes of no motion.

#### **Gym:**

The gym will be connected to the relay system. Dimming control will be located at the front desk. Any lights near windows will be automatically dimmed by a photosensor.

**Spin Studio & Flex Studios:**

These studios will be connected to a local relay systems that will tie lighting control in with AV control. It will be controlled by a touch screen at the front of the space. This will allow the programming of scenes and also tie into the AV system for a single point of connection. Lights will be zoned and dimmed. Motion sensors will automatically turn lights off after 20 minutes of no motion. A divider sensor will be used in the flex rooms so that the lights and AV will be automatically controlled separate or together depending on if the divider is open or closed.

**Second Level**

**Office:**

Offices will be controlled by a wall motion sensor that has a dimmer switch on it.

**Support Areas (Storage Room/Electrical/IT Rooms):**

Mechanical and electrical rooms for safety will be controlled by toggle switches. Small storage rooms will be controlled by a wall motion sensor with an on/off switch on it. Large storage rooms will be controlled with a wall switch and ceiling motion sensors will turn lights off automatically after 20 minutes of no motion.

**Small Restrooms:**

The small restrooms will be controlled by a wall motion sensor with an on/off switch on it.

**Running Track:**

The track will be connected to the relay system. Dimming control will be located at the front desk. Any lights near windows will be automatically dimmed by a photosensor.

**Cardio and Stretch Area**

The open fitness areas will be connected to the relay system. Dimming control will be located at the front desk. Any lights near windows will be automatically dimmed by a photosensor.

**Exterior**

Exterior lighting will be connected to the relay system. Lights will be automatically controlled by the timeclock schedule as well as a photosensor. A user override switch will be provided at the front desk for manual control of lights for special events.

**Audio and Visual Systems:**

The new areas will be provided with speakers for sound as well as paging. All areas except those noted below will be connected to the facilities system to provide background music. Each new area shall be a separate zone. The zones shall be climbing gym, gym, child care, exercise areas. The pool party room shall tie into the existing natatorium zone. All zones shall automatically mute upon activation of the fire alarm system.

Below are the video considerations as well as any special audio considerations for individual spaces. The audio is in addition to being connected to the central sound and paging system.

**Pool Party**

Provide 75" wall mounted TVs in room. Provide a wall plate with VGA and HDMI connections so users can connect their devices to the TV. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display. Provide a Bluetooth connection plate so users can override the central sound system and stream music from a personal device. Rooms will operate separate when divider is closed and together when its open.

**Lobby/Reception**

Provide 4 75" wall mounted TVs in lobby and behind the reception. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display.

**Climbing Rental**

Provide a 75" wall mounted TV behind the reception. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display.

#### Meeting Room

Provide a 75" wall mounted TVs in room. Provide a wall plate and floor box under the desk with VGA and HDMI connections so users can connect their devices to the TV. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display. Provide a Bluetooth connection plate so users can override the central sound system and stream music from a personal device. In addition, provide a teleconferencing system in the room. This should include a camera, microphones over the desk and a phone. Teleconferencing system similar to Crestron Flex.

#### Spin Studio

Provide 75" wall mounted TVs in room. Provide a wall plate with VGA and HDMI connections so users can connect their devices to the TV. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display. Provide a Bluetooth connection plate so users can override the central sound system and stream music from a personal device. In addition, provide a wireless head worn microphone for instructors.

#### Flex Studios

Provide 75" wall mounted TVs in room. Provide a wall plate with VGA and HDMI connections so users can connect their devices to the TV. Provide COAX to the TV for a local TV feed. Provide an I/O player with a connection to the facility server for an inhouse feed for things like schedules, advertising or any other custom display. Provide a Bluetooth connection plate so users can override the central sound system and stream music from a personal device. Provide a wireless head worn microphone for instructors. Rooms will operate separate when divider is closed and together when its open.

#### Fitness Areas

Provide a coax and data to each piece of exercise equipment for equipment mounted TVs.

#### **Security and Access Control:**

An existing security system shall be upgraded. Placement of cameras will be estimated by the electrical engineer. Typical coverage will include all doorways as well as a general view in the halls, lobby, climbing gym, gym an the studios. Devices in the gym shall be impact resistant or provided with a wire guard.

Access control will be provided at all exterior doors. In addition, access control will be provided for the new IDF room.

#### **Fire Alarm:**

Expand on the existing fire alarm system and replace the existing panel to serve the existing and to service the new area. Provide a complete voice evacuation system if the expansion puts the capacity over 2,000 people. The system will need a manual pull station located at the control desk. Provide a pre-recorded message system to be heard throughout the building and in each occupied space (i.e. individual offices). Fire alarm shall mute all sound systems upon activation via fire alarm relays and control modules. Provide ADA speaker/strobes in all public areas and restrooms. Each floor shall be zoned separately and zones for fan shut down and sprinkler shall be provided. Provide an elevator recall system including smoke and fire detection. Provide fire/smoke damper control system including smoke detection, control modules and 120 volt power. Announcer showing all zones shall be in placed in the main lobby visible from the main fire department entry. Duct detectors in mechanical units shall be tied into the fire alarm system. System will meet the requirements of the local district.

# Jackson Recreation Center Improvements

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**Teton County/Jackson Parks & Recreation**

**Jackson, WY**

**PW Project No: 222011.00**

**August 11, 2021**

## Aquatics Design Narrative

### 1.1 INTRODUCTION

The aquatics portion of the Teton County / Jackson Recreation Center consists the addition of a new outdoor splash pad. The Splash Pad will be located to the south of the building to the east of North King Street and to the north of the ADA compliant parking spaces. The Splash Pad will be designed to be Universally Accessible and provide access and enjoyment to all users who desire to utilize its amenities.

### 1.2 SPLASH PAD:

The basis of design for the Splash Pad is a 1,800 square foot concrete pad with integral color medium broom concrete finish. Specific design features have not been determined but the Splash Pad is thought to include:

- A free form shape that is approximately 80 feet long and vary from 20 to 30 feet wide.
- A toddler area with mostly ground sprays and three to four short (1-2 foot) interactive features.
- An open age interactive area with a combination of ground sprays, overhead features, and interactive features. Some light and sound interaction are likely to be included in this area.
- A rustic, outdoor themed experience including boulders is thought to be incorporated into the splash pad design.

<b>SPLASH PAD</b>	
Surface Area:	<b>1,800 SF</b>
Perimeter:	<b>140 LF</b>
Dimensions:	<b>Rectilinear 80'-0" x 25'</b>
Water Temperature:	<b>Seasonally Heated</b>

Water Depths:	<b>0'-0"</b>
Water Volume:	<b>Unknown, Minimum 4,000 Gallons</b>
Turn Over Rate:	<b>Unknown</b>
Turn Over Time:	<b>30 MINUTES</b>
Filtration Rate:	<b>High Rate Sand Filters (x2)</b>
Backwash Rate:	<b>Unknown, Tank Drains by Gravity</b>
Total Filtration Area:	<b>Unknown</b>
Filter:	<b>High Rate Sand, 15 GPM</b>
Heater:	<b>Heat Exchanger</b>
Drains:	<b>Perimeter Trench Drain and Several Area Drains at High Flow Features</b>
Additional Features:	<b>UV chloramine mitigation system using Medium pressure UV in unison with a source capture system. Possible controller capable of sequencing light and /or sound.</b>

### 1.3 CONSTRUCTION METHODS:

- A. Splash pad water surface collection shall consist of a continuous perimeter gutter system in conjunction with area drains located at key locations. Splash pad concrete shall have a minimum compressive strength of 4,000 pounds per square inch with an integral waterproofing admixture (xypex or equal) and include integral coloring.

### 1.4 SPLASH PAD EQUIPMENT

Splash pad safety equipment, maintenance equipment, fittings, safety signage, and deck equipment shall be installed in strict accordance with pertinent codes and regulations and the manufacturer's published recommendations, anchoring firmly and securely for long life under hard use.

Splash pad mechanical equipment shall conform to the following design criteria:

- Circulation pump shall be a horizontally mounted end suction centrifugal pump, bronze fitted, stainless steel shaft, with fuse coat epoxy on all wetted surfaces. Motors shall be totally enclosed, fan cooled, premium efficiency, 1,150 to 1,800 RPM.
- Filtration systems shall be hi-rate sand with a flow rate not to exceed 15 gallons per minute / square foot of filter area. Filtration system shall be furnished complete with influent piping manifold, effluent piping manifold, backwash piping manifold, and all necessary valves and fittings as required for normal filtration and automated backwash operations. Influent and effluent pressure gauges, splash pad water temperature gauges and flow meter with paddlewheel flowsensor shall also be provided as part of a fully integrated system.

- Splash pad water heating systems shall incorporate the use of a heat exchanger sized to provide a 25 degree Fahrenheit temperature rise within twenty-four hours, and shall be furnished with electronic ignitions, integral recirculating pumps, and cupro-nickel heat exchangers. A pair of tees with blind flanges on outlet side shall be provided downstream of the filtration system (but upstream of splash pad water heating system) to allow for installation of thermal solar heating system in the future if ever desired.
- The Chemical treatment system shall utilize calcium hypochlorite (tablet chlorine) as the primary oxidant. The oxidant feed system shall be capable of providing a constant in-pool chlorine residual of 1 - 15 PPM. The pH shall be controlled through the utilization of muriatic acid. Both chemical feed systems shall be automatically controlled by a single chemical controller with the capacity of monitoring and continually adjusting ORP, PPM, and pH.
- U/V (Ultra Violet sterilization) will also be used. The addition of a UV system will further reduce the risk of pathogens in the water as well as help control chloramines, which can irritate eyes, skin, and throats.

## 1.5 SPLASH PAD MECHANICAL

- A. All splash pad mechanical piping shall consist of Schedule 40 PVC for all below grade piping and Schedule 80 PVC for all above grade piping. Piping shall be sized for velocities not to exceed 6 feet per second (1.8 meters per second) for suction (return) piping and 8 feet per second (2.4 meters per second) for discharge (supply) piping. All underground piping shall have a minimum of 18" (450 millimeters) of earth cover. Provisions shall be made for automated filling of splash pad to compensate for water loss due to filter backwash operations and evaporation.

## 1.6 SPLASH PAD ELECTRICAL

- A. All splash pad electrical work shall include: conduit, conductors and breakers for all single phase electrical equipment; conduit, conductors and motor starters for all three phase electrical equipment; and control circuitry and interface between circulation pump(s), filtration microprocessor, splash pad water heater recirculating pumps, water chemistry controller and water level controller.

END OF NARRATIVE