JOINT COMMITTEE ON CAPITAL REVIEW

Wednesday, December 16, 2020

10:00 a.m. or upon adjournment of the JLBC meeting

Teleconference

JLBC

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

JOINT COMMITTEE ON CAPITAL REVIEW
Wednesday, December 16, 2020
10:00 A.M. or upon adjournment of the JLBC meeting
Teleconference: The meeting will be held via teleconference software. Members of the public may access a livestream of the meeting here.

MEETING NOTICE

- Call to Order

- Approval of Minutes of September 23, 2020.

- DIRECTOR'S REPORT (if necessary).

1. ***ARIZONA STATE UNIVERSITY - Review of Multipurpose Arena Construction Project.

2. UNIVERSITY OF ARIZONA
   ***A. Consider Review and Approval of Grand Challenges Research Building and Applied Research Building Financing Projects.
   ***B. Review of Deferred Maintenance Project.
   C. Consider Approval of Chemistry Building Renovation Financing Project.
   D. Review of Facilities Management Building Project.

3. ARIZONA DEPARTMENT OF CORRECTIONS - Lewis/Yuma Capital Project: Review of FY 2021 Budget Funding and Quarterly Project Report.

4. ***ARIZONA STATE PARKS BOARD - Review of Alamo Lake State Park Wastewater Treatment Project.

5. ***ARIZONA GAME AND FISH DEPARTMENT - Review of Building Renewal Reallocation Plan.

6. ***ARIZONA STATE LOTTERY COMMISSION - Review of FY 2021 Building Renewal Allocation Plan.

*** Consent Agenda - These items will be considered in one motion and no testimony will be taken.

The Chairman reserves the right to set the order of the agenda.
12/11/2020
lm

People with disabilities may request accommodations such as interpreters, alternative formats, or assistance with physical accessibility. Requests for accommodations must be made with 72 hours prior notice. If you require accommodations, please contact the JLBC Office at (602) 926-5491.

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

MINUTES OF THE MEETING

JOINT COMMITTEE ON CAPITAL REVIEW

September 23, 2020

The Chairman called the meeting to order at 10:35 a.m., Wednesday, September 23, 2020 via video conference. The following were present:

Members:	Senator Gowan	Representative Cobb, Chairman
	Senator Alston	Representative Fernandez
	Senator Bowie	Representative Friese
	Senator Bradley	Representative Kavanagh
	Senator Gray	Representative Lieberman
	Senator Kerr	Representative Petersen
	Senator Leach	Representative Toma

APPROVAL OF MINUTES

Senator Gowan moved that the Committee approve the minutes of June 24, 2020. The motion carried.

CONSENT AGENDA

The following items were considered without discussion:

DEPARTMENT OF CORRECTIONS (ADC) - Review of Lewis/Yuma Capital Project: Review of FY 2021 Budget Funding and Quarterly Project Report.

Pursuant to a provision from the June 2019 Committee meeting, ADC submitted its quarterly report detailing its progress on the Lewis and Yuma Lock, HVAC, and Fire Systems project. Additionally, A.R.S. § 14-1252 requires Committee review of expenditure plans for monies appropriated for capital projects. The FY 2021 Capital Outlay Bill appropriated $30,000,000 for the project. ADC requested review of $14,100,000 of the FY 2021 appropriation (See *Table 1*). The JLBC Staff provided options and potential provisions:

(Continued)

A. The department shall comply with American Correctional Association (ACA) standards for all locks purchased and installed as part of this project.

B. In future quarterly reports the department shall address the number and location of locks that have been repurposed and installed on non-cell doors.

Table 1

Lewis and Yuma Lock, HVAC and Fire System Project Costs

	April JCCR Plan	New Plan	Difference
Phase 1 - Lewis Locks/Fire Systems	$ 5,706,700	$ 6,766,300	$ 1,059,600
Phase 2 - Lewis HVAC	26,730,700	11,548,200	(15,182,500)
Phase 3 - Yuma Lock/HVAC/Fire Systems	14,736,600	9,600,700	(5,135,900)
Originally Purchased Locks - Repurposed 1/	4,243,500	6,533,300	2,289,800
Potential Cancellation Penalties	5,311,000	0	(5,311,000)
New Facility Upgrades	3,300,000	7,817,500	4,517,500
Contingency	0	4,000,000	4,000,000
Total Project Costs	**$60,028,500**	**$46,266,000**	**$(13,762,500)**

1/ The new plan includes $2.3 million in expenditures by a subcontractor that ADC and the Construction Manager at Risk (CMAR) are currently validating.

SCHOOL FACILITIES BOARD (SFB) - Review of Minimum Adequacy Guidelines Rulemaking.

A.R.S. § 15-2011 requires SFB to submit a fiscal impact statement of the effect of any proposed rule changes to the Minimum Adequacy Guidelines (Guidelines). The JLBC Staff provided options and a potential provision:

A. A favorable review of the fiscal impact statement does not constitute endorsement of any General Fund appropriations to pay for any increased costs associated with the proposed rule changes.

ARIZONA DEPARTMENT OF ADMINISTRATION (ADOA) - Review of FY 2021 Building Renewal Allocation Plan.

A.R.S. § 41-1252 requires the Committee to review expenditure plans for building renewal monies. ADOA requested Committee review of its $16,000,000 FY 2021 Building Renewal Allocation Plan. The JLBC Staff provided options and potential provisions:

A. ADOA shall report any reallocations between project categories as listed in *Table 2* to the JLBC Staff. If there is significant change of scope in the reallocation reported by ADOA, the JLBC Staff shall recommend ADOA request Committee review of the reallocation.

B. The distribution of the emergency contingency allocation of $500,000 be addressed as follows:

1. ADOA shall notify the Chairman and the JLBC Staff that they plan to spend less than $100,000 on an emergency project. ADOA can proceed without Committee review.

2. The Chairman can allow ADOA to move forward with an emergency project of greater than $100,000 without Committee review.

3. The Chairman will notify ADOA if she does not agree that the project is an emergency and that the project will require full Committee review.

(Continued)

An "emergency" project is defined as unforeseen, critical in nature, and of immediate time sensitivity. Prior reviews also included this provision.

C. If ADOA adds a new non-emergency project category not listed in this request, the department must submit a proposed expenditure plan

Table 2

FY 2021 Building Renewal Allocation Plan

Fire & Life Safety Projects	
ADOA Statewide Replace Fire and Life Safety Systems, and Arizona Historical Society Fire Sprinkler Head Replacement	$ 750,000
Building Shell Projects	
ADOA Statewide Roof Repair and Replacement and Window Door Repairs	$ 1,980,900
Major Building Services Projects	
ADOA Statewide HVAC Systems Replacement, elevator modernization and electrical repairs	$ 9,865,100
Infrastructure Projects	
ADOA Capitol Mall and DPS Replace/Repair Parking Lots, DJC Kitchen surface replacement	$ 1,000,000
Building Interior Projects	
ADOA Capitol Mall and DPS Replace Carpet and Floor Coverings	$ 400,000
Preventative Maintenance Projects	
ADOA Capitol Mall Preventative Maintenance	$ 800,000
Other Projects	
Personnel Services/ERE Costs	$ 550,000
Building Renewal Project Scoping	150,000
Risk Management Insurance Premium	4,000
Emergency Contingency	500,000
Subtotal	$ 1,204,000
TOTAL	**$ 16,000,000**

ARIZONA DEPARTMENT OF TRANSPORTATION (ADOT) - Review of FY 2021 Building Renewal Allocation Plan.

A.R.S. § 41-1252 requires Committee review of expenditure plans for building renewal monies prior to expenditure. ADOT requested that the Committee review its $13,281,700 FY 2021 Building Renewal Allocation Plan.

ADOT has allocated $13,000,000 from the State Highway Fund among 239 projects, leaving a contingency balance of $133,800 and $75,000 for project management support. ADOT has also allocated $281,700 from the State Aviation Fund for 15 projects, with no contingency funding. The JLBC Staff provided options and potential provisions:

A. ADOT shall report any reallocations between project categories as listed in *Table 3 and Table 4* above $100,000 to the JCCR Chairman. The JCCR Chairman shall determine whether the reallocation requires further Committee review.

(Continued)

B. ADOT shall report any expenditure of the building renewal contingency allocation of $133,800 to the JLBC Staff as part of its existing semi-annual building renewal status report.

Table 3

State Highway Fund Building Renewal Project Categories

Category	Projects	State Highway Fund	% of Total
Fire/Life/Safety	27	$546,000	4%
Roof Repairs/Replacement	16	801,500	6%
Exterior Preservation (Doors, Windows, Siding)	31	765,000	6%
Building Systems (HVAC, Electrical, Plumbing)	57	3,513,500	27%
Interior Finishes (Paint, Carpet, Tile)	15	240,800	1%
Remodels and Reconfigurations	38	4,554,000	35%
Americans with Disabilities Act	3	38,000	1%
Infrastructure (Sewers, Wells)	52	2,332,400	18%
Project Management Support	N/A	75,000	1%
Contingency	N/A	133,800	1%
Total	**239**	**$13,000,000**	**100%**

Table 4

State Aviation Fund Building Renewal Projects

Category	Projects	State Aviation Fund	% of Total
Fire/Life Safety	2	$10,000	4%
Roof/Repairs Replacement	1	4,000	1%
Exterior Preservation (Doors, Windows, Siding)	2	10,000	4%
Building Systems (HVAC, Electrical, Plumbing)	4	143,000	50%
Interior Finishes (Paint, Carpet, Tile)	2	10,000	4%
Americans with Disabilities Act	1	5,000	2%
Infrastructure	3	99,700	35%
Contingency	N/A	0	0%
Total	**15**	**$281,700**	**100%**

Senator Gowan moved that the Committee give a favorable review, including provisions as outlined in the JLBC Staff analysis, to the 4 consent agenda items listed above. The motion carried.

REGULAR AGENDA

ARIZONA STATE UNIVERSITY (ASU) - Review of University Drive Pedestrian Bridge.

Ms. Morgan Dorcheus, JLBC Staff, stated A.R.S. § 15-1683 requires Committee review of any university projects financed with system revenue bonds. ASU requested Committee review of $13,600,000 in system revenue bond issuances to fund construction of a University Drive Pedestrian Bridge. The JLBC Staff provided options and potential provisions.

Mr. Morgan Olson, Executive Vice President, Treasurer and CFO, ASU, responded to member questions.

Senator Gowan moved that the Committee give a favorable review of ASU's planned issuance of $13,600,000 of system revenue bonds to fund construction of a University Drive Pedestrian Bridge.

(Continued)

The review included the following standard university financing provisions shown below:

Standard University Financing Provisions

A. *A favorable review by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for debt service or any operations and maintenance costs when the project is complete.*

B. *ASU shall provide the final debt service schedule and interest rate for the project as soon as they are available.*

C. *On or before October 15 of each year until completion of the project, ASU shall report to the JLBC Staff on the status and expenditures of the University Drive Pedestrian Bridge project. The report shall include the project expenditures to date, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.*

The motion carried with a roll call vote of 11-3-0-0. *(Attachment 1).*

Without objection, the meeting adjourned at 10:49 a.m.

Respectfully submitted:

Kristy Paddack, Secretary

Jack Brown, Deputy Director

Representative Regina Cobb, Chairman

NOTE: A full video recording of this meeting is available at http://www.azleg.gov/jlbc/meeting.htm.

JOINT COMMITTEE ON CAPITAL REVIEW

Meeting Date: September 23, 2020

ITEM #: Arizona State University – Review of University Drive Pedestrian Bridge
MOTION: Senator Gowan moved for a favorable review with the provisions.

	PRESENT	ABSENT	PASS	AYE	NAY	PRESENT	ABSENT
SEN. ALSTON	X			X			
SEN. BOWIE	X			X			
SEN. BRADLEY	X			X			
REP. FERNANDEZ	X			X			
REP. FRIESE	X			X			
SEN. GRAY	X			X			
REP. KAVANAGH	X			X			
SEN. KERR	X			X			
SEN. LEACH	X				X		
REP. LIEBERMAN	X			X			
REP. PETERSEN	X				X		
REP. TOMA	X			X			
SEN. GOWAN	X				X		
REP. COBB	X			X			
TOTALS	14	0	0	11	3	0	0

	PASS	AYE	NAY	PRESENT	ABSENT
SEN. ALSTON					
SEN. BOWIE					
SEN. BRADLEY					
REP. FERNANDEZ					
REP. FRIESE					
SEN. GRAY					
REP. KAVANAGH					
SEN. KERR					
SEN. LEACH					
REP. LIEBERMAN					
REP. PETERSEN					
REP. TOMA					
SEN. GOWAN					
REP. COBB					
TOTALS					

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Morgan Dorcheus, Senior Fiscal Analyst

SUBJECT: Arizona State University - Review of Multipurpose Arena Construction Project

Request

A.R.S. § 15-1683 requires Committee review of any university projects financed with system revenue bonds. Arizona State University (ASU) requests Committee review of $115,000,000 in system revenue bond issuances to fund construction of a Multipurpose Arena. ASU will fund the debt service payments with auxiliary revenue and charitable gifts.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following standard university financing provisions:

Standard University Financing Provisions

A. A favorable review by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for debt service or any operations and maintenance costs when the project is complete.

B. ASU shall provide the final debt service schedule and interest rate for the project as soon as they are available.

(Continued)

C. On or before October 15 of each year until completion of the project, ASU shall report to the JLBC Staff on the status and expenditures of the Multipurpose Arena construction project. The report shall include the project expenditures to date, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.

Additional Provision

D. On or before October 15 of each year, ASU shall report to the JLBC Staff on the amount of each revenue source used for the Multipurpose Arena project debt service and provide an update on the terms and conditions of the Multipurpose Arena venue management contract. ASU shall continue to provide the report each year until notified by the Joint Committee on Capital Review Chairman.

Key Points

1) ASU will issue $115.0 million of system revenue bonds for construction of a Multipurpose Arena.
2) The facilities will house the ASU men's ice hockey program and will host gymnastics and wrestling competitions.
3) $6.4 million in annual debt service will be funded by Athletic Facilities District revenue (49%), arena revenue (38%), and charitable gifts (13%).
4) The request does not provide further details on the financing sources, making it difficult to analyze the sufficiency of the revenue sources.
5) ASU will contract with a venue management company to rent facility spaces for entertainment and athletic events.
6) Venue management contracts can greatly affect the profitability of the facility. Even with the information provided by ASU, it is difficult to evaluate the contract.

Analysis

ASU intends to construct a 179,200 square foot Multipurpose Arena on its Tempe campus. The arena will be located on South Packard Drive opposite Sun Devil Stadium, will house the ASU men's ice hockey program, and will host ASU wrestling and gymnastics competitions. The building will include approximately 5,000 seats, 2 sheets of ice, portable hardwood sports courts, locker rooms, and press facilities. In addition, ASU plans to integrate the facility with commercial retail developments planned for this section of the Tempe campus.

The design of the Multipurpose Arena will also allow for other community events, including lectures, large meetings, clinics, and concerts. The arena will be managed by a third-party venue management and event company.

The total cost of the proposed construction project is $115.0 million.

Financing

ASU intends to issue $115.0 million of system revenue bonds split between 2 issuances in March 2021 and March 2022. ASU anticipates a rating of Aa2 (Moody's)/AA (S&P) and an estimated interest rate of 3.32% and 3.67% over a 30-year term. In addition to project costs, issuance costs are projected to be $1,391,900. The annual debt service will be $1.4 million in FY 2022, $4.2 million in FY 2023, and $6.4 million from FY 2024 - FY 2053 paid by ASU Athletic Facilities District revenue (49%), revenue from the proposed Multipurpose Arena (38%), and charitable gifts (13%).

The debt service on this project increases ASU's current debt ratio by 0.18% from 4.60% to 4.78%.

(Continued)

Construction Costs

Of the total $115.0 million project cost, $91.5 million is for direct construction costs. Total project costs per square foot are $642, while direct construction costs per square foot are $510.

The most recent athletic facilities project completed by ASU was for renovation of the Sun Devil Stadium in 2017. Total renovation costs for the facility were $248 per square foot. Since this was a renovation of an existing larger facility, these costs may not be comparable to the current project.

The University of Arizona (UA) completed a construction project in 2019 for a new Indoor Sports Center, which is used as an indoor practice facility for football and other sports. The total construction costs for this project were $309 per square foot. Unlike UA's facility, ASU's current proposal for a Multipurpose Arena will include seating and other accommodations for entertainment and athletic events rather than being used solely as practice facilities, which may explain some of the differences in construction costs.

ASU reports that the new facilities will be constructed through a Design-Build delivery method. Construction will begin January 2021, with construction scheduled to be complete by December 2022.

Table 1

Multipurpose Arena Facility Construction

Total Square Footage	179,200	
Funding		
System Revenue Bonds 1/	$115,000,000	
Costs		
Direct Construction Costs	$91,488,400	($510 per sq. ft.)
Other Costs 2/	23,511,600	($132 per sq. ft.)
Total	**$115,000,000**	**($642 per sq. ft.)**
Operations & Maintenance	$0	

1/ Annual debt service payments on $115.0 million principal are based on interest rates of 3.32% and 3.67% for a total debt service cost of $198.9 million. Debt service will be paid by auxiliary revenues and charitable gifts.
2/ Includes equipment, furniture, project design and management fees, and other costs.

Operations and Maintenance Costs

ASU plans to contract with a venue management company for the new facility to rent spaces for concerts, athletic events, competitions, instructional clinics, and other programs.

In providing additional information about the venue management contract, ASU has stated that the company will be responsible for operations and routine maintenance of the facilities. In terms of revenue sharing, ASU will retain ticket revenue from ASU events (such as hockey, gymnastics and wrestling), parking revenue, and "certain merchandise and naming revenues".

For other events, ASU has stated "net revenue from other events, such as concerts and family programs, will be shared between ASU and the venue management company. ASU and the venue management company will each receive an initial allocation of net revenue and net revenue beyond this level that will be allocated proportionately, with ASU receiving a larger allocation."

(Continued)

While the venue management company will be responsible for all routine maintenance, ASU has indicated the university will be responsible for ongoing capital improvements, and that a portion of ticket revenue will be set aside in a capital reserve to fund those types of projects.

Even with this additional information, it is difficult to evaluate the venue management contract given a lack of details regarding the exact revenue sharing agreement and estimates of how much revenue will be generated by each type of arena event. Due to this uncertainty, the Committee may consider Provision D, which would require ASU to annually report on the revenue sources used for the project's debt service and provide an update on the terms and conditions of the arena venue management contract.

Table 2

Multipurpose Arena Financing Terms

Construction Timeframe	January 2021 – December 2022
Issuance Amount	$115.0 million
Issuance Date	March 2021 / March 2022
Issuance Transaction Fees	$1,391,900
Rating	Aa2 (Moody's)/AA (S&P)
Interest Rate	3.32% / 3.67%
Term	30 years
Total Debt Costs	$198.9 million
Debt Service Payments	$1.4 million (FY 2022) $4.2 million (FY 2023) $6.4 million (FY 2024 – FY 2053)
Payment Source	Athletic Facilities District Revenue (49%), Multipurpose Arena Revenue (38%), Charitable Gifts (13%)
Debt Ratio Increase	0.18%

MD:kp

ASU Arizona State University

November 23, 2020

The Honorable Regina E. Cobb, Chairman
Joint Committee on Capital Review
Arizona House of Representatives
1700 West Washington Street
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with ARS 15-1683, the Arizona Board of Regents requests that the following Arizona State University bond-financed project be placed on the next Joint Committee on Capital Review agenda:

- Multipurpose Arena

Enclosed is pertinent information relating to this item.

If you have any questions or desire any clarification on the enclosed material, please contact me at (480) 727-9920.

Sincerely,

Morgan R. Olsen
Executive Vice President, Treasurer and CFO

Enclosures

c: Richard Stavneak, Director, JLBC
John Arnold, Executive Director, Arizona Board of Regents, ABOR
Lorenzo Martinez, Chief Financial Officer and Director of Finance, ABOR
Matt Salmon, Vice President, Government Affairs, ASU
Adam C. Deguire, Associate Vice President, Government Affairs, ASU
Kendra Burton, Director, State Relations, ASU
Bruce Nevel, Vice President, Facilities Development and Management, ASU
Joanne Wamsley, Vice President for Finance and Deputy Treasurer, ASU
Morgan Dorcheus, Fiscal Analyst, JLBC

OFFICE OF THE EXECUTIVE VICE PRESIDENT AND CHIEF FINANCIAL OFFICER
BUSINESS AND FINANCE
PO BOX 877505, TEMPE, AZ 85287-7505
(480) 727-9920 FAX: (480) 727-9922

Joint Committee on Capital Review
Arizona State University
December 2020 JCCR Meeting

1. Multipurpose Arena

Project Description

This project will construct a Multipurpose Arena, on a site east of Sun Devil Stadium and north of the Packard Drive parking structure, to accommodate a wide range of university, public, entertainment and intercollegiate athletic uses. Working with industry design and construction experts, the arena can be transformed to host concerts, lectures, large-scale meetings and a variety of Sun Devil athletic events to increase student, alumni and community engagement and enhance our local impact and social embeddedness.

The approximately 179,238 gross-square-foot Multipurpose Arena will address the needs of the Sun Devil men's ice hockey program, host Sun Devil wrestling and gymnastics competitions, and include a second ice surface to provide the community with a practice and competition location for regional youth and adult hockey clubs. The arena design will be flexible and include portable hardwood sports courts to accommodate other arena sports, including Sun Devil volleyball, as well as family programs and other public events.

The $115.0 million project budget will be debt-financed with ASU system revenue bonds amortized over an approximate thirty-year term. Auxiliary funds, including facility revenues, charitable gifts and, in the longer term, Athletic Facilities District revenues will fund the debt service.

An Arizona Board of Regents executive summary for this project is attached, which outlines the project description and other relevant information. This project received Capital Development Plan approval at the November 19, 2020 Arizona Board of Regents meeting, which is the final required ABOR approval.

Project Costs

Total Project Cost	$ 115,000,000
Total Project Construction Cost	$ 91,488,424
Total Project Cost per GSF	$ 642
Construction Cost per GSF	$ 510

Joint Committee on Capital Review
Arizona State University
December 2020 JCCR Meeting

Project Summary –Revenue Bonds

Projects:	Funding Sources:	Amount:
Multipurpose Arena	Auxiliary Funds and Charitable Gifts	$ 115,000,000

Financing Information

System Revenue Bonds:	
Project Costs	$115,000,000
Estimated Costs of Issuance	$1,391,900
Capitalized Interest	$1,393,100
Anticipated Bond Rating	Aa2 (Moody's) and AA (S&P)
Assumed Interest Rate	3.32%/3.67%
Term	30 years

Estimated Debt Service Information:	
FY 2022 and FY 2023 (interest only)	$2,769,834
FY 2024 to FY 2053	$6,443,755
Total Estimated Debt Service	$198,852,316

Debt Ratio

Debt Ratio on Existing Debt	4.60%
Incremental Debt Ratio	.18%
Project Debt Ratio	4.78%

Joint Committee on Capital Review
Arizona State University
December 2020 JCCR Meeting

Arizona State University
Multipurpose Arena
System Revenue Bonds

	Estimated Issuance March 2021		
Fiscal Year	Principal	Interest	Total
2022		$1,360,370	$1,360,370
2023		1,360,370	1,360,370
2024	$820,000	1,360,370	2,180,370
2025	845,000	1,333,146	2,178,146
2026	875,000	1,305,092	2,180,092
2027	900,000	1,276,042	2,176,042
2028	930,000	1,246,162	2,176,162
2029	965,000	1,215,286	2,180,286
2030	995,000	1,183,248	2,178,248
2031	1,025,000	1,150,214	2,175,214
2032	1,060,000	1,116,184	2,176,184
2033	1,095,000	1,080,992	2,175,992
2034	1,135,000	1,044,638	2,179,638
2035	1,170,000	1,006,956	2,176,956
2036	1,210,000	968,112	2,178,112
2037	1,250,000	927,940	2,177,940
2038	1,290,000	886,440	2,176,440
2039	1,335,000	843,612	2,178,612
2040	1,380,000	799,290	2,179,290
2041	1,425,000	753,474	2,178,474
2042	1,470,000	706,164	2,176,164
2043	1,520,000	657,360	2,177,360
2044	1,570,000	606,896	2,176,896
2045	1,625,000	554,772	2,179,772
2046	1,675,000	500,822	2,175,822
2047	1,735,000	445,212	2,180,212
2048	1,790,000	387,610	2,177,610
2049	1,850,000	328,182	2,178,182
2050	1,910,000	266,762	2,176,762
2051	1,975,000	203,350	2,178,350
2052	2,040,000	137,780	2,177,780
2053	2,110,000	70,052	2,180,052
Total	$40,975,000	$27,082,900	$68,057,900

Joint Committee on Capital Review
Arizona State University
December 2020 JCCR Meeting

Arizona State University
Multipurpose Arena
System Revenue Bonds

Fiscal Year	Estimated Issuance March 2022 Principal	Interest	Total
2023		$2,818,927	$2,818,927
2024	$1,445,000	2,818,927	4,263,927
2025	1,500,000	2,765,895	4,265,895
2026	1,555,000	2,710,845	4,265,845
2027	1,610,000	2,653,777	4,263,777
2028	1,670,000	2,594,690	4,264,690
2029	1,735,000	2,533,401	4,268,401
2030	1,795,000	2,469,726	4,264,726
2031	1,860,000	2,403,850	4,263,850
2032	1,930,000	2,335,588	4,265,588
2033	2,000,000	2,264,757	4,264,757
2034	2,075,000	2,191,357	4,266,357
2035	2,150,000	2,115,205	4,265,205
2036	2,230,000	2,036,299	4,266,299
2037	2,310,000	1,954,459	4,264,459
2038	2,395,000	1,869,681	4,264,681
2039	2,485,000	1,781,785	4,266,785
2040	2,575,000	1,690,586	4,265,586
2041	2,670,000	1,596,083	4,266,083
2042	2,770,000	1,498,094	4,268,094
2043	2,870,000	1,396,435	4,266,435
2044	2,975,000	1,291,106	4,266,106
2045	3,085,000	1,181,923	4,266,923
2046	3,200,000	1,068,704	4,268,704
2047	3,315,000	951,264	4,266,264
2048	3,435,000	829,604	4,264,604
2049	3,560,000	703,539	4,263,539
2050	3,695,000	572,887	4,267,887
2051	3,830,000	437,280	4,267,280
2052	3,970,000	296,721	4,266,721
2053	4,115,000	151,021	4,266,021
Total	$76,810,000	$53,984,416	$130,794,416

EXECUTIVE SUMMARY

Arizona State University
Amended Capital Development Plan–Project Justification Report
Multipurpose Arena

Previous Board Action

- FY 2022-2024 Capital Improvement Plan — October 2020

Project Justification/Description/Scope

- The Multipurpose Arena is designed to accommodate a wide range of community, entertainment and intercollegiate athletic uses. Working with industry design and construction experts, the arena can be transformed for concerts, lectures, large-scale meetings and a variety of Sun Devil athletic events.

- Sun Devil Athletics has established the goal of providing excellent performance venues and support facilities for all student-athletes. This goal supports ASU's charter in a number of ways, including by increasing student, alumni and community engagement and enhancing our local impact and social embeddedness.

- The Sun Devil men's ice hockey team currently rents ice time for both practice and games at Oceanside Arena in Tempe, which is suboptimal for team development and community engagement. Student and community engagement has been high and demand for seating has been greater than the capacity of the venue for years.

- The Multipurpose Arena will complement the existing larger-scale event venues at ASU with its medium-sized seating capacity, enabling community, corporate and ASU groups from a few thousand to tens of thousands to gather for a variety of needs.

- In May 2019, the university conducted a formal public solicitation for proposals to design, construct and operate a stand-alone Multipurpose Arena. This approach will benefit the university, as experienced, specialized companies will be responsible for the construction and operation of the facility, including the attraction of non-university events that will generate needed incremental revenue.

- The proposed project plan will locate the Multipurpose Arena on a site north of the existing South Packard Drive parking structure, south of the existing solar power parasol and east of Sun Devil Stadium, as depicted on the attached map as Exhibit B. This location reinforces South Packard Drive as the home for major Sun Devil athletics programs, including football, basketball and ice hockey. The location of the Multipurpose Arena also will have an accretive impact to the development of the Novus

EXECUTIVE SUMMARY

Innovation Corridor by creating a unique center of activity along Novus Place, north of the current Phase III developments.

- Construction of the approximately 179,238 gross-square-foot Multipurpose Arena will address the needs of the NCAA Division I Sun Devil men's ice hockey program, host Sun Devil wrestling and gymnastics competitions, and include a second sheet of ice. The second ice surface will provide the community with a practice and competition location for regional youth and adult hockey clubs, as well as a practice ice sheet for the Sun Devil hockey team. The arena design will be flexible and include portable hardwood sports courts, allowing the facility to accommodate other arena sports, including Sun Devil volleyball. Additionally, the arena design will allow for family shows, concerts and other public events to be hosted to enhance community engagement.

- The facility will include approximately 5,000 seats with premium seating for enhanced revenue generation, including twenty private suites, nine loges and two group suites. The event level of the arena will house a club for premium seating, locker rooms, press facilities and arena support spaces. The facility is sited to integrate with and provide access to the retail spaces planned along Novus Place, while maximizing future Novus development opportunities in support of the master development plan for the Novus Innovation Corridor.

- The Multipurpose Arena will be managed by a third-party operator that is a national venue management and event programming company. The operator will leverage its extensive relationships in the entertainment industry to bring revenue-generating events, such as concerts, athletic events, eSports competitions, family programs and instructional clinics to the Multipurpose Arena.

Project Delivery Method and Process

- During the RFP process, ASU received four proposals and all four were interviewed. The proposals included four developers and three operators. ASU has issued a notice of intent to award the development contract to Mortenson and the management contract to a nationally recognized third-party operator.

- This project will be delivered through the Design-Build delivery method under a development and construction agreement with Mortenson, a nationally recognized arena contractor. This approach was selected to streamline project delivery, identify potential cost savings and alleviate potentially adversarial project environments.

EXECUTIVE SUMMARY

Project Status and Schedule

- General construction is scheduled to begin when the design is complete and after all approvals are in place. Project substantial completion is targeted for December 2022.

Project Cost

- The total budget for this project is $115.0 million.
- The estimated construction cost for the approximately 179,238 gross-square-foot (gsf) multipurpose arena is $510 per gsf. The estimated total project cost is $642 per gsf and includes construction costs, site development costs, FF&E and soft costs.

Fiscal Impact and Financing Plan

- The $115.0 million project budget will be debt-financed with ASU system revenue bonds amortized over an approximate thirty-year term. Auxiliary funds, including facility revenues, charitable gifts and, in the longer term, Athletic Facilities District revenues will fund the debt service.
- During the construction period for the project, ASU may capitalize interest, providing time for the revenues that will pay debt service, which are dependent on arena completion, to be realized.
- The third-party operator will be responsible for all operations and maintenance costs for the Multipurpose Arena.
- **Debt Ratio Impact**: The projected incremental debt ratio impact for this project is 0.19 percent.

Occupancy Plan

- No backfill plan is associated with this project.

EXECUTIVE SUMMARY

Statutory/Policy Requirements

- ABOR Policy 7-102 (B) requires committee review and board approval of all capital projects with an estimated total project cost of $10,000,000 or more, including information technology and third-party projects.

- ABOR Policy 7-107 (E) requires Amended CDP approval for new projects added outside of the regular CDP.

EXECUTIVE SUMMARY

Capital Project Information Summary

University: Arizona State University **Project Name:** Multipurpose Arena

Project Description and Location: This project will construct a Multipurpose Arena designed to accommodate a wide variety of community, entertainment and intercollegiate athletic uses, including the Sun Devil men's ice hockey, wrestling and gymnastics programs. The location of this venue is depicted in Exhibit B.

Project Schedule:

Planning	January	2020
Design Start	February	2020
Construction Start	January	2021
Construction Completion	December	2022

Project Budget:

Total Project Cost	$ 115,000,000
Total Project Construction Cost	$ 91,488,424
Total Project Cost per GSF	$ 642
Construction Cost per GSF	$ 510

Change in Annual O & M Cost:

Utilities	$ 0
Personnel	0
All Other Operating	0
Subtotal	$ 0

Funding Sources:

Capital

System Revenue Bonds	$ 115,000,000
Debt Service Funding Sources:	Auxiliary Revenue and Charitable Gifts

Operations/Maintenance $ 0

EXECUTIVE SUMMARY

Capital Project Budget Summary

University: Arizona State University
Project: Multipurpose Arena

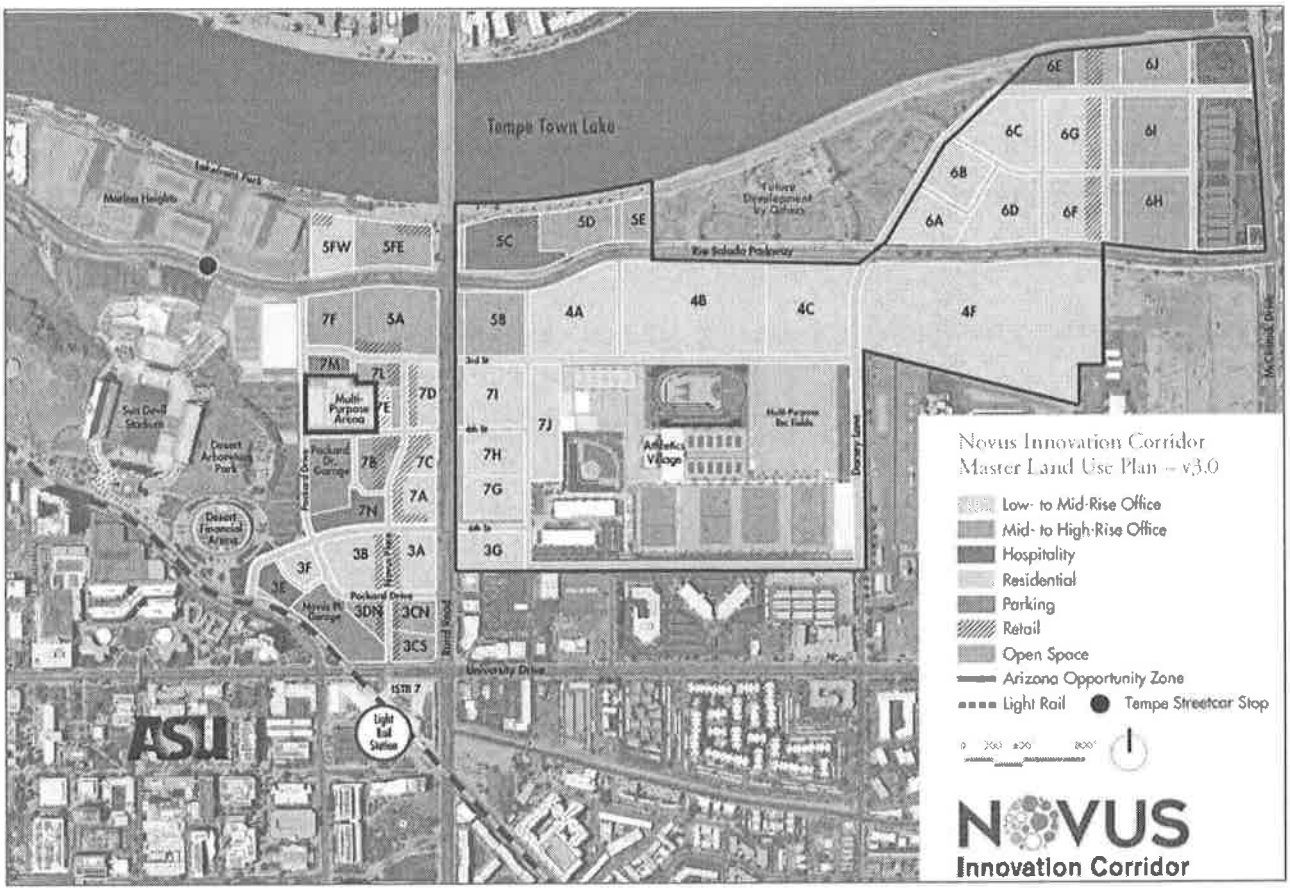
	Amended Capital Development Plan
Capital Costs	
1. Land Acquisition	
2. Construction Cost	
A. New Construction	$ 84,061,326
B. Renovation	
C. Special Fixed Equipment (Ice Plant)	2,465,000
D. Site Development (excl. 2.E.)	2,982,421
E. Parking and Landscaping	
F. Utilities Extensions	1,979,677
G. Other*	
Subtotal Construction Cost	$ 91,488,424
3. Fees	
A. Pre-Construction	
B. Architect/Engineer	$ 8,917,381
C. Other	
Subtotal Consultant Fees	$ 8,917,381
4. FF&E Movable	$ 3,582,000
5. Contingency, Design Phase	2,971,227
6. Contingency, Constr. Phase	3,719,588
7. Parking Replacement	
8. Telecommunications Equipment	
Subtotal Items 4-8	$ 10,272,815
9. Additional University Costs	
A. Surveys, Tests, Haz. Mat. Abatement	$ 250,000
B. Move-in Costs	50,000
C. Printing Advertising	30,000
D. Keying, signage, facilities support	400,000
E. Project Management Cost	3,250,000
F. State Risk Mgt. Ins. (.0034 **)	341,380
Subtotal Addl. Univ. Costs	$ 4,321,380
Total Capital Cost	$ 115,000,000

* Universities shall identify items included in this category

** State Risk Management Insurance factor is calculated on construction costs and consultant fees.

EXECUTIVE SUMMARY

Exhibit B
Multipurpose Arena
Site Location Map



2A

STATE OF ARIZONA

Joint Committee on Capital Review

STATE SENATE

DAVID M. GOWAN
VICE-CHAIRMAN
LELA ALSTON
SEAN BOWIE
DAVID BRADLEY
RICK GRAY
SINE KERR
VINCE LEACH

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

HOUSE OF REPRESENTATIVES

REGINA E. COBB
CHAIRMAN
CHARLENE R. FERNANDEZ
RANDALL FRIESE
JOHN KAVANAGH
AARON O. LIEBERMAN
WARREN PETERSEN
BEN TOMA

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Morgan Dorcheus, Senior Fiscal Analyst

SUBJECT: University of Arizona - Consider Review and Approval of Grand Challenges Research Building and Applied Research Building Financing Projects

Request

A.R.S. § 15-1671 requires Committee review of non-debt financed expenditures and Committee approval of any debt financed university capital projects paid for with funds from the university's Capital Infrastructure Fund (CIF). These monies are from the $1 billion capital investment program enacted in 2017. The University of Arizona (UA) requests Committee review of $16,300,000 in cash expenditures and approval of a $183,700,000 in bond issuances to construct new research facilities, for total project costs of $200,000,000. Of this amount, $99,000,000 is for the Grand Challenges Building, $85,000,000 is for the Applied Research Building, and $16,000,000 is for utility infrastructure upgrades to support systems for the 2 new buildings.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request to spend $16,300,000 in cash and approval of $183,700,000 in bond issuances.

2. An unfavorable review of the request to spend $16,300,000 in cash and disapproval of $183,700,000 in bond issuances.

Under either option, the Committee may also consider the following standard university financing provisions:

(Continued)

Standard University Financing Provisions

A. A favorable review and approval by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for operations and maintenance costs when the project is complete.

B. UA shall provide the final debt service schedules and interest rates for the projects as soon as they are available.

C. On or before October 15 of each year until completion of the project, UA shall report to the JLBC Staff on the status and expenditures of the Grand Challenges Research Building and Applied Research Building projects. The report shall include each project's expenditures to date, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.

Key Points

1) UA plans to construct 2 new research facilities on its main campus:
   - A 115,000 square foot Grand Challenges Research Building to house laboratory space for optical sciences, astronomy, and astrophysics and university research centers.
   - A 89,000 Applied Research Building to house laboratory space for imaging technology, advanced manufacturing, nanosatellites, and stratospheric balloons.
2) UA will issue $183.7 million of system revenue bonds and allocate $16.3 million in cash for the following costs:
   - $99.0 million will be used for the Grand Challenges Research Building.
   - $85.0 million will be used for the Applied Research Building.
   - $16.0 million will be used for a utility infrastructure project.
3) Half of the $11.0 million in annual debt service will be funded by indirect cost recovery revenues and half will be funded by General Fund appropriations from the $1 billon capital investment program.

Analysis

UA intends to construct 2 new research facilities on its main campus: the Grand Challenges Research Building and the Applied Research Building.

The Grand Challenges Research Building will be a 115,000 square foot interdisciplinary research facility located on Cherry Avenue and University Boulevard on the Tucson campus. The facility will replace a campus parking lot and include 6 stories of space that will house collaborative laboratory space for optical sciences, astronomy, and astrophysics. The facility will also include space for the Quantum Networks Engineering Research Center, the UA Space Institute, and the New Frontiers of Sound Science Technology Center. The facility may also be used to house private sector research partners.

The Applied Research building will be an 89,000 square foot facility located near UA's Aerospace and Mechanical Engineering Building at Mountain Avenue and Speedway Boulevard in Tucson. The new facility will include 3 stories to house research in imaging technology, advanced manufacturing, nanosatellites, and stratospheric balloons, and will include clean rooms and labs, a thermal vacuum chamber, and other advanced facilities with specialized equipment.

(Continued)

Construction of the new facilities will also include a research infrastructure upgrade project to support increased utility capacity in the Grand Challenges and Applied Research buildings and to support future campus growth. The project will include a new groundwater well facility and upgrades to storm water detention and drainage, steam, chilled water, electrical, and telecommunication systems.

The facilities will be constructed at a cost of $200.0 million, of which $99.0 million will be for the Grand Challenges Research Building, $85.0 million will be for the Applied Research Building, and $16.0 million will be for the utility upgrade project. UA plans to complete the Applied Research Building and utility upgrade projects by July 2023 and the Grand Challenges Building project by February 2024.

Financing

UA intends to pay $16.3 million in total design costs with cash over a 2-year period from the university's Capital Infrastructure Fund. The remaining $183.7 million cost will be funded by system revenue bonds with an anticipated rating of Aa2 (Moody's)/AA- (S&P) over a 22-year term, which will be paid using Capital Infrastructure Fund monies. The university plans to use both tax exempt and taxable issuances to fund the project, stating that the taxable issuances will allow potential private research partners to pay a portion of the debt service. The university has not yet determined issuance dates.

UA will make debt service payments of $11.0 million from FY 2022 – FY 2043. Half of the debt service payments will be funded by indirect cost recovery revenues and the other half by General Fund appropriations from the $1 billion bonding package.

Of the $242.5 million of cumulative debt service payments (principal and interest), $121.2 million will be paid from indirect cost recovery revenues and $121.2 million will be paid from the General Fund. *(See Table 3 for a summary of the bond financing terms).*

The debt service on this project increases UA's current debt ratio by 0.53%, from 4.90% to 5.43%. Including other UA projects on the agenda, UA's debt ratio would increase to 5.59%.

University Capital Infrastructure Funds (2017 Bonding Package)

Laws 2017, Chapter 328 established A.R.S. § 15-1671, which provides General Fund appropriations from FY 2019 - FY 2043 for new university research facilities, building renewal, or other capital construction projects. The law appropriates $27.0 million to the universities in FY 2019 and increases the appropriation each year thereafter by 2.0% or the rate of inflation, whichever is less. The FY 2021 appropriations are allocated to each university as follows:

- ASU: $12,381,200
- NAU: $4,692,900
- UA: $10,953,200
- **Total: $28,027,300**

The universities may use these monies for debt service on infrastructure long-term financing and for cash construction costs. New debt issued under this program may not exceed $1.0 billion.

Under the law, each university's General Fund appropriation is deposited into a newly-created Capital Infrastructure Fund (CIF). Each university must match any General Fund contributions to its fund that are used for debt service payments at a 1:1 rate. The $1.0 billion of new projects would thus be funded half by state appropriations and half from university resources.

(Continued)

Debt service payments made on CIF-funded projects are included in the universities' statutory debt limit. Any cash-based capital projects funded with CIF monies must be reviewed by the Joint Committee on Capital Review, and any debt-financed projects funded with CIF monies must be approved by the Committee.

UA has previously received Committee review/approval for 3 CIF-funded projects totaling $18.0 million in bonds issued and $21.0 million in cash expenditures. The December 16, 2020 Committee meeting includes a total of 4 additional CIF projects that will increase bond issuances under the program by $225.7 million and increase cash expenditures by $16.9 million.

Construction Costs

Of the $99.0 million total project cost for the Grand Challenges Research Building, direct construction costs (excluding items such as design and project management costs) are $73.8 million. As shown in *Table 1*, total project costs per square foot are $861, while direct construction costs per square foot are $642.

Of the $85.0 million total project cost for the Applied Research Building, direct construction costs (excluding items such as design and project management costs) are $62.6 million. As shown in *Table 2*, total project costs per square foot are $955, while direct construction costs per square foot are $703.

The most recent UA project for construction of research and lab space was reviewed by the committee in December 2018. The project consisted of building out 46,100 square feet of existing shell space on the Phoenix Biomedical Campus to add wet labs for new research faculty. The project cost a total of $34.0 million, or $738 per square foot. Higher construction costs for the current project are due to this project consisting entirely of new construction and the cost of specialized equipment for the new research facilities.

UA also provided a list of comparable new construction projects, which includes research buildings built by all the state's public universities between 2013 and 2019. Based on costs at the time on construction, the average cost per square foot among these projects was $657. However, some of these facilities included classroom space in addition to laboratory space, while the new Grand Challenges and Applied Research facilities include no additional instructional space. UA also provided escalated cost estimates after making adjustments for inflation and labor costs, which increased the average cost of the comparable projects to $951 per square foot.

UA states construction of the new facilities will begin in July 2021 and that the Design-Build contractor will complete the projects under the guaranteed maximum price arrangement with UA. The Applied Research Building and utility upgrade projects will be completed by July 2023 and the Grand Challenges Building project will be completed by February 2024.

Operations and Maintenance Costs

UA estimates that annual operations and maintenance costs will increase by $1,658,900, which will be paid by indirect cost recovery revenues.

(Continued)

Table 1

Grand Challenges Research Building Construction

Total Square Footage	115,000	
Funding		
Capital Infrastructure Fund Cash	7,800,000	
System Revenue Bonds 1/	91,200,000	
Total	**$99,000,000**	
Costs		
Direct Construction Costs	$73,800,000	($642 per sq. ft.)
Other Costs 2/	25,200,000	($219 per sq. ft.)
Total	**$99,000,000**	**($861 per sq. ft.)**
Operations & Maintenance	$951,000	

1/ Annual debt service payments on $91.2 million principal are based on interest rates of 2.50% and 2.75% for a total debt service cost of $120.4 million. Debt service will be paid by CIF monies (50% General Fund, 50% indirect cost recovery revenues).
2/ Includes equipment, furniture, project design and management fees, and other costs.

Table 2

Applied Research Building Construction & Utility Upgrades

Applied Research Building Square Footage	89,000	
Funding		
Capital Infrastructure Fund Cash	8,500,000	
System Revenue Bonds 1/	92,500,000	
Total	**$101,000,000**	
Funding Allocation		
Applied Research Building	85,000,000	
Utility Upgrades	16,000,000	
Total	**$101,000,000**	
Applied Research Building Costs		
Direct Construction Costs	$62,600,000	($703 per sq. ft.)
Other Costs 2/	22,400,000	($252 per sq. ft.)
Total – Applied Research Building	**$85,000,000**	**($955 per sq. ft.)**
Operations & Maintenance	$707,900	

1/ Annual debt service payments on $92.5 million principal are based interest rates of 2.50% and 2.75% for a total debt service cost of $122.0 million. Debt service will be paid by CIF monies (50% General Fund, 50% indirect cost recovery revenues).
2/ Includes equipment, furniture, project design and management fees, and other costs.

(Continued)

Table 3

Grand Challenges & Applied Research Building Financing Terms

Construction Timeframe	July 2021 – February 2024
Issuance Amount	$183.7 million
Issuance Date	To Be Determined
Issuance Transaction Fees	$1,221,000
Rating	Aa2 (Moody's)/AA- (S&P)
Interest Rate	2.50% (tax exempt bonds) 2.75% (taxable bonds)
Term	22 years
Total Debt Service Costs	$242.5 million
Debt Service Payments	$11.0 million
Payment Source	$121.2 million General Fund (CIF) $121.2 million Indirect Cost Recovery (CIF)
Debt Ratio Increase	0.53%

MD:kp

BUSINESS AFFAIRS
Administration Building Room 712
PO Box 210066
Tucson, AZ 85721-0066

Ofc: 520-621-5977
Fax: 520-621-7714

November 25, 2020

The Honorable Regina Cobb
Chairman, Joint Committee on Capital Review
House of Representatives
1700 West Washington St.
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with A.R.S. 15-1671 and A.R.S. 41-1252, the Arizona Board of Regents request the Grand Challenges Research Building (GCRB) project for the University of Arizona (UA) be placed on the next Joint Committee on Capital Review agenda.

The GCRB is a research facility that will expand UA's capacity in optical sciences and the related disciplines of astronomy and astrophysics. The UA College of Optical Sciences is the largest academic optics educational and research program in the country. The UA most recently ranked #1 in astronomy and astrophysics, and #5 in physical sciences by the 2018 National Science Foundation HERD survey. The total GCRB project cost is $99 million which will be financed through a combination of cash and System Revenue Bonds (SRBs) issued by the UA. The UA plans to use state appropriations from the Capital Infrastructure Fund (CIF) to pay $7.8 million over the next two years for the project's total design cost and finance the remaining $91.2 million with SRBs. The UA intends to pay for half of the annual debt service with CIF dollars and the other half with matching university indirect cost recovery revenues. The estimated annual debt service for the project is $5.5 million based on a 22-year maturity and interest rate of 2.50 – 2.75%. This will increase UA's annual debt service ratio by 0.26%.

Project Summary
GCRB will be a 6-story, 115,000 gross square foot building located on Cherry Avenue between University Drive and 4th Street. GCRB will be connected to the Meinel Building for Optical Sciences as well as the Main Library. Construction is scheduled to begin July 2021 and end February 2024.

Three floors in the GCRB will focus on optical sciences research, two floors will house transdisciplinary research centers, several labs will be located in the basement. Below are examples of the research and centers that will be located in the GCRB.

- **Optical Sciences**
  Optical sciences research includes the use of lasers, lenses, spectrometers and other light-manipulating systems to design equipment for manufacturing, medicine, communications and space exploration. GCRB will greatly expand UA's capacity in optical sciences, below are two areas that highlight UA's research potential.
  - **Space Exploration**: Researchers at UA are world-leaders in designing and fabricating highly specialized optics. Students work alongside faculty on projects of global

significance, such as the Giant Magellan Telescope, the Large Synoptic Survey Telescope, and OSIRIS-REx.

- There are over 50 existing industrial partners, with the largest industrial affiliates program on campus. A number of these are regional companies in Optics Valley, including UA-based start-up companies. Major partners include Raytheon Technologies, Lockheed Martin, Facebook, Apple, Microsoft, Nikon, BAE Systems, Tokyo Electron, ASML, Edmund Optics, Zemax, and Zygo Corp.
- Government funding agencies include NASA, National Science Foundation (NSF), Department of Defense (DoD), and IC elements

- **Medical Advancements**: At UA major research is ongoing related to the development of advanced optical microscopes, endoscopes, and micro-endoscopes. Several faculty members are involved in multi-modality imaging (optical, MRI, ultrasound, photoacoustic, nuclear) which is a technique that enables scientists to study the microenvironment of a tumor.
  - Industry partners include Johnson & Johnson, General Electric, Canon, and Nikon Research Corporation of America.
  - Government funding agencies include National Institutes for Health (NIH), NSF, and Department of Energy (DOE).

The College of Optical Sciences has over 50 active research programs and generates approximately $20 million in new research awards per year.

- **Quantum Networks Engineering Research Center**
  In August 2020 the NSF selected UA to lead and establish the Center for Quantum Networks. The quantum approach to computing is new to the physics of transferring information, it merges quantum mechanics and information theory. Quantum computing is expected to transform medicine, break encryption and revolutionize communications and artificial intelligence. In addition to developing the quantum internet, the Center is charged with creating the curriculum for the new discipline, "quantum information science and engineering." Companies like IBM, Microsoft and Google are racing to build reliable quantum computers
    - The Center's core partners, designated by NSF, are Harvard University, Massachusetts Institute of Technology, and Yale University.

  UA will receive an initial, five-year, $26 million grant from NSF, with an additional five-year $24.6 million option, to establish the Center for Quantum Networks.

- **UA Space Institute**
  UA is #4 in NASA funding among public universities and growing rapidly in DoD funding. The UA Space Institute will leverage the expertise of our large space science community to advance research in areas of space exploration, astrobiology, space situational awareness, and planetary defense.
    - The UA Space Institute's industry partners are intended to include companies like Ball Aerospace, WorldView, Boeing, and SpaceX.
    - The government funding agencies include NASA and DoD.

Nasa's FY20 budget shows an increase from $927 million to $1.5 billion for "Space Technology", DoD FY20 indicates $30M for "Space Technology Development".

The UA currently has over $120 million in space-related research activity and is expected to generate $130-$145 million per year over the next 5 years in this area.

- **New Frontiers of Sound Science Technology Center**
  UA recently participated is the final stages to house the NSF New Frontiers of Sound Science Technology Center. The Center is focused on bringing many of the benefits of quantum technologies to acoustic devices, including cell phones, radios, medical imaging. The research conducted at this Center will improve the security of communications, and the transactions that those communications support, and expand the amount of data that can efficiently be transferred.
    - Industry partners are expected to include acoustic wave device manufacturers, Intel, Google, General Dynamics, Raytheon, L3Harris and companies like SKYWORKS
    - Government funding agencies interested in supporting these developments are expected to include NSF, DoD, Energy and IC elements

  UA is competing for a $25 million grant from NSF to establish the New Frontiers of Sound Science Technology Center.

The first floor of GCRB will include large multi-functional space intended to support student engagement and will be capable of supporting some instructional activity. The GCRB will house the state-of-the-art equipment and technologies required to successfully carryout the research detailed above.

- **Large Air-Tables for Optical Systems Development**
  Many large air-tables are required to provide the space and stability needed to conduct most optical experiments.
- **Laser Systems**
  Laser systems drive most optical experiments and have specific power, cooling, shielding and other related requirements.
- **Quantum Systems**
  The facility will have at least one quantum networking testbed and specialized equipment for quantum network element prototyping.
- **Other Systems**
  There will be smart spaces hardware prototyping and human testing laboratories Remote sensing prototyping laboratories, and biomedical optics hardware prototyping laboratories.

Below is the estimated cost associated with each major component of the project:

Estimated Cost Breakdown

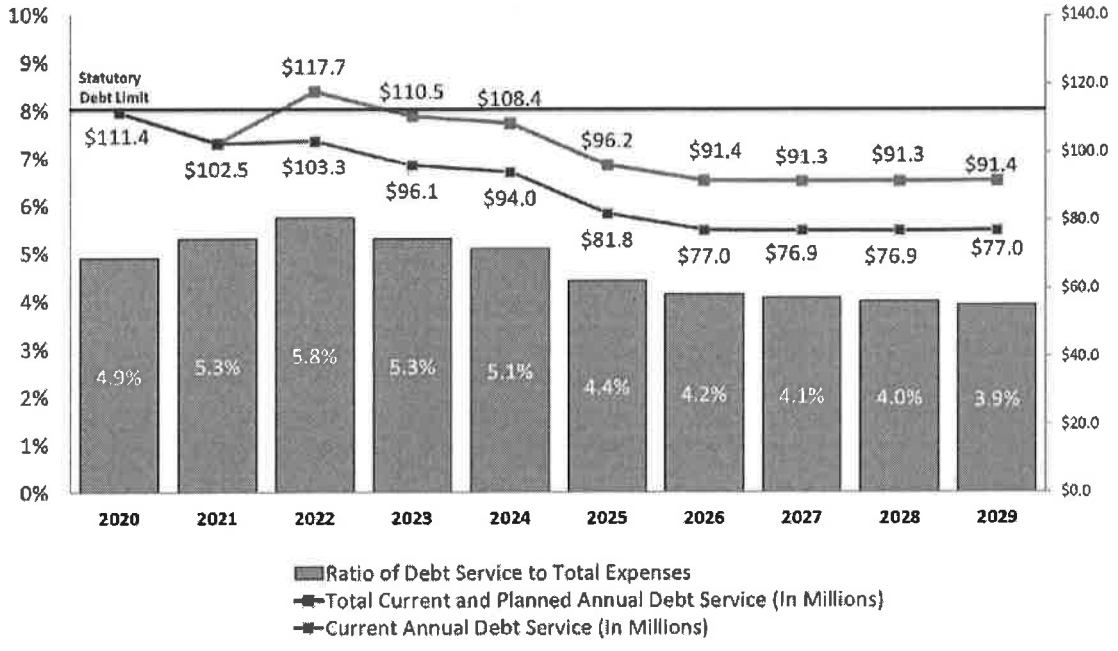
$	10,800,000	Pre-construction Costs • Design-Build fees • Pre-construction phase project management

$	73,800,000	Building Construction Costs • Construction • Construction inspections • Telecommunications • Contingency
$	5,500,000	Site/Utilities Construction Costs • Site utilities and infrastructure
$	8,900,000	Indirect Costs • Furniture, Fixtures and Equipment • Testing and Inspections • State Risk Management Insurance • Construction phase project management
$	99,000,000	TOTAL

Bond and Finance Summary

Since the passage of the public university Capital Infrastructure Fund (CIF) bonding package by the legislature in 2017, the UA has planned to finance two major research facilities and corresponding necessary upgrades to campus research infrastructure on the main campus in Tucson (the Grand Challenges Research Building & the Applied Research Building). While both projects have been in early development stages internally since 2017, the UA decided to postpone both projects in order to monitor the impact of COVID-19 and ensure proper financial mitigation strategies were in place. Now that the UA has a better understanding of the university's financial position and due to the long-term planning behind this project, the university believes now is an appropriate time to move forward. This will also allow the UA to secure a favorable interest rate due to historically low rates that currently exist in the market.

The UA plans to pay for the project's total design cost of $7.8 million over the next two years as cash payments with state appropriated CIF dollars, allowing the university to finance the total project cost with less debt. The remaining total project cost of $91.2 million will be financed with SRBs with an estimated annual debt service payment of $5.5 million based on a 22-year maturity rate for both taxable



and non-taxable bonds. The UA intends to issue 25% taxable SRBs and 75% tax exempt SRBs for the project in order to maximize space usage in the future. When estimating annual debt service, the university used a conservative approach of using a higher end rate of 2.75% for taxable bonds and 2.50% for tax exempt bonds. The UA intends to pay half of the annual debt service with CIF dollars and the other half with matching university indirect cost recovery revenues. The total planned debt issuance for

University of Arizona
Grand Challenges Research Building

Comparable Costs for JCCR Report

Project	Project Size	Construction Cost	Total Project Cost	Const. Cost/sf	Project Cost/sf	Date compl.	Escal. Const. Cost/sf	Escal. Proj. Cost/sf	Const. start
UA - GCRB	115,000	$ 74,000,000	$ 99,000,000	$643	$861	2024	$643	$861	07/2021
ASU - BioDesign C	189,760	$ 99,950,000	$ 120,000,000	$527	$632	04/2018	$766	$920	08/2016
ASU - ISTB 7	250,000	$ 152,000,000	$ 192,000,000	$608	$768	12/2021	$687	$868	09/2019
UA - BSRL	150,200	$ 85,000,000	$ 107,500,000	$566	$716	2018	$852	$1,078	12/2015
UA - HSIB	247,155	$ 132,000,000	$ 165,000,000	$534	$668	2018	$787	$983	07/2016
UA - BSPB	245,000	$ 112,000,000	$ 136,000,000	$457	$555	2016	$716	$869	01/2015
NAU - Science and Health	120,000	$ 53,000,000	$ 72,000,000	$442	$600	6/2015	$726	$986	05/2013

this project will increase the university's annual debt service ratio by 0.26%, however previous debt issued by the UA will be expiring in the next few years allowing the university to absorb the newly issued debt for this project without significant impact to the university's statutory debt ratio as seen below: Below is a breakdown of costs comparing the GCRB to other large university research facilities, including comparisons of construction costs, total project costs, costs by square footage and escalated cost estimates that factor in variables affecting prices (e.g., labor costs, inflation, etc.) to capture a more accurate cost comparison by year.

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Project Submission
Grand Challenges Research Building

Summary of Financing Information:

System Revenue Bond Taxable Issuance Amount:	$22,800,000
System Revenue Bond Tax Exempt Issuance Amount:	$68,400,000
Estimated Cost of Issuance:	$ 606,000
Estimated Interest Rate:	2.50% - 2.75%
Payment Term:	Approximately 22 years
Fund Source for **Total** Debt Payment:	State Appropriations & Indirect Cost Recovery

Total Annual Debt Service (by fund source):

Principal & Int. FY22-FY43 (Ave.) $5,500,000	State Appropriations & Indirect Cost Recovery

Total Debt Service Through Maturity: $120,444,000

Anticipated Date of Issuance:	Still To Be Determined
Expected bond rating SRB:	AA- (S & P) Aa2 (Moody's)

Debt Ratio Information:

Current Projected Debt Ratio:	4.90%
Increment Debt Ratio:	0.26%
Projected Highest Debt Ratio:	5.16%

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Grand Challenges Research Building
Taxable System Revenue Bonds
Amortization Schedule: 2.75%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	770,000	627,000	1,397,000
6/1/2023	790,000	605,825	1,395,825
6/1/2024	810,000	584,100	1,394,100
6/1/2025	835,000	561,825	1,396,825
6/1/2026	855,000	538,863	1,393,863
6/1/2027	880,000	515,350	1,395,350
6/1/2028	905,000	491,150	1,396,150
6/1/2029	930,000	466,263	1,396,263
6/1/2030	955,000	440,688	1,395,688
6/1/2031	980,000	414,425	1,394,425
6/1/2032	1,010,000	387,475	1,397,475
6/1/2033	1,035,000	359,700	1,394,700
6/1/2034	1,065,000	331,238	1,396,238
6/1/2035	1,095,000	301,950	1,396,950
6/1/2036	1,125,000	271,838	1,396,838
6/1/2037	1,155,000	240,900	1,395,900
6/1/2038	1,185,000	209,138	1,394,138
6/1/2039	1,220,000	176,550	1,396,550
6/1/2040	1,250,000	143,000	1,393,000
6/1/2041	1,285,000	108,625	1,393,625
6/1/2042	1,320,000	73,288	1,393,288
6/1/2043	1,345,000	36,988	1,381,988
	22,800,000	**7,886,179**	**30,686,179**

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Grand Challenges Research Building
Tax Exempt System Revenue Bonds
Amortization Schedule: 2.50%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	2,370,000	1,710,000	4,080,000
6/1/2023	2,430,000	1,650,750	4,080,750
6/1/2024	2,490,000	1,590,000	4,080,000
6/1/2025	2,550,000	1,527,750	4,077,750
6/1/2026	2,615,000	1,464,000	4,079,000
6/1/2027	2,680,000	1,398,625	4,078,625
6/1/2028	2,750,000	1,331,625	4,081,625
6/1/2029	2,815,000	1,262,875	4,077,875
6/1/2030	2,885,000	1,192,500	4,077,500
6/1/2031	2,960,000	1,120,375	4,080,375
6/1/2032	3,035,000	1,046,375	4,081,375
6/1/2033	3,110,000	970,500	4,080,500
6/1/2034	3,185,000	892,750	4,077,750
6/1/2035	3,265,000	813,125	4,078,125
6/1/2036	3,350,000	731,500	4,081,500
6/1/2037	3,430,000	647,750	4,077,750
6/1/2038	3,520,000	562,000	4,082,000
6/1/2039	3,605,000	474,000	4,079,000
6/1/2040	3,695,000	383,875	4,078,875
6/1/2041	3,790,000	291,500	4,081,500
6/1/2042	3,885,000	196,750	4,081,750
6/1/2043	3,985,000	99,625	4,084,625
	68,400,000	**21,358,250**	**89,758,250**

Sincerely,

Lisa N. Rulney
Sr. VP for Business Affairs and Chief Financial Officer

cc: John Arnold, Executive Director, ABOR
Dr. Betsy Cantwell, SVP-Research and Innovation UArizona
Morgan Dorcheus, JLBC Analyst
Dr. Robert C. Robbins, President UArizona
Richard Stavneak, Director, JLBC
Steve Voeller, VP-Government & Community Relations UArizona

Arizona Board of Regents
The University of Arizona
FY 2020 Capital Development Plan (CDP)
Project Justification Report

Grand Challenges Research Building (GCRB)
(Revised)

Previous Board Action

- Capital Improvement Plan FY 2020-2022 September 2018
- FY 2019 Capital Development Plan November 2018

Statutory and Policy Requirements

- Pursuant to Arizona Board of Regents Policy Chapter 7-102 (B)(1), all capital projects with an estimated total project cost of $10,000,000 or more, including information technology and third-party projects, shall be included in the Capital Development Plan.

Project Justification, Description and Scope

- Grand Challenges Research Building is a new $99 million interdisciplinary research facility to support the University of Arizona's research strengths. Research is in the core of Arizona's 2018 strategic plan, and this new building will stimulate interdisciplinary and public engagements providing space for new researchers and new sponsored projects.

- This 110,000 square foot facility is envisioned as a six-story facility (basement plus five stories above grade) in close proximity to other research entities to foster additional collaboration.

- The scope and budget for this project has been rebalanced with the other research building project being presented in this CDP: the Applied Research Building. Together these projects are supported by state appropriations tied to the Capital Infrastructure Fund established in ARS 15-1671 which commits the State to pay half of the debt service on $200M of capital construction. While the $200M total program budget remains the same, we are rebalancing the two project budgets to better accommodate the now known needs and specifics of each project.

- The University of Arizona will leverage its core strengths in the sciences through a strategic investment in this new building to drive high-impact interdisciplinary research programs that will broadly benefit the University's mission and the state of Arizona. By fostering new and sustainable collaboration in strategic domains, this building will accelerate the University's impact on our economy through advances in research. Consistent with Arizona's long-term strategic imperatives, the colocation synergy of this building will support application

demonstrators, translational research and cooperative commercial application development partnership, and education.

- The GCRB will provide a strong return on investment in research awards, as well as human and intellectual capital. The broadly recognized impact and potential of Arizona's strategic research initiatives has resulted in a highly favorable investment climate for public and private sector extramural research partnerships that will provide an outstanding venue for student research experiences and workforce development at the cutting edge of science and technology. This opportunity will have major reputational impact on the University by bringing leading thinkers to our campus and fostering collaborations between scientists, engineers, and members of the health science community.

- The majority of the GCRB facility will be dedicated to interdisciplinary and collaborative laboratory space to execute research partnerships, with highly efficient faculty and shared student spaces for the participating colleges and potential visiting private-sector partners.

Project Delivery Method and Process

- This project is being delivered through a Design-Build (D-B) delivery method. This approach was selected for this project because it can provide early cost control and save time through project scheduling, while providing contractor constructability and design input and coordination throughout the project, improving potentially adversarial project environments and still allowing for the selection of the most qualified architect-contractor team for this project.

- The Design-Builder provides a Guaranteed Maximum Price (GMP) based on the amount previously agreed upon in the Design-Build agreement. In the selection of major subcontractors, the Design-Builder uses a qualification-based selection process prescribed by the ABOR Procurement Code to allow major subcontractors a design-assist role during the design phase. All remaining subcontractor work is awarded on the basis of the lowest responsive and responsible subcontractor bids. For this work, a minimum of three subcontractor bids will be required, except for specialty items or instances where proprietary systems are required.

- The Design-Build Team was selected through the appropriate project search committee process prescribed by the ABOR Procurement Code. A licensed contractor was included on the search committee as required by ABOR Policy.

Project Status and Schedule

- Programming and concept design are underway.

- Project construction is scheduled to commence summer of 2020 and be completed winter of 2022.

Project Cost

- The total project budget for GCRB is $99 million, with a construction cost of $70.5 million.

- The construction budget for this project was developed by in-house University professionals using cost data from industry-standard cost databases and from completed comparable projects.

Fiscal Impact and Financing Plan

- The University plans to issue $99 million of System Revenue Bonds (SRBs) to fund the Grand Challenges Research Building. The annual debt service payments on the SRBs is estimated to be $6.0 million. Arizona plans to use state appropriations tied to the Capital Infrastructure Fund established in ARS 15-1671 to pay for half of the debt service, and Arizona's other local matching funds to pay the other half.

- The estimated operations and maintenance (O&M) cost for the Grand Challenges Research Building is $951,000. Arizona plans to fund the O&M with indirect cost recovery revenues.

Debt Ratio Impact:

- The estimated annual debt service of $6.0 million on this project would increase Arizona's debt ratio by 0.17 percent.

Occupancy Plan

- This facility will provide space for new researchers; it is not anticipated that space will be released.

Capital Project Information Summary

University: The University of Arizona
Project Name: Grand Challenges Research Building

Project Description / Location:
This project will create a new interdisciplinary research facility to be located along Cherry Avenue south of the main mall and the Meinel Optical Sciences Building. The project also includes related research infrastructure augmentation that will provide utility capacity for the new building.

	FY 2019 Capital Development Plan	FY 2020 Capital Development Plan (Revised)
Planning	Early 2019	Early 2019
Design	Mid 2019	Summer 2019
Construction	Mid 2020	Summer 2020
Occupancy	Late 2022	Winter 2022
Total Project Cost	$ 150,000,000	$ 99,000,000
Total Project Cost per GSF	$ 882	$ 900
Direct Construction Cost	$ 109,000,000	$ 70,500,000
Construction Cost per GSF	$ 641	$ 641
Change in Annual Oper. / Maint. Cost		
Utilities	$ 619,920	$382,000
Personnel	$ 608,600	$381,100
Other	$ 300,600	$187,900
Capital:		
• System Revenue Bonds (Debt service paid by State Appropriations and Other Arizona Local Matching Funds)	$ 150,000,000	$99,000,000
Operation/Maintenance:		
• Indirect Cost Recovery	$ 1,529,120	$951,000

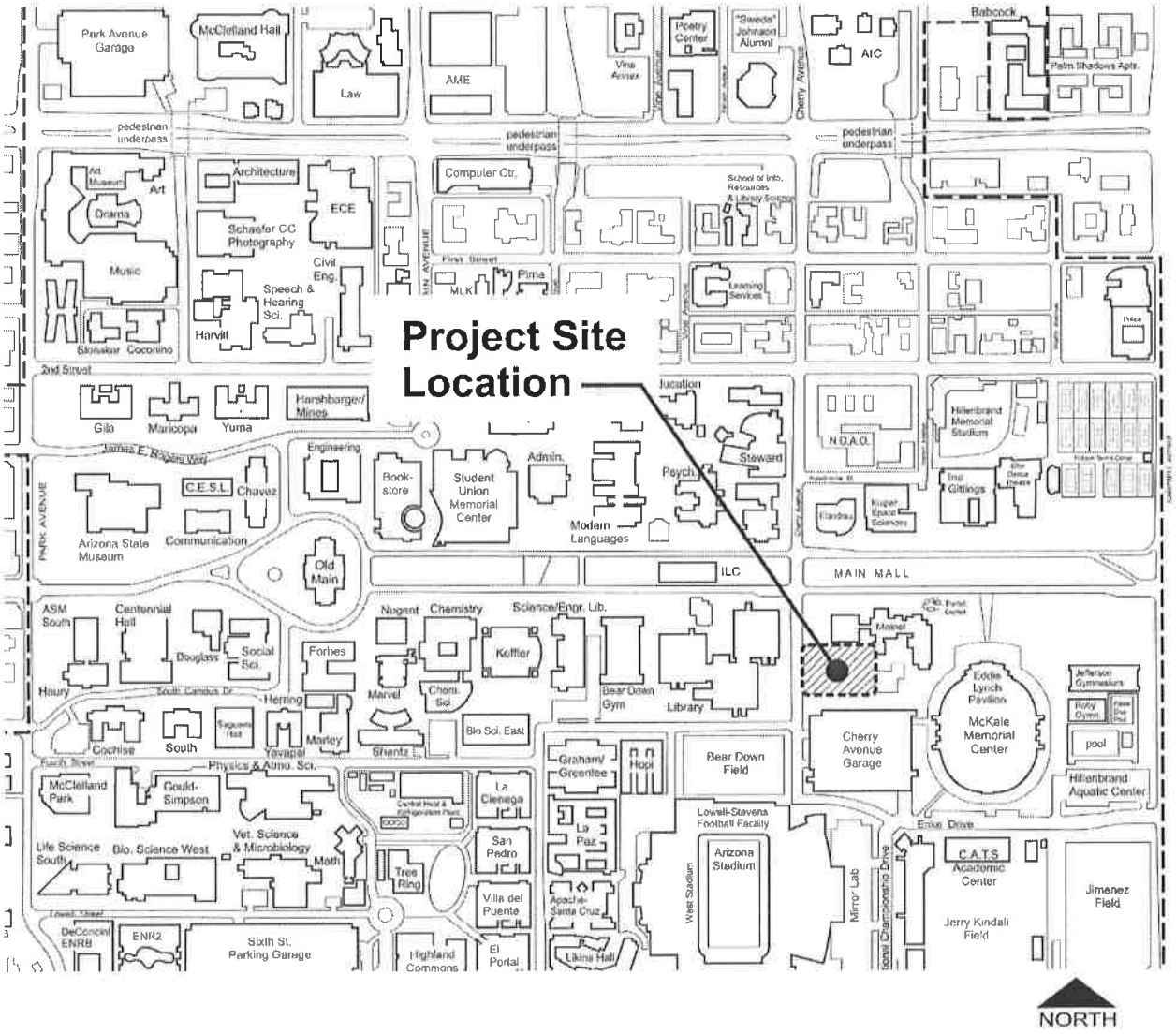
Capital Project Budget Summary

University: The University of Arizona
Project Name: Grand Challenges Research Building

Date of Budget Estimate	FY 2019 Capital Development Plan November 2018	FY2020 Capital Development Plan (Revised) November 2019
1. Land	$ 0	$ 0
2. Construction Cost		
A. New Construction	$ 105,500,000	$ 67,500,000
B. Renovation	$ 0	$ 0
C. Fixed Equipment	$ 2,000,000	$ 1,500,000
D. Site Development (exclude 2.E.)	$ 500,000	$ 500,000
E. Parking & Landscaping	$ 500,000	$ 500,000
F. Utilities Extensions	$ 500,000	$ 500,000
G. Other (asbestos only)	$ 0	$ 0
Subtotal Construction Cost	**$ 109,000,000**	**$ 70,500,000**
3. Consultant Fees		
A. Construction Manager	$ 1,100,000	$ 900,000
B. Architect/Engineering Fees	$ 11,100,000	$ 7,900,000
C. Other (Special Conslt.)	$ 800,000	$ 600,000
Subtotal Consultant Fees	**$ 13,000,000**	**$ 9,400,000**
4. Furniture Fixtures and Equipment	$ 8,000,000	$ 5,700,000
5. Contingency, Design Phase	$ 5,500,000	$ 3,600,000
6. Contingency, Construction Phase	$ 5,500,000	$ 3,600,000
7. Parking Reserve	$ 500,000	$ 500,000
8. Telecommunications Equipment	$ 2,500,000	$ 1,700,000
Subtotal Items 4-8	**$ 22,000,000**	**$ 15,100,000**
9. Additional University Costs		
A. Surveys and Tests	$ 800,000	$ 500,000
B. Move-in Costs	$ 350,000	$ 150,000
C. Public Art	$ 0	$ 0
D. Printing/Advertisement	$ 50,000	$ 50,000
E. Univ. Facilities & Project Mgmnt.	$ 4,000,000	$ 2,700,000
F. State Risk Mgt. Ins	$ 800,000	$ 600,000
Subtotal Additional University Costs	**$ 6,000,000**	**$ 4,000,000**
TOTAL CAPITAL COST	**$ 150,000,000**	**$ 99,000,000**

Project Site Map

Grand Challenges Research Building



BUSINESS AFFAIRS
Administration Building Room 712
PO Box 210066
Tucson, AZ 85721-0066

Ofc: 520-621-5977
Fax: 520-621-7714

November 25, 2020

The Honorable Regina Cobb
Chairman, Joint Committee on Capital Review
House of Representatives
1700 West Washington St.
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with A.R.S. 15-1671 and A.R.S. 41-1252, the Arizona Board of Regents request the Applied Research Building (ARB) which includes the related research utility infrastructure (RUI) project for the University of Arizona (UA) be placed on the next Joint Committee on Capital Review agenda.

The ARB is a research facility that will expand UA's capacity in the applied physical sciences and engineering. The related research utility infrastructure includes the external utility systems required to support the unique needs of the ARB and the Grand Challenges Building. The total project cost (ARB & RUI) is $101 million, the majority of which will be financed through System Revenue Bonds (SRBs) issued by the UA. The UA plans to use state appropriations from the Capital Infrastructure Fund (CIF) to pay cash for the project's total design cost of $8.5 million. The UA plans to issue SRBs for the remaining $92.5 million. The UA will use CIF dollars to pay for half of the annual debt service and indirect cost recovery revenues as matching funds to pay the other half. The estimated annual debt service for the project is $5.5 million based on a 22-year maturity and interest rate of 2.50 – 2.75%, increasing the UA's annual debt service ratio by 0.27%.

Project Summary

ARB will be a 3-story 89,000 gross square foot building located on Helen Street, between Highland Avenue and Vine Avenue. It is an interdisciplinary research facility which will co-locate faculty from across 4 colleges and 8 departments. ARB will improve UA competitiveness and research revenues while driving new public and private research partnerships. Construction on ARB is scheduled to begin July 2021 and end July 2023.

The ARB will focus on expanding several areas of research that have resulted in UA being ranked among the top 100 research institutions in the world. Below are examples of research that will be located in the ARB.

- **Imaging Technology**
  UA's Imaging Technology Laboratory (ITL) is a world-leading supplier of advanced scientific imaging sensors for the optical, UV, and X-ray spectral ranges. Currently located off campus, ARB will provide ITL additional space and cross-campus collaboration opportunities. The most common applications for imaging technology are in the fields of astronomy, satellite imagery, laboratory chemical analysis, and machine vision applications. ITL also develops and supports camera systems used on all UA telescopes.

- Industry partners include Lockheed Martin, Ball Aerospace, Smithsonian Astrophysical Observatory, Semiconductor Technology Associates, Teledyne DALSA, Spectral Instruments, Astronomical Research Cameras, WIYN Observatory, MIT/Lincoln Laboratories, Harvard University, and the University of Texas.
- Government funding agencies include NASA, National Science Foundation, Department of Energy (DOE), Department of Defense (DOD).

- **Advanced Manufacturing**
  Advanced manufacturing designs and constructs new composites and applies nanotechnology techniques to make existing materials stronger, lighter, cheaper and more energy efficient. UA's advanced manufacturing efforts also focus on on-demand 3D printing and additive manufacturing of aerospace parts. Additive manufacturing provides the ability to fabricate low-volume complicated, light-weight structures that cannot be made by conventional methods. Advances manufacturing has important applications with regards to next generation combat vehicles and new hypersonic systems.
  - Industry partners include Raytheon, Honeywell, Relativity Space, General Electric, Northrop Grumman, and Hughes Research Labs.
  - Department of Defense is heavily invested in advanced manufacturing of parts and components.

- **CubeSat Design, Fabrication and Testing**
  CubeSats, or nanosatellites, represent the next generation of spacecraft technology for space exploration and scientific investigation. Cubesats accelerate commercial and university innovation by reducing the cost of access to space, thereby expanding the range of missions and insights that are possible and enabling persistent Low Earth Orbit missions.
  - Industry Partners include Hera Systems, Space Micro, Lunar Experience, SC Advanced, Space Dynamics Laboratory.
  - The major government funding agency for CubeSat design is Nasa's Jet Propulsion Laboratory (JPL).

- **Balloon Payload Integration**
  Balloon Payload Integration enables the building of stratospheric balloons. These balloons are platforms that can often provide the same capabilities as satellite but at a much lower cost. Like satellites, these platforms can carry complex instrumentation but do not require a launch vehicle and can sometimes be retrieved fully intact. Missions that might be considered for a stratospheric balloon are earth observing, military sensor testing, and preparation for balloons on other planets.
  - The major industry partner for balloon payload integration is World View.
  - The major government funding agency for CubeSat design is Nasa's Jet Propulsion Laboratory (JPL).

The ARB will house the state-of-the-art equipment and technologies required to successfully carryout the research detailed above. Although no classes will be taught in ARB, students will have access to researchers and facilities to conduct undergraduate and graduate research.

- **Thermal Vacuum (TV) chamber**
  TV chamber is used to simulate environmental space conditions to test satellite and CubeSat performance.
- **Anechoic chamber**
  An anechoic chamber is a non-reflective, echo-free room designed to completely absorb reflections sound and/or electromagnetic waves. It is a critical element of antenna testing for command and control and data relay purposes.
- **Payload High Bay Lab**
  The high bay lab will be used for high altitude balloon, space ready payload missions and CubeSat design missions. An operable partition will allow two space missions to be built simultaneously, when the divider is retracted there will be capacity for up to three projects to be developed simultaneously.
- **Dynamic Testing Lab**
  The dynamic testing lab is one large testing lab with six stations that can each be set up to the precise needs of the component being tested: from very large objects such as an airplane wing to small objects such as sensors. Due to the nature of the testing, the overhead structure and floor slab require it to be isolated from the rest of the building.
- **Clean rooms and Labs**
  Multiple adjacent clean rooms support the TV chamber on the first floor, and large laboratories are centrally located for instrument development and small-scale testing on the third floor.

The UA has obtained over $35 million in research funding over the last five years in the areas of imaging, space systems, advanced manufacturing, and sensors and has over $100 million in pending proposals.

Below is the estimated cost associated with each major area of the project.

Estimated Cost Breakdown

$	9,200,000	Pre-construction Costs • Design-Build fees • Pre-construction phase project management
$	62,600,000	Building Construction Costs • Construction • Construction inspections • Telecommunications • Contingency
$	7,700,000	Site/Utilities Construction Costs • Site utilities and infrastructure • Highland Ave. Realignment & Site Development
$	5,500,000	Indirect Costs • Furniture, Fixtures and Equipment • Testing and Inspections • State Risk Management Insurance • Construction phase project management
$	85,000,000	TOTAL

$16 million Campus Research Utility Infrastructure
The remaining $16 million of the $101 million total will be used for necessary campus research infrastructure upgrades that encompasses multi-utility systems that will directly serve the ARB and Grand Challenges Building. The RUI will also augment existing and future facilities across campus. This project will provide a new groundwater well facility to replace the existing structure and secure the campus water supply. Storm water detention/drainage will be provided in the upgrades, as well as other associated infrastructure including steam, chilled water, electrical and telecommunications systems. The upgrades will be designed in an energy-efficient and maintenance-friendly manner to minimize operational costs and maximize efficiencies to accommodate growth.

Bond and Finance Summary

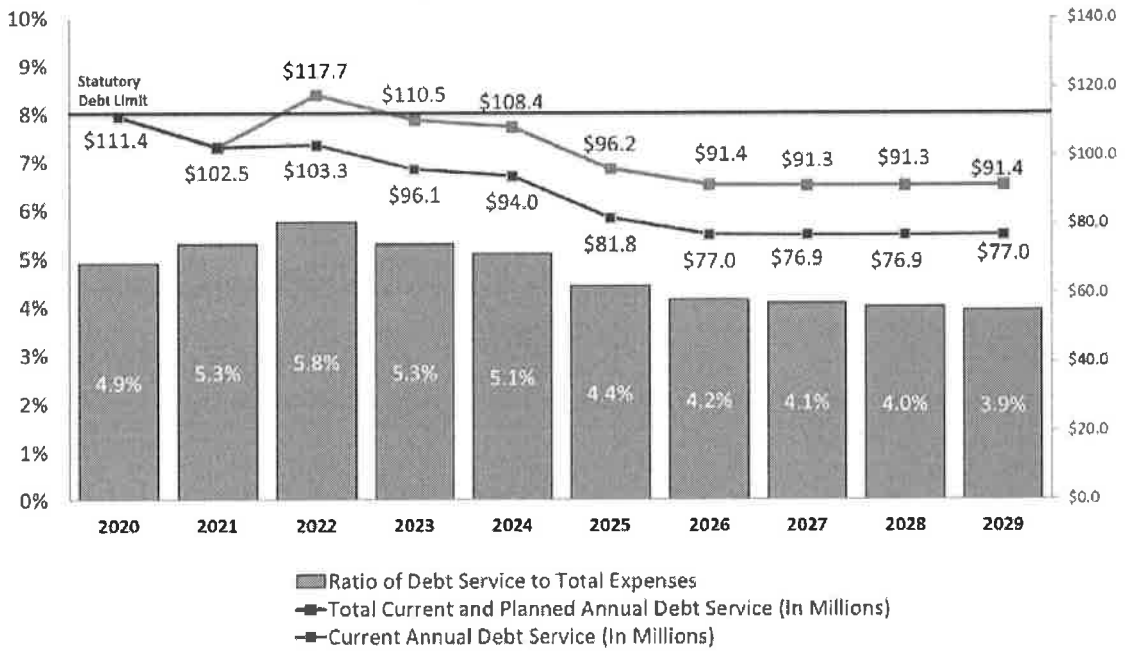
Since the passage of the Capital Infrastructure Fund (CIF) bonding package by the legislature in 2017, the UA has planned to finance two major research facilities and corresponding necessary upgrades to campus research infrastructure on the main campus in Tucson (ARB and the Grand Challenges Research Building). While both projects have been in early development stages internally since 2017, the UA decided to postpone in order to monitor the impact of COVID-19 and ensure proper financial mitigation strategies were in place. Now that the UA has a better understanding of the university's financial position and due to the long-term planning behind this project, the university believes now is the best time to move forward with the project. This will also allow the UA to secure a favorable interest rate due to historically low rates that currently exist in the market.

The UA plans to pay for the project's total design cost of $8.5 million over two years as cash payments with state appropriated CIF dollars, allowing the university to finance the total project cost with less debt. The remaining total project cost of $92.5 million will be financed with SRBs with an annual debt service payment of $5.5 million, half of which the university intends to pay with CIF dollars and half with indirect cost recovery revenues. The UA anticipates issuing the SRBs at an interest rate between 2.50 and 2.75%. The UA intends to issue 25% taxable SRBs and 75% tax exempt SRBs for the project in order to maximize space usage in the future. When estimating annual debt service, the university used a conservative approach of using a higher end rate of 2.75% for taxable bonds and 2.50% for tax exempt bonds. The planned SRBs will increase the university's annual debt service ratio by 0.27%. Previously issued debt by the UA will be expiring in the next few years allowing the university to absorb the new debt issuances for this project without significant impact to the institution's statutory debt ratio as seen below:

Below is a breakdown of costs comparing the ARB to other high technology research facilities, although as previously indicated the ARB will be a unique research facility in the southwestern United States.

Comparable Costs for JCCR Report

Project	Project Size	Construction Cost	Total Project Cost	Const. Cost/sf	Project Cost/sf	Year compl.	Escal. Const. Cost/sf	Escal. Proj. Cost/sf	Const. start
UA - ARB	87,000	$ 64,800,000	$ 85,000,000	$745	$977	2023	$745	$977	7/2021
ASU - BioDesign C	189,000		$ 120,000,000	$506	$635		$736	$924	10/2016
ASU - ISTB 7	258,000		$ 175,000,000	$614	$678		$752	$831	11/2018
UA - BSRL	150,200	$ 85,000,000	$ 107,500,000	$566	$716	2018	$852	$1,078	12/2015
UA - HSIB	247,155	$ 132,000,000	$ 165,000,000	$534	$668	2018	$723	$904	07/2016
UA - BSPB	245,000	$ 112,000,000	$ 136,000,000	$457	$555	2016	$716	$869	01/2015
NAU - Science and Health	122,000		$ 72,000,000	$489	$590		$804	$970	05/2013



Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Project Submission
Applied Research Building & Campus Research Infrastructure

Summary of Financing Information:

System Revenue Bond Taxable Issuance Amount:	$19,400,000
System Revenue Bond Tax Exempt Issuance Amount:	$58,400,000
System Revenue Bond Infrastructure Tax Exempt Issuance Amount:	$14,700,000
Estimated Cost of Issuance:	$ 615,000
Estimated Interest Rate:	2.50% - 2.75%
Payment Term:	Approximately 22 years
Fund Source for **Total** Debt Payment:	State Appropriations & Indirect Cost Recovery

Total Annual Debt Service (by fund source):

Principal & Int. FY22-FY43 (Ave.) $5,500,000	State Appropriations & Indirect Cost Recovery

Total Debt Service Through Maturity: $122,040,000

Anticipated Date of Issuance:	Still To Be Determined
Expected bond rating SRB:	AA- (S & P) Aa2 (Moody's)

Debt Ratio Information:

Current Projected Debt Ratio:	4.90%
Increment Debt Ratio:	0.27%
Projected Highest Debt Ratio:	5.17%

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Applied Research Building
Taxable System Revenue Bonds
Amortization Schedule: 2.75%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	655,000	533,500	1,188,500
6/1/2023	670,000	515,488	1,185,488
6/1/2024	690,000	497,063	1,187,063
6/1/2025	710,000	478,088	1,188,088
6/1/2026	730,000	458,563	1,188,563
6/1/2027	750,000	438,488	1,188,488
6/1/2028	770,000	417,863	1,187,863
6/1/2029	790,000	396,688	1,186,688
6/1/2030	810,000	374,963	1,184,963
6/1/2031	835,000	352,688	1,187,688
6/1/2032	855,000	329,725	1,184,725
6/1/2033	880,000	306,213	1,186,213
6/1/2034	905,000	282,013	1,187,013
6/1/2035	930,000	257,125	1,187,125
6/1/2036	955,000	231,550	1,186,550
6/1/2037	980,000	205,288	1,185,288
6/1/2038	1,010,000	178,338	1,188,338
6/1/2039	1,035,000	150,563	1,185,563
6/1/2040	1,065,000	122,100	1,187,100
6/1/2041	1,095,000	92,813	1,187,813
6/1/2042	1,125,000	62,700	1,187,700
6/1/2043	1,155,000	31,763	1,186,763
	19,400,000	**6,713,583**	**26,113,583**

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Applied Research Building
Tax Exempt System Revenue Bonds
Amortization Schedule: 2.50%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	2,025,000	1,460,000	3,485,000
6/1/2023	2,075,000	1,409,375	3,484,375
6/1/2024	2,125,000	1,357,500	3,482,500
6/1/2025	2,180,000	1,304,375	3,484,375
6/1/2026	2,235,000	1,249,875	3,484,875
6/1/2027	2,290,000	1,194,000	3,484,000
6/1/2028	2,345,000	1,136,750	3,481,750
6/1/2029	2,405,000	1,078,125	3,483,125
6/1/2030	2,465,000	1,018,000	3,483,000
6/1/2031	2,525,000	956,375	3,481,375
6/1/2032	2,590,000	893,250	3,483,250
6/1/2033	2,655,000	828,500	3,483,500
6/1/2034	2,720,000	762,125	3,482,125
6/1/2035	2,790,000	694,125	3,484,125
6/1/2036	2,860,000	624,375	3,484,375
6/1/2037	2,930,000	552,875	3,482,875
6/1/2038	3,005,000	479,625	3,484,625
6/1/2039	3,080,000	404,500	3,484,500
6/1/2040	3,155,000	327,500	3,482,500
6/1/2041	3,235,000	248,625	3,483,625
6/1/2042	3,315,000	167,750	3,482,750
6/1/2043	3,395,000	84,875	3,479,875
	58,400,000	**18,232,500**	**76,632,500**

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Campus Research Infrastructure
Tax Exempt System Revenue Bonds
Amortization Schedule: 2.50%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	510,000	367,500	877,500
6/1/2023	520,000	354,750	874,750
6/1/2024	535,000	341,750	876,750
6/1/2025	550,000	328,375	878,375
6/1/2026	560,000	314,625	874,625
6/1/2027	575,000	300,625	875,625
6/1/2028	590,000	286,250	876,250
6/1/2029	605,000	271,500	876,500
6/1/2030	620,000	256,375	876,375
6/1/2031	635,000	240,875	875,875
6/1/2032	650,000	225,000	875,000
6/1/2033	670,000	208,750	878,750
6/1/2034	685,000	192,000	877,000
6/1/2035	700,000	174,875	874,875
6/1/2036	720,000	157,375	877,375
6/1/2037	735,000	139,375	874,375
6/1/2038	755,000	121,000	876,000
6/1/2039	775,000	102,125	877,125
6/1/2040	795,000	82,750	877,750
6/1/2041	815,000	62,875	877,875
6/1/2042	835,000	42,500	877,500
6/1/2043	865,000	21,625	886,625
	14,700,000	**4,592,875**	**19,292,875**

Sincerely,

Lisa N. Rulney
Sr. VP for Business Affairs and Chief Financial Officer

cc: John Arnold, Executive Director, ABOR
Dr. Betsy Cantwell, SVP-Research and Innovation UArizona
Morgan Dorcheus, JLBC Analyst
Dr. Robert C. Robbins, President UArizona
Richard Stavneak, Director, JLBC
Steve Voeller, VP-Government & Community Relations UArizona

Arizona Board of Regents
The University of Arizona
FY 2020 Capital Development Plan (CDP)
Project Justification Report

Applied Research Building (ARB)
(Revised)

Previous Board Action

- Capital Improvement Plan FY 2020-2022 September 2018
- FY 2019 Capital Development Plan November 2018

Statutory and Policy Requirements

- Pursuant to Arizona Board of Regents Policy Chapter 7-102 (B)(1), all capital projects with an estimated total project cost of $10,000,000 or more, including information technology and third-party projects, shall be included in the Capital Development Plan.

Project Justification, Description and Scope

- A new $85 million building that is critically needed for the continued success of, and grant revenue generation related to, cross-campus research programs focused on applied research. This facility will create new and regionally-unique capabilities for the University, while consolidating a number of strategic interdisciplinary programs in one location, including advanced manufacturing, cubesat design and testing, payload integration, optical and IR imaging technology, and dynamic testing of high-performance materials. The program will benefit by being located in close proximity to the existing Aerospace and Mechanical Engineering building and near other interdisciplinary programs in the Biosciences Research Labs, as well as the Keating Bioresearch and Medical Research buildings. This building is being delivered together with a related research infrastructure augmentation project of $16 million. Together the combined total project budget is $101 million.

- This 85,250 GSF facility is envisioned as a multi-story building with a mix of space types including high bay and secure access to accommodate export-controlled projects that facilitate cubesat fabrication/testing, advanced manufacturing and payload integration research.

- The scope and budget for this project has been rebalanced with the other research building project being presented in this CDP: the Grand Challenges Research Building. Together these projects are supported by state appropriations tied to the Capital Infrastructure Fund established in ARS 15-1671 which commits the State to pay half of the debt service on $200M of capital construction. While the $200M total program budget remains the same, we

are rebalancing the two project budgets to better accommodate the now known needs and specifics of each project.

- The new Applied Research Building (ARB) will improve competitiveness and research revenues while driving new industry partnerships and regional economic development. It expands interdisciplinary applied physical sciences and engineering research focused on imaging, space systems, additive manufacturing, sensors, and targeted applications in the defense and biomedical sectors. At the same time, it will become a central asset in Arizona's ability to both recruit and retain high-performing faculty whose research is focused on systematic study of specific, practical challenges.

  The ARB will include advanced facilities such as clean rooms, thermal vacuum chambers, and advanced fabrication, prototyping, testing, and characterization facilities with high precision equipment to support research of interest to industry.

Project Delivery Method and Process

- This project is being delivered through a Design-Build (D-B) delivery method. This approach was selected for this project because it can provide early cost control and save time through project scheduling, while providing contractor constructability and design input and coordination throughout the project, improving potentially adversarial project environments and still allowing for the selection of the most qualified architect-contractor team for this project.

- The Design-Builder provides a Guaranteed Maximum Price (GMP) based on the amount previously agreed upon in the Design-Build agreement. In the selection of major subcontractors, the Design-Builder uses a qualification-based selection process prescribed by the ABOR Procurement Code to allow major subcontractors a design-assist role during the design phase. All remaining subcontractor work is awarded on the basis of the lowest responsive and responsible subcontractor bids. For this work, a minimum of three subcontractor bids will be required, except for specialty items or instances where proprietary systems are required.

- The Design-Build Team was selected through the appropriate project search committee process prescribed by the ABOR Procurement Code. A licensed contractor was included on the search committee as required by ABOR Policy.
-

Project Status and Schedule

- Programming and concept design are underway.

- Project construction is scheduled to commence in the fall of 2020 and scheduled to be completed in the spring of 2022.

Project Cost

- The total project budget is $85 million, with a construction cost of $60 million. The total budget for the related research infrastructure augmentation is $16 million. The combined total project budget is $101 million.

- The construction budget for this project was developed by in-house University professionals using cost data from industry-standard cost databases and from completed comparable projects.

Fiscal Impact and Financing Plan

- The University plans to issue $101 million of System Revenue Bonds (SRBs) to fund the Applied Research Building. The annual debt service payments on the SRBs is estimated to be $6.2 million. Arizona plans to use state appropriations tied to the Capital Infrastructure Fund established in ARS 15-1671 to pay for half of the debt service, and Arizona's other local matching funds to pay the other half.

- The estimated operations and maintenance (O&M) cost for the Applied Research Building is $707,900. Arizona plans to fund the O&M with indirect cost recovery revenues.

Debt Ratio Impact:

- The estimated annual debt service of $6.2 million on this project SRBs would increase Arizona's debt ratio by 0.27 percent.

Occupancy Plan

- This facility will provide new space for new researchers, it is not anticipated that space will be released.

Capital Project Information Summary

University: The University of Arizona
Project Name: Applied Research Building

Project Description / Location:
This project will create a new applied research facility and will be located adjacent to the Aerospace & Mechanical Engineering Building lot north of Speedway Blvd.

	FY 2019 Capital Development Plan	FY 2020 Capital Development Plan (Revised)
Planning	Winter 2018	Winter 2018
Design	Spring 2019	Spring 2019
Construction	Summer 2020	Fall 2020
Occupancy	Fall 2021	Spring 2022
Total Project Cost	$ 50,000,000	$ 101,000,000
Total Project Cost per GSF (excluding utility augmentation)	$ 833	$ 997
Direct Construction Cost (excluding utility augmentation)	$ 35,500,000	$ 60,000,000
Construction Cost per GSF	$ 592	$ 703
Change in Annual Oper. / Maint. Cost		
Utilities	$ 208,400	$ 281,900
Personnel	$ 207,500	$ 285,300
Other	$ 102,500	$ 140,700
Capital:		
• System Revenue Bonds (Debt service paid by State Appropriations and Arizona Other Local Matching Funds)	$ 50,000,000	$101,000,000
Operation/Maintenance:		
• Indirect Cost Recovery	$ 518,400	$707,900

EXECUTIVE SUMMARY

Capital Project Budget Summary

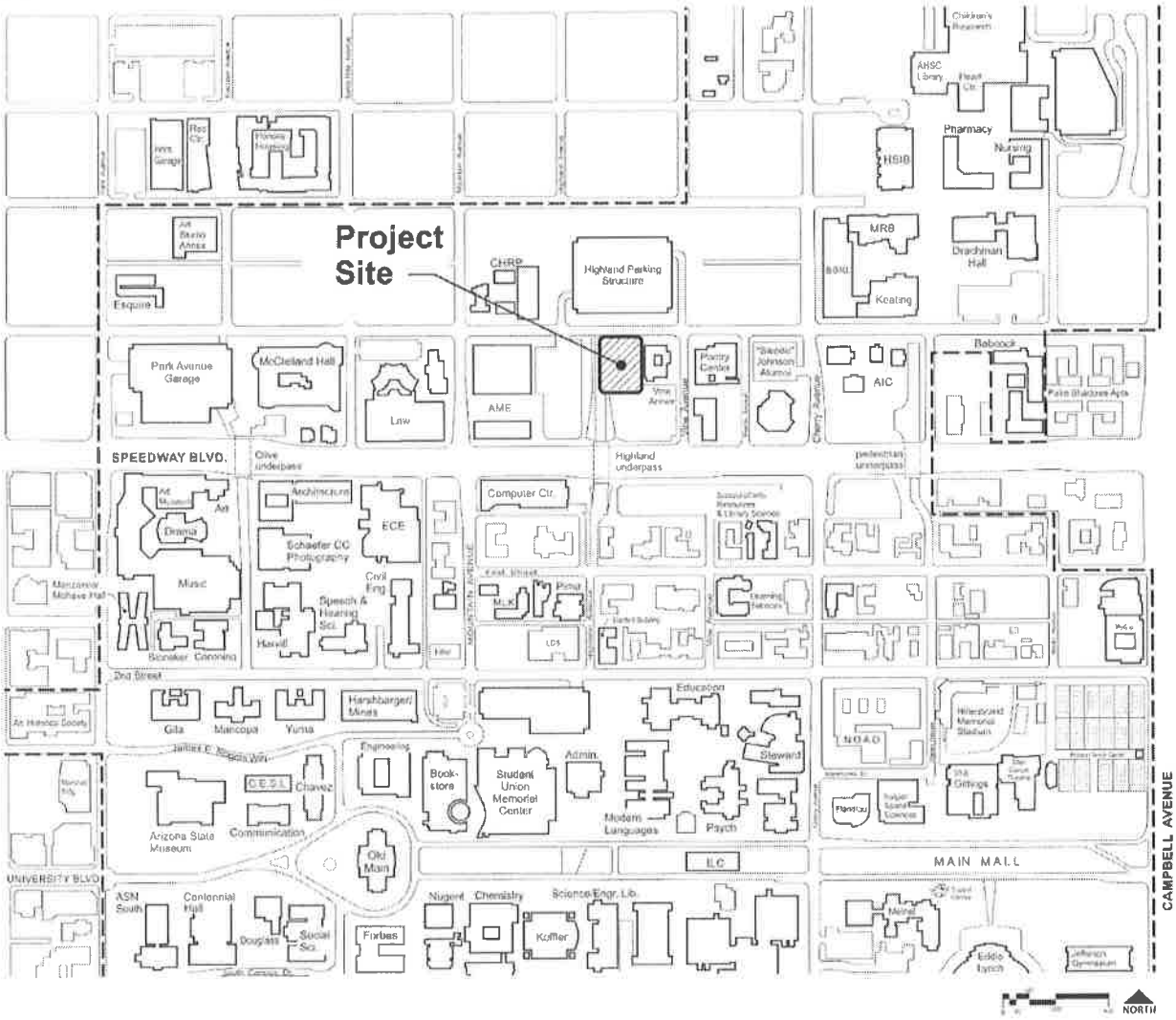
University: The University of Arizona
Project Name: Applied Research Building

Date of Budget Estimate	FY 2019 Capital Development Plan November 2018	FY 2020 Capital Development Plan (Revised) November 2019
1. Infrastructure Augmentation (previously included in a separate stand-alone infrastructure project.)	$ 0	$ 16,000,000
2. Construction Cost		
A. New Construction	$ 34,300,000	$ 53,600,000
B. Renovation	$ 0	$ 0
C. Fixed Equipment	$ 700,000	$ 700,000
D. Site Development (exclude 2.E.)	$ 100,000	$ 3,000,000
E. Parking & Landscaping	$ 200,000	$ 2,000,000
F. Utilities Extensions	$ 200,000	$ 700,000
G. Other (asbestos only)	$ 0	$ 0
Subtotal Construction Cost	**$ 35,500,000**	**$ 60,000,000**
3. Consultant Fees		
A. Construction Manager	$ 800,000	$ 900,000
B. Architect/Engineering Fees	$ 3,600,000	$ 7,000,000
C. Other (Programming, Special Conslt.)	$ 400,000	$ 600,000
Subtotal Consultant Fees	**$ 4,800,000**	**$ 8,500,000**
4. Furniture Fixtures and Equipment	$ 2,200,000	$ 3,500,000
5. Contingency, Design Phase	$ 1,800,000	$ 3,000,000
6. Contingency, Construction Phase	$ 1,800,000	$ 3,000,000
7. Parking Reserve	$ 900,000	$ 1,600,000
8. Telecommunications Equipment	$ 800,000	$ 1,600,000
Subtotal Items 4-8	**$ 7,500,000**	**12,700,000**
9. Additional University Costs		
A. Surveys and Tests	$ 250,000	$ 750,000
B. Move-in Costs	$ 100,000	$ 500,000
C. Public Art	$ 0	$ 0
D. Printing/Advertisement	$ 10,000	$ 50,000
E. Univ. Facilities & Project Mgmnt.	$ 1,540,000	$ 2,050,000
F. State Risk Mgt. Ins	$ 300,000	$ 450,000
Subtotal Additional University Costs	**$ 2,200,000**	**$ 3,800,000**
TOTAL CAPITAL COST	**$ 50,000,000**	**$ 101,000,000**

EXECUTIVE SUMMARY

Project Site Map

Applied Research Building



2B

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Morgan Dorcheus, Senior Fiscal Analyst

SUBJECT: University of Arizona - Review of Deferred Maintenance Project

Request

A.R.S. § 15-1671 requires Committee review of any non-debt financed university capital projects paid for with funds from the university's Capital Infrastructure Fund (CIF). These monies are from the $1 billion capital investment program enacted in 2017. The University of Arizona (UA) requests Committee review of its plan to use $600,000 in cash from CIF to pay for deferred maintenance projects on its main campus.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following standard university financing provisions:

Standard University Financing Provisions

A. A favorable review by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for operations and maintenance costs when the project is complete.

B. On or before October 15 of each year until completion of the project, UA shall report to the JLBC Staff on the status and expenditures of the Deferred Maintenance project. The report shall include the project expenditures to date by type of building system, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.

(Continued)

Key Points

1) UA plans to upgrade fire alarm and sprinkler systems on its Main Campus.
2) The project will be funded with $600,000 in cash from the university's Capital Infrastructure Fund ($1 billion capital investment program).
3) Of this amount, $450,000 will replace fire alarm systems in the Art Building and $150,000 will be used for other fire equipment upgrades across campus.

Analysis

UA intends to upgrade fire alarm and sprinkler systems in multiple buildings throughout its main campus, including the Art Building. The university reports that these systems are over 50 years old and require replacement to meet safety code compliance. The upgrades are planned to begin in January 2021 and will be completed in June 2021.

Financing

UA plans to use $600,000 in cash from the Capital Infrastructure Fund (CIF), which receives state General Fund appropriations for university capital projects. Of this amount, $450,000 will be for fire alarm upgrades in the Art Building and $150,000 will be used for other fire equipment upgrades in buildings across campus. The project will be completed by contractors included in the university's sole source agreement.

University Capital Infrastructure Funds (2017 Bonding Package)

Laws 2017, Chapter 328 established A.R.S. § 15-1671, which provides General Fund appropriations from FY 2019 - FY 2043 for new university research facilities, building renewal, or other capital construction projects. The law appropriates $27.0 million to the universities in FY 2019 and increases the appropriation each year thereafter by 2.0% or the rate of inflation, whichever is less. The FY 2021 appropriations are allocated to each university as follows:

- ASU: $12,381,200
- NAU: $4,692,900
- UA: $10,953,200
- **Total: $28,027,300**

The universities may use these monies for debt service on infrastructure long-term financing and for cash construction costs. New debt issued under this program may not exceed $1.0 billion.

Under the law, each university's General Fund appropriation is deposited into a newly-created Capital Infrastructure Fund (CIF). Each university must match any General Fund contributions to its fund that are used for debt service payments at a 1:1 rate. The $1.0 billion of new projects would thus be funded half by state appropriations and half from university resources.

Debt service payments made on CIF-funded projects are included in the universities' statutory debt limit. Any cash-based capital projects funded with CIF monies must be reviewed by the Joint Committee on Capital Review, and any debt-financed projects funded with CIF monies must be approved by the Committee.

(Continued)

UA has previously received Committee review/approval for 3 CIF-funded projects totaling $18.0 million in bonds issued and $21.0 million in cash expenditures. The December 16, 2020 Committee meeting includes a total of 4 additional CIF projects that will increase bond issuances under the program by $225.7 million and increase cash expenditures by $16.9 million.

Operations and Maintenance Costs

UA expects no change to annual operations and maintenance costs.

MD:kp

BUSINESS AFFAIRS
Administration Building Room 712
PO Box 210066
Tucson, AZ 85721-0066

Ofc: 520-621-5977
Fax: 520-621-7714

November 25, 2020

The Honorable Regina Cobb
Chairman, Joint Committee on Capital Review
House of Representatives
1700 West Washington St.
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with A.R.S. 15-1671, the Arizona Board of Regents request the proposed deferred maintenance project for the University of Arizona (UA) be placed on the next Joint Committee on Capital Review agenda.

The total cost of the deferred maintenance project is $600,000. UA plans to use state appropriations from the Capital Infrastructure Fund (CIF) to fund the project. The total $600,000 will be used in FY21. UA will use all cash to fund the project, no debt will be issued to finance any component.

Project Summary

This deferred maintenance project consists of fire alarm and sprinkler code upgrades in the Art Building and as well as several locations throughout campus. All systems receiving upgrades have reached the end of their useful life and require improvements to meet safety code compliance. Although routine maintenance has regularly been provided on the systems, they are over 50 years old and the lifespan for fire alarm alarms is 25 years and the lifespan for sprinkler systems is 40 years. The Art Building is currently occupied; however, relocation of employees or students is not necessary because the upgrades will be completed during off-hours. Due to the low cost of the project no portion of the project will be subject to subcontractor bid. This project will be utilizing our sole source agreement with two contractors for continuity of operational systems.

Art Building Fire Alarms Upgrades	$450,000
Fire equipment upgrades throughout campus	$150,000
TOTAL:	$600,000

The project maintenance will begin January 1, 2021 and end June 30, 2021.

THE UNIVERSITY OF ARIZONA
Business Affairs

Sincerely,

Lisa N Rulney

Lisa N. Rulney
Sr. VP for Business Affairs and Chief Financial Officer

cc: John Arnold, Executive Director, ABOR
Dr. Betsy Cantwell, SVP-Research and Innovation UArizona
Morgan Dorcheus, JLBC Analyst
Dr. Robert C. Robbins, President UArizona
Richard Stavneak, Director, JLBC
Steve Voeller, VP-Government & Community Relations UArizona

2C

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Morgan Dorcheus, Senior Fiscal Analyst

SUBJECT: University of Arizona - Consider Approval of Chemistry Building Renovation Financing Project

Request

A.R.S. § 15-1671 requires Committee approval of any debt financed university capital projects paid for with funds from the university's Capital Infrastructure Fund (CIF). These monies are from the $1 billion capital investment program enacted in 2017. The University of Arizona (UA) requests Committee approval of $42,000,000 in bond issuances to renovate the Chemistry Building.

Committee Options

The Committee has at least the following 2 options:

1. Approval of the request.

2. Disapproval of the request.

Under either option, the Committee may also consider the following standard university financing provisions:

Standard University Financing Provisions

A. An approval by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for operations and maintenance costs when the project is complete.

B. UA shall provide the final debt service schedule and interest rate for the project as soon as they are available.

(Continued)

C. On or before October 15 of each year until completion of the project, UA shall report to the JLBC Staff on the status and expenditures of the Chemistry Building Renovation project. The report shall include the project expenditures to date, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.

Key Points

1) UA plans to renovate its Chemistry Building.
2) The project will address office and administrative space for the Office of General Education and Department of Chemistry and Biochemistry and add new classroom and laboratory spaces.
3) UA will issue $42.0 million of system revenue bonds.
4) Half of the $2.5 million in annual debt service will be funded by tuition and half will be funded by General Fund appropriations from the $1 billion capital investment program.

Analysis

UA intends to renovate its 76,000 square foot Chemistry Building on University Boulevard near the Old Main building. The building was constructed in phases in 1936, 1948, and 1962 and has significant life safety and building code issues. Approximately 54,000 square feet of the building will be renovated to address code compliance issues and create additional office space for the Office of General Education and the Department of Chemistry and Biochemistry. The remainder of the building will be demolished and a new 23,300 square foot addition will be constructed to create larger classroom spaces and add new computational research labs. Approximately two-thirds of the building will be used for instructional space and one-third of the building will be used for office and administrative space.

UA plans to begin complete renovation of the building by December 2022. The building renovation is estimated to cost a total of $42.0 million, of which $21.0 million will be funded by tuition revenues and $21.0 million will be fund by CIF.

Financing

UA intends to issue $42.0 million in system revenue bonds with an anticipated rating of Aa2 (Moody's)/AA- (S&P) and an interest rate of 2.50% over a 22-year term. UA will fund half the debt service with tuition and half with General Fund appropriations from CIF. The university has not yet determined issuance dates.

UA will make a debt service payment of $2.5 million from FY 2022 – FY 2043. Of the $55.1 million of cumulative debt service payments (principal and interest), $27.5 million will be paid from tuition and $27.5 million from the General Fund. *(See Table 2 for a summary of the bond financing terms).*

The debt service on this project increases UA's current debt ratio by 0.12%, from 4.90% to 5.02%. Including other UA projects on the agenda, UA's debt ratio would increase to 5.59%.

The universities have also reported on the COVID-19 pandemic's impact on enrollment and tuition revenues. From fall 2019 to fall 2020, UA's student full-time equivalent (FTE) enrollment increased from 44,659 to 45,453, or 1.8%. After accounting for this enrollment growth and any changes in the mix of students enrolled, UA projects gross tuition revenues in FY 2021 will remain about the same as actual gross tuition revenues in FY 2020, at a level of $912.4 million. After a discretionary allocation of $240.4 million to institutional financial aid, UA projects net tuition collections of $672.0 million in FY 2021. This amount represents a decrease of $(21.8) million, or (3.1)%, in FY 2021 compared to the prior year.

(Continued)

UA'S original FY 2021 tuition estimates were substantially lower than the current estimates. Based on those lower numbers, UA had requested $93.6 million in FY 2021 from the General Fund to offset its costs and revenue losses associated with the pandemic. Of this amount, $21.5 million would offset costs of testing, contact tracing, technology infrastructure, Personal Protective Equipment, and health safety procedures and $72.1 million would offset revenue losses for non-resident students and various auxiliary revenues (such as housing and athletic program revenue).

University Capital Infrastructure Funds (2017 Bonding Package)

Laws 2017, Chapter 328 established A.R.S. § 15-1671, which provides General Fund appropriations from FY 2019 - FY 2043 for new university research facilities, building renewal, or other capital construction projects. The law appropriates $27.0 million to the universities in FY 2019 and increases the appropriation each year thereafter by 2.0% or the rate of inflation, whichever is less. The FY 2021 appropriations are allocated to each university as follows:

- ASU: $12,381,200
- NAU: $4,692,900
- UA: $10,953,200
- **Total: $28,027,300**

The universities may use these monies for debt service on infrastructure long-term financing and for cash construction costs. New debt issued under this program may not exceed $1.0 billion.

Under the law, each university's General Fund appropriation is deposited into a newly-created Capital Infrastructure Fund (CIF). Each university must match any General Fund contributions to its fund that are used for debt service payments at a 1:1 rate. The $1.0 billion of new projects would thus be funded half by state appropriations and half from university resources.

Debt service payments made on CIF-funded projects are included in the universities' statutory debt limit. Any cash-based capital projects funded with CIF monies must be reviewed by the Joint Committee on Capital Review, and any debt-financed projects funded with CIF monies must be approved by the Committee.

UA has previously received Committee review/approval for 3 CIF-funded projects totaling $18.0 million in bonds issued and $21.0 million in cash expenditures. The December 16, 2020 Committee meeting includes a total of 4 additional CIF projects that will increase bond issuances under the program by $225.7 million and increase cash expenditures by $16.9 million.

Construction Costs

Of the $42.0 million total project cost, direct construction costs (excluding items such as design and project management costs) are $30.9 million. As shown in *Table 1*, total project costs per square foot are $553, while direct construction costs per square foot are $407.

The most recent UA building renovation project reviewed by the committee was in September 2017. The project consisted of renovating 59,914 square feet of space in the UA School of Animal and Comparative Science Building 90. The project cost a total of $18.0 million, or $300 per square foot. Higher construction costs for the current project may be due to the proposal also including a new construction component for the new addition to the Chemistry Building.

(Continued)

UA states that construction will begin in July 2021 and that the Design-Build (D-B) contractor will complete the project under the guaranteed maximum price arrangement with UA by December 2022.

Operations and Maintenance Costs

UA expects no change to annual operations and maintenance costs.

Table 1

Chemistry Building Renovation

Total Square Footage	76,000	
Funding		
System Revenue Bonds 1/	$42,000,000	
Costs		
Direct Construction Costs	$30,900,000	($407 per sq. ft.)
Other Costs 2/	11,100,000	($146 per sq. ft.)
Total	**$42,000,000**	**($553 per sq. ft.)**
Operations & Maintenance	$0	

1/ Annual debt service payments on $42.0 million principal are based on a 2.50% interest rate for a total debt service cost of $55.1 million. Debt service will be paid by tuition revenues and CIF monies (50% General Fund, 50% tuition).

2/ Includes equipment, furniture, project design and management fees, and other costs.

Table 2

Chemistry Building Renovation Financing Terms

Construction Timeframe	July 2021 – December 2022
Issuance Amount	$42.0 million
Issuance Date	To Be Determined
Issuance Transaction Fees	$279,000
Rating	Aa2 (Moody's)/AA- (S&P)
Interest Rate	2.50%
Term	22 years
Total Debt Service Costs	$55.1 million
Debt Service Payments	$2.5 million
Payment Source	$27.5 million General Fund (CIF) $27.5 million tuition (CIF)
Debt Ratio Increase	0.12%

MD:kp

BUSINESS AFFAIRS
Administration Building Room 712
PO Box 210066
Tucson, AZ 85721-0066

Ofc: 520-621-5977
Fax: 520-621-7714

November 25, 2020

The Honorable Regina Cobb
Chairman, Joint Committee on Capital Review
House of Representatives
1700 West Washington St.
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with A.R.S. 15-1671 and A.R.S. 41-1252, the Arizona Board of Regents request the Chemistry Building project for the University of Arizona (UA) be placed on the next Joint Committee on Capital Review agenda.

The Chemistry Building project will consist of both renovations and new construction which will provide students access to hand-on labs and collaborative classroom space. The project total cost is $42 million, all of which will be financed through $42 million of System Revenue Bonds (SRBs) issued by the UA. The UA plans to use state appropriations from the Capital Infrastructure Fund (CIF) to pay for half of the debt service and retained tuition matching funds to pay the other half. The estimated annual debt service for the project is $2.5 million, increasing the UA's annual debt service ratio by 0.12%.

Project Summary

The Chemistry Building is located in the heart of campus and is designed to serve as an innovative teaching hub that utilizes evidence-based instructional strategies. Approximately two-thirds of the building will be used for collaborative learning spaces, which includes hands-on undergraduate labs. The remaining portion will be used for office space. The project cost and use of space was taken into consideration to determine the project should be a combination of renovation and new construction. The existing historic building presents limitations in creating large classrooms due to the location of structural elements.

Renovations Summary

The Chemistry building was originally constructed in 1936, a second phase was added in 1948, and a third phase added in 1962. The 1962 addition will be demolished for new construction. The renovation portion of the project is approximately 54,000 gross square feet (gsf) and will cost $17.5 million. The renovations will address severe deferred maintenance needs, life safety issues, accessibility, building code upgrades, and sustainability.

Office space for the Office of General Education (OGE) and the Department of Chemistry & Biochemistry will be housed in this space along with smaller general education classrooms. The facility will be vacated for the duration of construction, with the exception of the attached wing that serves as the chemical storage "bunker".

The OGE oversees the university-wide general education program which provides foundational knowledge and skills in support of undergraduate degree programs. OGE will provide support and advising services in the renovated Chemistry Building.

The Department of Chemistry & Biochemistry (CBC) is a university-wide department with faculty and staff from both the College of Science and the College of Medicine. CBC provides opportunities for faculty and students who are pursuing education and research goals across a range of subdisciplines in the areas of biochemistry and chemistry. The space will house faculty and staff who support the 10 undergraduate and graduate degrees offered through CBC.

New Build

The new building will be 23,300 GSF. It will be connected to the south end of the existing Chemistry Building and will consist of 3 floors. This addition will accommodate the next generation classrooms that provide students with hands-on collaborative learning. Research continues to demonstrate that the physical layout of the classroom greatly impacts student engagement. There will be 6 collaborative classrooms located in the Chemistry Building which will serve up to 930 students every class period. Three computational research labs will be located in the building. These labs will allow undergraduate and graduate students to apply the concepts of chemistry they learn in the classroom. These concepts include the study of enzymes, the molecular control animators that cause cardiac tissue to contract and relax, and proton transfer in bio based ionic liquids for use in new battery technologies.

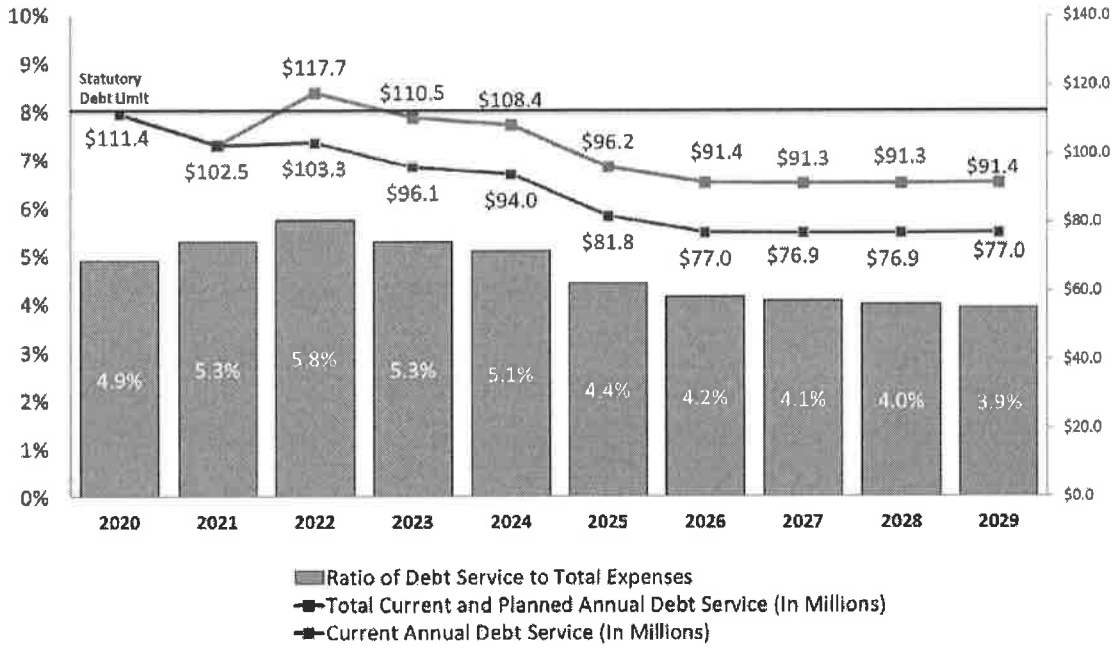
The Chemistry Building project will begin in July 2021 and is scheduled to be complete December 2022.

Estimated Cost Breakdown

$	4,500,000	Pre-construction Costs • Design-Build fees • Pre-construction phase project management
$	30,900,000	Building Construction Costs • Demolition • Renovations and new construction • Construction inspections • Hazardous materials abatement • Telecommunications • Contingency
$	2,100,000	Site/Utilities Construction Costs • Development of exterior area connecting building components • Site utilities and infrastructure
$	4,500,000	Indirect Costs • Furniture, Fixtures and Equipment • Testing and Inspections • State Risk Management Insurance • Construction phase project management
$	42,000,000	TOTAL

Bond and Finance Summary

The UA intends to finance the entire $42 million project through issuing SRBs. The UA will fund half of the anticipated $2.5 million annual debt service with state appropriated CIF dollars and half with retained tuition dollars. This is based on a 22-year maturity rate and anticipated interest rate of 2.50%.



The SRBs are expected to increase the UA's annual debt ration by 0.12%, however previous debt issued by the UA will be expiring in the next few years allowing the university to absorb the newly issued debt for this project without significant impact to the university's statutory debt ratio as seen below:

Below is a cost comparison breakdown of both the anticipated renovations and new build portion of the Chemistry Building project.

Renovation

Project	Project Size	Construction Cost	Total Project Cost	Const. Cost/sf	Project Cost/sf	Year compl.	Escal. Const. Cost/sf	Escal. Proj. Cost/sf	Const. start	JCCR Report Construction Cost	JCCR Submittal Date
UA - Chemistry Bldg Renovation	53,655	$ 17,500,000	$ 26,250,000	$326	$489	2023	$326	$489	07/2021		
UA - Old Main Renovations	26,786	$ 10,283,000	$ 14,066,681	$384	$525	2014	$624	$853	2013	N/A	gift funded- N/A
UA - Bear Down Gym	60,000	$ 15,000,000	$ 21,500,000	$250	$358	2021	$272	$388	2020	$ 13,300,000	12/18
UA - Student Rec Remodel	8,000	$ 4,000,000	$ 4,945,000	$500	$618	2017	$651	$805	2017	N/A	N/A
UA - Building 201 Remodel	37,172	$ 8,300,000	$ 14,500,000	$223	$390	2018	$291	$508	2018	N/A	land sale funds- N/A
UA - Arizona Stadium	86,815	$ 21,000,000	$ 25,463,000	$242	$293	2018	$286	$347	2018	$ 18,970,000	12/17
ASU - Hayden Library	240,000	$ 63,000,000	$ 90,000,000	$263	$375	2019	$334	$476	2018		12/17

New Construction

Project	Project Size	Construction Cost	Total Project Cost	Const. Cost/sf	Project Cost/sf	Year compl.	Escal. Const. Cost/sf	Escal. Proj.Cost/ sf	const start year	JCCR Report Construction Cost	JCCR Submittal Date
UA - Chemistry Bldg Renovation	23,300	$ 10,750,000	$ 15,750,000	$461	$676	2023	$461	$676	07/2021		
UA - Bartlett Academic Success Ctr.	59,750	$ 29,500,000	$ 42,000,000	$494	$703	2020	$558	$794	2019		
UA - ICA Academic Center	17,587	$ 5,790,000	$ 7,550,000	$329	$429	2016	$440	$574	2016	N/A	N/A
UA - Family and Consumer Sciences	71,383	$ 17,780,000	$ 22,000,000	$249	$308	2008	$328	$405	2007	N/A	gift funded- N/A
UA - HSIB	247,155	$ 131,000,000	$ 165,000,000	$530	$668	2018	$691	$871	2016	$116,000,000	06/16
ASU - Student Pavilion	73,894	$ 27,600,000	$ 36,500,000	$374	$494	2017	$499	$660	2016		12/15
ASU - Greek Leadership Village Community Center	30,000	$ 10,500,000	$ 14,000,000	$350	$467	2018	$448	$597	2017		N/A

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Project Submission
Chemistry Renovation

Summary of Financing Information:

System Revenue Bond Tax Exempt Issuance Amount:	$42,000,000
Estimated Cost of Issuance:	$ 279,000
Estimated Interest Rate:	2.50%
Payment Term:	Approximately 22 years
Fund Source for **Total** Debt Payment:	State Appropriations & Retained Tuition

Total Annual Debt Service (by fund source):

Principal & Int. FY22-FY43 (Ave.) $2,500,000	State Appropriations & Retained Tuition

Total Debt Service Through Maturity: $55,117,000

Anticipated Date of Issuance:	Still To Be Determined
Expected bond rating SRB:	AA- (S & P) Aa2 (Moody's)

Debt Ratio Information:

Current Projected Debt Ratio:	4.90%
Increment Debt Ratio:	0.12%
Projected Highest Debt Ratio:	5.02%

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Chemistry Renovation
Tax Exempt System Revenue Bonds
Amortization Schedule: 2.50%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	1,455,000	1,050,000	2,505,000
6/1/2023	1,490,000	1,013,625	2,503,625
6/1/2024	1,530,000	976,375	2,506,375
6/1/2025	1,565,000	938,125	2,503,125
6/1/2026	1,605,000	899,000	2,504,000
6/1/2027	1,645,000	858,875	2,503,875
6/1/2028	1,685,000	817,750	2,502,750
6/1/2029	1,730,000	775,625	2,505,625
6/1/2030	1,775,000	732,375	2,507,375
6/1/2031	1,815,000	688,000	2,503,000
6/1/2032	1,865,000	642,625	2,507,625
6/1/2033	1,910,000	596,000	2,506,000
6/1/2034	1,955,000	548,250	2,503,250
6/1/2035	2,005,000	499,375	2,504,375
6/1/2036	2,055,000	449,250	2,504,250
6/1/2037	2,105,000	397,875	2,502,875
6/1/2038	2,160,000	345,250	2,505,250
6/1/2039	2,215,000	291,250	2,506,250
6/1/2040	2,270,000	235,875	2,505,875
6/1/2041	2,325,000	179,125	2,504,125
6/1/2042	2,385,000	121,000	2,506,000
6/1/2043	2,455,000	61,375	2,516,375
	42,000,000	**13,117,000**	**55,117,000**

Sincerely,

Lisa N. Rulney
Sr. VP for Business Affairs and Chief Financial Officer

cc: John Arnold, Executive Director, ABOR
Dr. Betsy Cantwell, SVP-Research and Innovation UArizona
Morgan Dorcheus, JLBC Analyst
Dr. Robert C. Robbins, President UArizona
Richard Stavneak, Director, JLBC
Steve Voeller, VP-Government & Community Relations UArizona

Arizona Board of Regents
The University of Arizona
FY 2020 Capital Development Plan (CDP)
Project Justification Report

Chemistry Building Renovation

Previous Board Action

- Capital Improvement Plan FY 2021-2023 September 2019

Statutory/Policy Requirements

- Pursuant to Arizona Board of Regents Policy Chapter 7-102 (B)(1), all capital projects with an estimated total project cost of $10,000,000 or more, including information technology and third-party projects, shall be included in the Capital Development Plan.

Project Justification, Description, and Scope

- This project is a component of Pillar 1 under the University of Arizona Strategic Plan, Wildcat Journey – preparing students with the skills and mindset to lead the 4th Industrial Revolution. Active and collaborative learning strategies result in increased student learning, engagement, and development of workplace-relevant skills. Although many evidence-based teaching strategies can be implemented in any physical setting, there is no doubt that the physical layout of the classroom can impact student engagement and the use of instructional strategies. To build on Arizona's commitment to provide deep and meaningful learning experiences, this initiative involves a high-visibility renovation of the centrally located, historic Chemistry building into an innovative-teaching hub. In addition, this initiative provides support to continue the important work of renovating existing centrally scheduled, informal, and departmentally-owned learning spaces to expand the options for using evidence-based instructional strategies.

  The project will also incorporate much needed and overdue life-cycle renovations and deferred maintenance. The existing building was constructed in 1936 (first phase) and 1948 (second phase), with another addition in 1962.

- The scope includes the following primary elements:
  - Per Strategic Plan Pillar 1: renovate the historic Chemistry building into an innovative-teaching hub (collaborative learning spaces in two-thirds of the building, tentatively 1st & 2nd floors)
  - Office space for Office of General Education and Department of Chemistry & Biochemistry (CBC)
  - Remaining core chemistry functions: central receiving (also serves adjoining buildings), chemical storage "bunker", NMRs & shops (to be relocated either within Chemistry or to neighboring building).

- Renovations to address deferred maintenance, life safety, accessibility, building code upgrades, and sustainability

This project encompasses 76,000 Gross Square Feet (GSF), which includes approximately 51,000 Net Assignable Square Feet (NASF).

Project Delivery Method and Process

- This project is being delivered through a Design-Build (D-B) delivery method. This approach was selected for this project because it can provide early cost control and save time through project scheduling, while providing contractor constructability and design input and coordination throughout the project, improving potentially adversarial project environments and still allowing for the selection of the most qualified architect-contractor team for this project.

- The Design-Builder provides a Guaranteed Maximum Price (GMP) based on the amount previously agreed upon in the Design-Build agreement. In the selection of major subcontractors, the Design-Builder uses a qualification-based selection process prescribed by the ABOR Procurement Code to allow major subcontractors a design-assist role during the design phase. All remaining subcontractor work is awarded on the basis of the lowest responsive and responsible subcontractor bids. For this work, a minimum of three subcontractor bids will be required, except for specialty items or instances where proprietary systems are required.

- The Design-Build Team was selected through the appropriate project search committee process prescribed by the ABOR Procurement Code. A licensed contractor was included on the search committee as required by ABOR Policy.

Project Status and Schedule

- Programming is underway. This project is scheduled to commence design during fall of 2019.

- Project construction is scheduled to commence during fall of 2020 and will be completed during spring of 2022.

Project Cost

- The total project budget is $42 million, with a construction cost of $28 million.

- The construction budget for this project was developed by in-house University professionals using cost data from industry-standard cost databases and from completed comparable projects.

Fiscal Impact and Financing Plan

- The University plans to issue $42 million of System Revenue Bonds (SRBs) to fund the Chemistry Building Renovation. The annual debt service payments on the SRBs is estimated to be $2.5 million. For $18 million of the debt financing, Arizona plans to use state appropriations tied to the Capital Infrastructure Fund established in ARS 15-1671 to pay for half of the debt service and retained tuition matching funds to pay the other half. The remaining $24 million of debt financing will be funded with retained tuition.

- The operations and maintenance (O&M) cost for the space effected is already included in Arizona's current budget.

Debt Ratio Impact:

- The estimated annual debt service of $2.5 million on this project would increase Arizona's debt ratio by 0.07 percent.

Occupancy Plan

- It is anticipated that the existing facility will be vacated for the duration of the construction, with the exception of the attached wing that serves as the chemical storage "bunker" and the receiving for several adjoining building. The Chemistry Labs and NMRs that had not previously been relocated from the building are being considered for permanent relocation to either other facilities on campus or consolidated to one area within Chemistry at the start of the renovations

- This facility renovation will provide additional general education classrooms as well as office space for faculty. It is not anticipated that any existing space will be released, or that any existing facilities will be demolished.

Capital Project Information Summary

University: The University of Arizona
Project Name: Chemistry Building Renovation

Project Description / Location:
This project will renovate the historic Chemistry Building into an innovative teaching hub that supports evidence-based teaching strategies (collaboration, inclusive practices, and active learning) and will be located at 1306 E University Blvd, on the Campus of the University of Arizona in Tucson.

	FY2020 Capital Development Plan November 2019
Project Schedule (Beginning Month/Year):	
Planning	Spring 2019
Design	Fall 2019
Construction	Fall 2020
Occupancy	Spring 2022
Project Budget:	
Total Project Cost	$ 42,000,000
Total Project Cost per GSF	$ 550
Direct Construction Cost - Renovation	$ 28,000,000
Construction Cost per GSF - Renovation	$ 370
Change in Annual Oper./Maint. Cost	$0
Utilities	
Personnel	
Other	
Funding Sources:	
Capital:	
• State Appropriation	$ 9,000,000
• Retained Tuition	$ 33,000,000
Operation/Maintenance:	$0

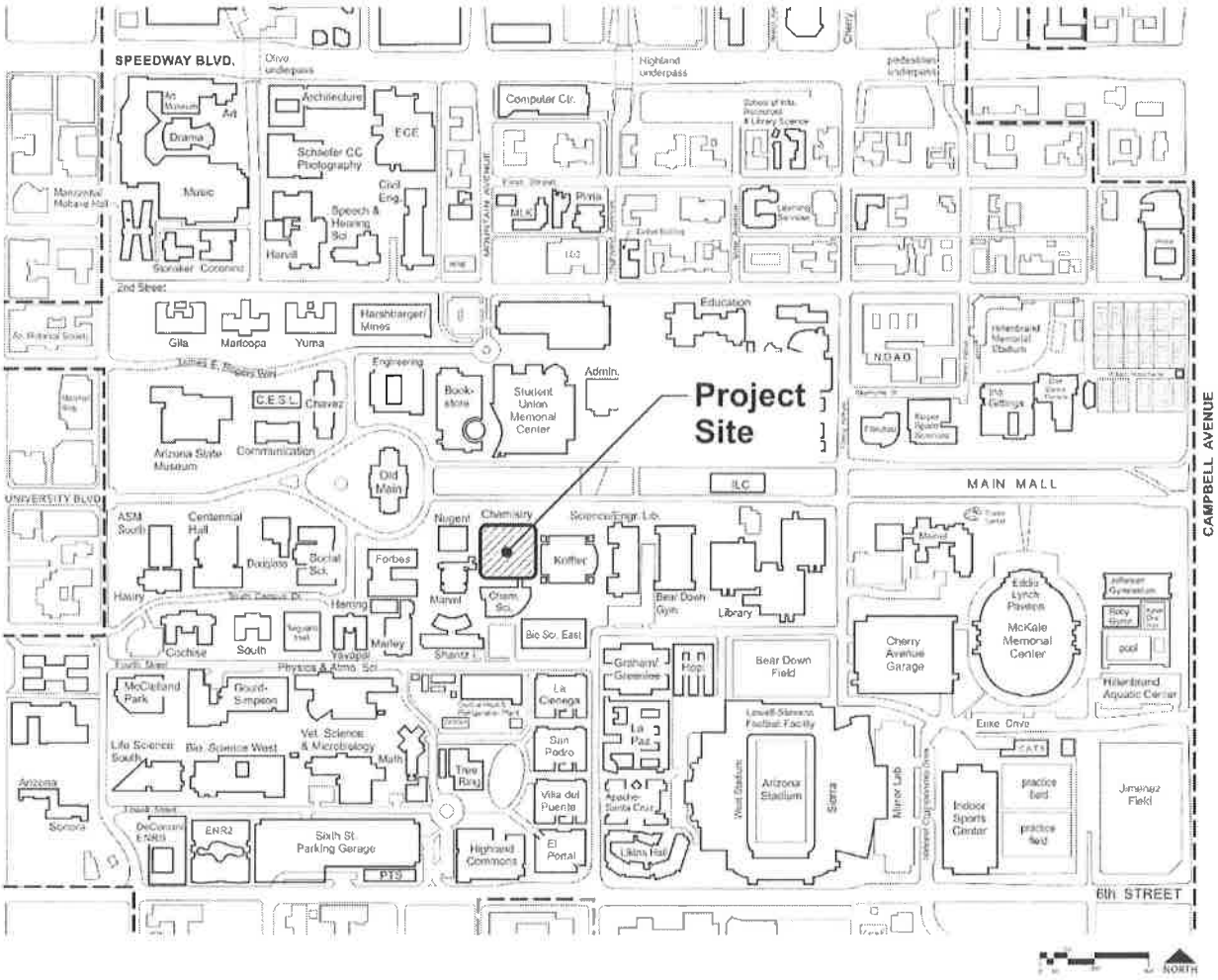
Capital Project Budget Summary

University: The University of Arizona
Project Name: Chemistry Building Renovation

Date of Budget Estimate	FY 2020 Capital Development Plan November 2019
1. Land	$ 0
2. Construction Cost	
A. New Construction	$ 0
B. Renovation	$ 27,500,000
C. Fixed Equipment	$ 250,000
D. Site Development (exclude 2.E.)	$ 0
E. Parking & Landscaping	$ 0
F. Utilities Extensions	$ 0
G. Other (asbestos only)	$ 250,000
Subtotal Construction Cost	**$ 28,000,000**
3. Consultant Fees	
A. Construction Manager	$ 400,000
B. Architect/Engineering Fees	$ 3,550,000
C. Other (Programming, Special Conslt.)	$ 250,000
Subtotal Consultant Fees	**$ 4,200,000**
4. Furniture Fixtures and Equipment	$ 4,450,000
5. Contingency, Design Phase	$ 1,400,000
6. Contingency, Construction Phase	$ 1,400,000
7. Parking Reserve	$ 0
8. Telecommunications Equipment	$ 800,000
Subtotal Items 4-8	**$ 8,050,000**
9. Additional University Costs	
A. Surveys and Tests	$ 150,000
B. Move-in Costs	$ 200,000
C. Public Art	$ 0
D. Printing/Advertisement	$ 5,000
E. Univ. Facilities & Project Mgmnt.	$ 1,190,000
F. State Risk Mgt. Ins	$ 205,000
Subtotal Additional University Costs	**$ 1,750,000**
TOTAL CAPITAL COST	**$ 42,000,000**

Project Site Map

Chemistry Building Renovation



STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Morgan Dorcheus, Senior Fiscal Analyst

SUBJECT: University of Arizona - Review of Facilities Management Building Project

Request

A.R.S. § 15-1683 requires Committee review of any university projects financed with system revenue bonds. The University of Arizona (UA) requests Committee review of $15,500,000 in system revenue bond issuances to fund construction of new Facilities Management facility. In addition to system revenue bonds, UA will fund construction with $8,500,000 in land sale proceeds, for a total project cost of $24,000,000.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following standard university financing provisions:

Standard University Financing Provisions

A. A favorable review by the Committee does not constitute endorsement of General Fund appropriations to offset any revenues that may be required for debt service or any operations and maintenance costs when the project is complete.

B. UA shall provide the final debt service schedule and interest rate for the project as soon as they are available.

(Continued)

C. On or before October 15 of each year until completion of the project, UA shall report to the JLBC Staff on the status and expenditures of the Facilities Management Relocation and Consolidation Facility project. The report shall include the project expenditures to date, any changes to the planned construction timeline, the expected completion date, and any change to the scope of the project.

Key Points

1) UA plans to construct a 70,000 square foot Facilities Management Building.
2) The project will relocate and consolidate facilities management functions from across the university's main campus.
3) UA will issue $15.5 million of system revenue bonds, paying annual debt service costs of approximately $842,000 with tuition revenues.
4) The remaining $8.5 million cost will be funded by land sale proceeds.

Analysis

UA intends to construct a new 70,000 square foot, multi-story Facilities Management building that will consolidate all of the university's facility management operations. UA reports that the site currently occupied by its administrative, warehouse, and shops functions for facilities operations has been sold to Tucson Electrical Power to establish a 138kv electrical substation that will provide UA's main campus with more reliable power. The new facility will include space to relocate staff currently housed on the sold land and will consolidate staff from 20 other facilities management locations across UA's main campus. UA reports that many of the abandoned locations are modified residential structures and will be demolished for future site development.

UA plans to fund the project with $15.5 million in system revenue bonds and $8.5 million in land sale proceeds from selling the current facility management location to Tucson Electric Power. Construction of the Facilities Management building will begin in January 2021 and be completed in March 2022.

Financing

UA intends to issue $15.5 million in system revenue bonds in spring 2021. UA anticipates a rating of Aa2 (Moody's)/AA- (S&P) and an interest rate of 2.5% over a 25-year term. In addition to project costs, issuance costs are projected to be $103,000. The annual debt service will be approximately $842,000 and will be funded with tuition revenues.

The debt service on this project increases UA's current debt ratio by 0.04%, from 4.90% to 4.94%. Including other UA projects on the agenda, the debt ratio would increase to 5.59%.

The universities have also reported on the COVID-19 pandemic's impact on enrollment and tuition revenues. From fall 2019 to fall 2020, UA's student full-time equivalent (FTE) enrollment increased from 44,659 to 45,453, or 1.8%. After accounting for this enrollment growth and any changes in the mix of students enrolled, UA projects gross tuition revenues in FY 2021 will remain about the same as actual gross tuition revenues in FY 2020, at a level of $912.4 million. After a discretionary allocation of $240.4 million to institutional financial aid, UA projects net tuition collections of $672.0 million in FY 2021. This amount represents a decrease of $(21.8) million, or (3.1)%, in FY 2021 compared to the prior year.

(Continued)

UA'S original FY 2021 tuition estimates were substantially lower than the current estimates. Based on those lower numbers, UA had requested $93.6 million in FY 2021 from the General Fund to offset its costs and revenue losses associated with the pandemic. Of this amount, $21.5 million would offset costs of testing, contact tracing, technology infrastructure, Personal Protective Equipment, and health safety procedures and $72.1 million would offset revenue losses for non-resident students and various auxiliary revenues (such as housing and athletic program revenue).

Construction Costs

In addition to $15.5 million in system revenue bonds issuances, UA will fund construction with $8.5 million in land sale proceeds. Of the $24.0 million total project cost, direct construction costs (excluding items such as design and project management costs) are $20.3 million. As shown in *Table 1*, total projects costs per square foot are $343, while direct construction costs per square foot are $289.

UA states that construction will begin in January 2021 and the Design-Build (D-B) contractor will complete the project under a guaranteed maximum price arrangement by March 2022.

Operations and Maintenance Costs

UA estimates that annual operation and maintenance costs will increase by $504,200, which will be paid by tuition revenues.

Table 1

Facilities Management Building Construction

Total Square Footage	70,000	
Funding		
System Revenue Bonds 1/	$15,500,000	
Land Sale Proceeds	8,500,000	
Total	**$24,000,000**	
Costs		
Direct Construction Costs	$20,250,000	($289 per sq. ft.)
Other Costs 2/	3,750,000	($54 per sq. ft.)
Total	**$24,000,000**	**($343 per sq. ft.)**
Operations & Maintenance	$504,200	

1/ Annual debt service payments on $15.5 million principal are based on a 2.50% interest rate for a total debt service cost of $21.0 million. Debt service will be paid by tuition revenues.
2/ Includes equipment, furniture, project design and management fees, and other costs.

(Continued)

Table 2

Facilities Management Building Financing Terms

Construction Timeframe	January 2021 – March 2022
Issuance Amount	$15.5 million
Issuance Date	Spring 2021
Issuance Transaction Fees	$103,000
Rating	Aa2 (Moody's)/AA- (S&P)
Interest Rate	2.50%
Term	25 years
Total Debt Costs	$21.0 million
Debt Service Payments	$842,000
Payment Source	Tuition
Debt Ratio Increase	0.04%

MD:kp

BUSINESS AFFAIRS
Administration Building Room 712
PO Box 210066
Tucson, AZ 85721-0066

Ofc: 520-621-5977
Fax: 520-621-7714

November 25, 2020

The Honorable Regina Cobb
Chairman, Joint Committee on Capital Review
House of Representatives
1700 West Washington St.
Phoenix, AZ 85007

Dear Representative Cobb:

In accordance with A.R.S. 15-1683, the Arizona Board of Regents request the Facilities Management (FM) relocation and consolidation facility project for the University of Arizona (UA) be placed on the next Joint Committee on Capital Review agenda.

The total project cost is $24 million, two-thirds of which will be financed through System Revenue Bonds (SRBs) issued by the UA. The University plans to issue $15.5 million of System Revenue Bonds (SRBs) to fund the project. The additional $8.5 million for the project will be funded with land sale proceeds. Annual debt service is estimated at $841,000 based on a 25-year maturity and interest rate of 2.50-2.75%. This will increase the UA's annual debt service ratio by 0.04%.

Project Summary

Facilities Management services are currently scattered across campus throughout 20 locations of which one will be leveled to make room for a new utility-scale 138kv electrical substation. The proposed FM building will serve as the new headquarters for the 665 employees that effectively and efficiently provide maintenance, operational and utilities services to UA's 392-acre campus.

The land being used for the substation was sold to Tucson Electric Power (TEP) and the proceeds will be used to pay for a portion of the new FM building. The 138kv distribution system will serve the UA, Banner Hospital and the Tucson community with more reliable and efficient power while building in needed redundancy. This is the only substation site identified that would meet all distribution system's needs, it is located in the far corner of the UA's northern campus.

The new 70,000 sq ft FM building will be located on the corner of Drachman and Ring Road. In addition to housing administrative offices the new building will include a warehouse (6,760 sq ft) and other FM shops (20,992 sq ft).

Construction on FM building is scheduled to begin January 2021 and end March 2022. TEP's proposed substation construction start date is January 2022.

Below is the estimated cost associated with each major component of the project:

Estimated Cost Breakdown

$ 2,200,000 Pre-construction Costs
- Design-Build fees
- Pre-construction phase project management

$ 20,250,000 Building Construction Costs
- Construction
- Construction inspections
- Telecommunications
- Contingency

$ 590,000 Site/Utilities Construction Costs
- Site utilities and infrastructure

$ 960,000 Indirect Costs
- Furniture, Fixtures and Equipment
- Testing and Inspections
- State Risk Management Insurance
- Construction phase project management

$ 24,000,000 TOTAL

Bond and Finance Summary

The UA plans to pay for the $24 million FM Building with $8.5 million in land sale proceeds and finance the remaining $15.5. million with SRBs. The estimated annual debt service for the SRBs is $841,000 based on a 25-year maturity rate and an interest rate of 2.50 to 2.75%. The debt service will be paid with retained tuition dollars. The annual debt service is expected to increase the university's statutory debt ratio by 0.04%. The university decided to finance roughly two-thirds of this project in order to maintain an appropriate days cash on hand balance which positively impacts the UA's credit rating.

Below is a cost comparison chart of recent UA construction projects.

Project	Construction Cost/GSF	Total Project Cost/GSF
UA - Facilities Maintenance Building	$266	$343
UA - Chemistry Building Addition	$461	$676
UA - Bartlett Academic Success Center	$558	$794
UA - ICA Academic Center	$440	$574

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Project Submission
Facilities Management Relocation and Consolidation Facility

Summary of Financing Information:

System Revenue Bond Tax Exempt Issuance Amount:	$15,500,000
Estimated Cost of Issuance:	$ 103,000
Estimated Interest Rate:	2.50%
Payment Term:	Approximately 25 years
Fund Source for **Total** Debt Payment:	Retained Tuition
Total Annual Debt Service (by fund source):	
Principal & Int. FY22-FY46 (Ave.) $841,000	Retained Tuition
Total Debt Service Through Maturity: $21,032,000	
Anticipated Date of Issuance:	Spring 2021
Expected bond rating SRB:	AA- (S & P) Aa2 (Moody's)

Debt Ratio Information:

Current Projected Debt Ratio:	4.90%
Increment Debt Ratio:	0.04%
Projected Highest Debt Ratio:	4.94%

Joint Committee on Capital Review
December 16, 2020 JCCR Meeting
University of Arizona Projects Submission

Facilities Management Relocation and Consolidation Facility
Tax Exempt System Revenue Bonds
Amortization Schedule: 2.50%

Period Ending	Annual Principal	Annual Interest	Annual Debt Service
6/1/2022	455,000	387,500	842,500
6/1/2023	465,000	376,125	841,125
6/1/2024	475,000	364,500	839,500
6/1/2025	490,000	352,625	842,625
6/1/2026	500,000	340,375	840,375
6/1/2027	515,000	327,875	842,875
6/1/2028	525,000	315,000	840,000
6/1/2029	540,000	301,875	841,875
6/1/2030	555,000	288,375	843,375
6/1/2031	565,000	274,500	839,500
6/1/2032	580,000	260,375	840,375
6/1/2033	595,000	245,875	840,875
6/1/2034	610,000	231,000	841,000
6/1/2035	625,000	215,750	840,750
6/1/2036	640,000	200,125	840,125
6/1/2037	655,000	184,125	839,125
6/1/2038	675,000	167,750	842,750
6/1/2039	690,000	150,875	840,875
6/1/2040	710,000	133,625	843,625
6/1/2041	725,000	115,875	840,875
6/1/2042	745,000	97,750	842,750
6/1/2043	760,000	79,125	839,125
6/1/2044	780,000	60,125	840,125
6/1/2045	800,000	40,625	840,625
6/1/2046	825,000	20,625	845,625
	15,500,000	**5,532,375**	**21,032,375**

Sincerely,

Lisa N. Rulney
Sr. VP for Business Affairs and Chief Financial Officer

cc: John Arnold, Executive Director, ABOR
Dr. Betsy Cantwell, SVP-Research and Innovation UArizona
Morgan Dorcheus, JLBC Analyst
Dr. Robert C. Robbins, President UArizona
Richard Stavneak, Director, JLBC
Steve Voeller, VP-Government & Community Relations UArizona

Arizona Board of Regents
The University of Arizona
FY 2020 Capital Development Plan (CDP)
Project Justification Report

Facilities Management Relocation and Consolidation Facility (FMRCF)

Previous Board Action

- Capital Improvement Plan FY 2021-2023 September 2019

Statutory/Policy Requirements

- Pursuant to Arizona Board of Regents Policy Chapter 7-102 (B)(1), all capital projects with an estimated total project cost of $10,000,000 or more, including information technology and third-party projects, shall be included in the Capital Development Plan.

Project Justification, Description, and Scope

- Facilities Management services are currently scattered across the University campus. In addition, it must relocate much of its operations from a site to be utilized for a new utility-scale 138kv substation. The utility's valley-wide electric utility distribution system and new substation is a component of a landmark power purchase agreement that will eliminate all of Arizona's Scope 2 emissions – a national first for a Research 1 institution of Arizona's size. The distribution system will serve the University, Banner Hospital and the community with more reliable and efficient power while building in needed redundancy.

- In alignment with Pillar 5 of Arizona's Strategic Plan, the new 70,000 GSF Facilities Management Relocation and Consolidation Facility is envisioned as a multi-story building that will bring together FM operations from 20 locations across campus, while also relocating the administrative, warehouse and shops functions from the vacated 138kv substation site.

Project Delivery Method and Process

- This project is being delivered through a Design-Build (D-B) delivery method. This approach was selected for this project because it can provide early cost control and save time through project scheduling, while providing contractor constructability and design input and coordination throughout the project, improving potentially adversarial project environments and still allowing for the selection of the most qualified architect-contractor team for this project.

- The Design-Builder provides a Guaranteed Maximum Price (GMP) based on the amount previously agreed upon in the Design-Build agreement. In the selection of major subcontractors, the Design-Builder uses a qualification-based selection process prescribed by the ABOR Procurement Code to allow major subcontractors a design-assist role during the design phase. All remaining subcontractor work is awarded on the basis of the lowest

responsive and responsible subcontractor bids. For this work, a minimum of three subcontractor bids will be required, except for specialty items or instances where proprietary systems are required.

- The Design-Build Team will be selected through the capital project search committee process prescribed by the ABOR Procurement Code. A licensed contractor will be included on the search committee as required by ABOR Policy.

Project Status and Schedule

- Programming is underway. This project is scheduled to commence design during winter of 2019.

- Project construction is scheduled to commence during fall of 2020 and will be completed during winter of 2021.

Project Cost

- The total project budget is $24 million, with a construction cost of $18,640,000.

- The construction budget for this project was developed by a design and costing consultant using cost data from industry-standard cost databases and from completed comparable projects. As the project progresses, peer reviews of the Design-Builder's estimates will be reconciled by the Project Team.

Fiscal Impact and Financing Plan

- The University plans to issue $15 million of System Revenue Bonds (SRBs) to fund the Facilities Management Relocation and Consolidation Facility. The additional $9.0 million for the project will be funded with land sale proceeds. The annual debt service payments on the SRBs is estimated to be $900,000. Arizona plans to fund the debt service with retained tuition.

- The estimated operations and maintenance (O&M) cost for the GSF Facilities Management Relocation and Consolidation Facility is $504,200. Arizona plans to fund the O&M with retained tuition.

Debt Ratio Impact:

- The estimated annual debt service of $900,000 on this project would increase Arizona's debt ratio by 0.03 percent.

Occupancy Plan

- This facility will provide replacement space for existing core facilities displaced by a new utility-scale electrical substation and also allows consolidation of 20 smaller, scattered functions, many occupying modified residential structures, into a new and efficient facility. Many of the scattered facilities will be demolished to allow for future higher density

development.

Capital Project Information Summary

University: The University of Arizona
Project Name: Facilities Management Relocation and Consolidation Facility

Project Description / Location:
The new Facilities Management Relocation and Consolidation Facility will bring together FM operations from 20 locations across campus while relocating the primary administration, warehouse and shops functions from a site to be utilized for a new utility scale 138kv substation. The utility's valley-wide electric utility distribution system and new substation will serve the University, Banner Hospital and the community with more reliable and efficient power while building in needed redundancy.

	FY2020 Capital Development Plan November 2019
Project Schedule (Beginning Month/Year):	
Planning	Fall 2019
Design	Winter 2019
Construction	Fall 2020
Occupancy	Winter 2021
Project Budget:	
Total Project Cost	$ 24,000,000
Total Project Cost per GSF	$ 343
Direct Construction Cost	$18,640,000
Construction Cost per GSF	$266
Change in Annual Oper./Maint. Cost	
Utilities	$154,400
Personnel	$234,300
Other	$115,500
Funding Sources:	
Capital:	
• Land Sale	$9,000,000
• Bond Sale	$15,000,000
Operation/Maintenance:	
• Retained Tuition	$504,200

Capital Project Budget Summary

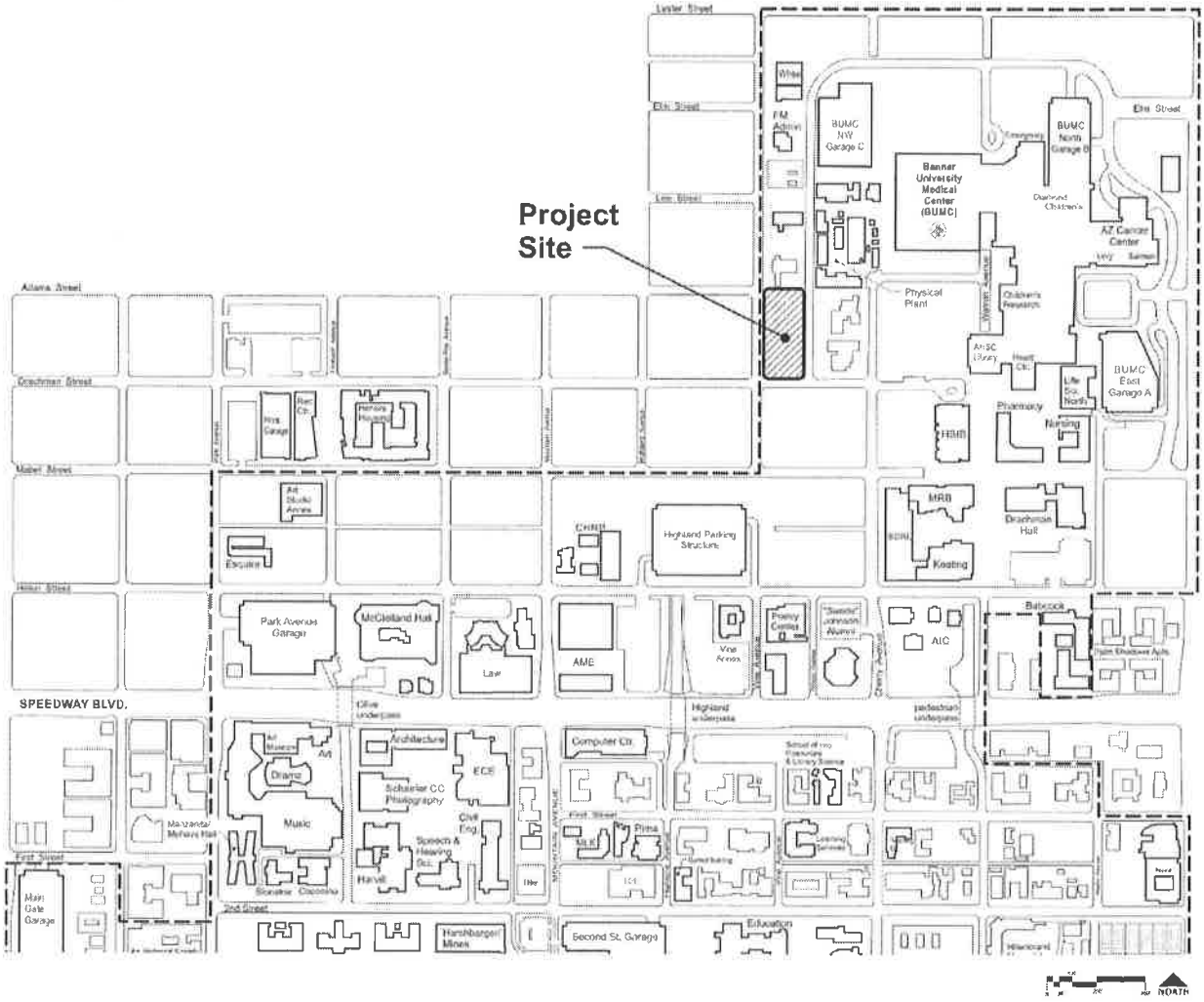
University: The University of Arizona
Project Name: Facilities Management Relocation and Consolidation Facility

Date of Budget Estimate	FY 2020 Capital Development Plan November 2019
1. Land	$ 0
2. Construction Cost	
A. New Construction	$ 18,000,000
B. Renovation	$ 0
C. Fixed Equipment	$ 50,000
D. Site Development (exclude 2.E.)	$ 150,000
E. Parking & Landscaping	$ 250,000
F. Utilities Extensions	$ 190,000
G. Other (asbestos only)	$ 0
Subtotal Construction Cost	**$ 18,640,000**
3. Consultant Fees	
A. Construction Manager	$ 240,000
B. Architect/Engineering Fees	$ 1,900,000
C. Other (Prog.; Special Consultants)	$ 160,000
Subtotal Consultant Fees	**$ 2,300,000**
4. Furniture Fixtures and Equipment	$ 0
5. Contingency, Design Phase	$ 900,000
6. Contingency, Construction Phase	$ 900,000
7. Parking Reserve	$ 0
8. Telecommunications Equipment	$ 400,000
Subtotal Items 4-8	**$ 2,200,000**
9. Additional University Costs	
A. Surveys and Tests	$ 160,000
B. Move-in Costs	$ 30,000
C. Public Art	$ 0
D. Printing/Advertisement	$ 30,000
E. Univ. Facilities & Project Mgmnt.	$ 500,000
F. State Risk Mgt. Ins	$ 140,000
Subtotal Additional University Costs	**$ 860,000**
TOTAL CAPITAL COST	**$ 24,000,000**

EXECUTIVE SUMMARY

Project Site Map

Facilities Management Relocation and Consolidation Facility



STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Geoffrey Paulsen, Senior Fiscal Analyst

SUBJECT: Arizona Department of Corrections - Lewis/Yuma Capital Project: Review of FY 2021 Budget Funding and Quarterly Project Report

Request

A.R.S. § 14-1252 requires Committee review of expenditure plans for monies appropriated for capital projects. The FY 2021 Capital Outlay Bill appropriated $30,000,000 for the project. At the September 2020 meeting, the Committee reviewed $14,100,000 of the FY 2021 appropriation. ADC is requesting review of an additional $8,900,000 to continue work on the project.

ADC submitted their request for the Committee to review additional project funding on December 8th, or 13 days beyond the agency due date.

Pursuant to a provision from the June 2019 Committee meeting, the Arizona Department of Corrections (ADC) also submitted its quarterly report detailing its progress on the Lewis and Yuma Lock, HVAC, and Fire Systems project

Committee Options

The Committee has at least the following 3 options:

1. A favorable review of the request.

2. A favorable review of the request but require ADC to utilize all non-General Fund project appropriations prior to spending the remaining General Fund project appropriation.

3. An unfavorable review of the request.

(Continued)

Under either option, the Committee may consider the following provisions:

A. The department shall comply with American Correctional Association (ACA) standards for all locks purchased and installed as part of this project.

B. In future quarterly reports, the department shall address the number and location of locks that have been repurposed and installed on non-cell doors.

Key Points

1) ADC reports that the project is still on track to be completed by August 2022.
2) The Lewis Morey Unit will be completed in January 2021.
3) At the September meeting the Committee reviewed $14.1 million of $30.0 million appropriated in the FY 2021 Capital Outlay Bill.
4) ADC is requesting review of an additional $8.9 million to continue work on the Lewis prison upgrades.

Analysis

Project Overview

ADC has identified locks, fire alarm and suppression systems and HVAC systems at the Lewis and Yuma prison complexes that need replacement. At the September meeting, JCCR reviewed a revised project budget of $46.3 million. *Table 1* below details the project's current expenditure plan.

Table 1

Lewis and Yuma Lock, HVAC and Fire System Project Costs

	Amount
Phase 1 - Lewis Locks/Fire Systems	$ 6,766,300
Phase 2 - Lewis HVAC	11,548,200
Phase 3 - Yuma Lock/HVAC/Fire Systems	9,600,700
Originally Purchased Locks - Repurposed 1/	6,533,300
New Facility Upgrades	7,817,500
Contingency	4,000,000
Total Project Costs	**$46,266,000**

1/ The current plan includes $2.3 million in expenditures by a subcontractor that ADC and the Construction Manager at Risk (CMAR) are currently validating.

For more background information on this project, see the April 2020 JCCR Meeting Agenda.

Project Status and Updated Expenditure Plan

Since the last quarterly update, ADC reports that all work has been completed in 2 of the 4 housing units in the Lewis Morey Unit, and work is scheduled to be completed on the remaining housing units in January 2021. ADC has installed 496 doors and locking systems, 16 air conditioning units, 400 new cell lights, 96 new day room lights, 272 new stainless-steel toilet/sink combination units and water control systems.

(Continued)

ADC believes the project is still on track for completion in August 2022. *Table 2* below outlines the current timeline.

Table 2

Lewis and Yuma Lock, HVAC and Fire System Schedule

	Scheduled Completion
Lewis - Morey Unit 1/	January 2021
Lewis - Buckley Unit	May 2021
Lewis - Rast Unit	December 2021
Lewis - Stiner and Bachman Detention Units	December 2021
Yuma - Dakota and Cheyenne Units	August 2022 2/

1/ All Morey Unit beds are currently vacant until upgrades are completed.
2/ Work on the Yuma units cannot begin until all units at Lewis are completed. ADC currently projects all work will be completed by August 2022.

Current Request

The FY 2021 Capital Outlay Bill appropriated a total of $30.0 million to ADC for project costs including $11.0 million from the General Fund and $19.0 million from other funds. At the September meeting, the Committee reviewed $14.1 million of the FY 2021 appropriation, of which $2.1 million was from the General Fund and $12.0 million from non-General Fund sources.

ADC is now requesting Committee review of the remaining $8.9 million from the FY 2021 General Fund appropriation to continue the project.

To date, the Committee has reviewed a total of $38.1 million for the project. ADC has provided data suggesting that to date, total project obligations are between $23 million and $28 million. The department has not provided a timeline of when future project obligations will be paid.

The new request would bring the total amount reviewed to $47.0 million, enough to fund the entire project according to ADC's current expenditure plan.

An additional $7.0 million of non-General Fund monies would remain from the FY 2021 appropriation, all of which is from the Arizona Correctional Industries Revolving Fund (ACI Fund). ADC reports that the COVID-19 pandemic has reduced the number of active labor contracts in the Arizona Correctional Industries from 35 to 12, which has reduced the projected balance in the ACI Fund. As a result, ADC would prefer to spend the General Fund appropriation. The JLBC Staff has requested additional detail to confirm any reduced revenue to the ACI Fund, but ADC did not provide that information by the time of publication.

Due to this uncertainty, the Committee may choose to favorably review the request but require that ADC utilize all remaining non-General Fund project appropriations prior to spending the remaining General Fund project appropriation.

GP:kp

Arizona Department of Corrections Rehabilitation & Reentry

DOUGLAS A. DUCEY
GOVERNOR

1601 WEST JEFFERSON
PHOENIX, ARIZONA 85007
(602) 542-5497
www.azcorrections.gov

DAVID SHINN
DIRECTOR

November 25, 2020

The Honorable Regina E. Cobb
Chair, Joint Committee on Capital Review
Arizona House of Representatives
1700 West Washington
Phoenix, Arizona 85007

The Honorable David M. Gowan
Vice-Chair, Joint Committee on Capital Review
Arizona State Senate
1700 West Washington
Phoenix, Arizona 85007

RE: Quarterly Report Lewis and Yuma Fire & Life Safety Project, December 1, 2020

Dear Representative Cobb and Senator Gowan:

The Arizona Department of Corrections, Rehabilitation and Reentry provide the December 2020 quarterly update on the status of the Locks, Fire Suppression and HVAC Project, pursuant to the provisions adopted by the Joint Committee on Capital Review (JCCR).

Background

These projects is essential to the safety and security of staff and inmates. The project represents a necessary investment in critical infrastructure at the identified locations. The scope of the project includes three phases for the repair and/or replacement of cell locking mechanisms, air conditioning systems, fire alarm and suppression systems, detention grade stainless steel sinks and toilets, and security lighting at select units of ASPC-Lewis and ASPC-Yuma.

December 1, 2020 Quarterly Project Update

Since the last quarterly update (September 1, 2020), ADCRR offers the following updates:

1) Morey Unit:
   a) All work in Morey housing units 2 and 3 has been completed.
   b) Work continues in Morey housing units 1 and 4.
   c) A total of 496 swing doors and locking systems have been installed as well as 16 HVAC systems have been completely installed at the Morey unit.
   d) All cell lights (400) and day room security lighting (96) as well as stainless steel toilets (272) and water control systems have been installed at the Morey unit.

e) Additional work remains in housing units 1 and 4 with shower modifications and painting currently in progress.
f) The additional work will be completed in January 2021.

2) Buckley Unit:
   a) Contractors have begun mobilizing to begin work in the Buckley unit. Work in the Buckley unit will begin in January 2021.

3) The current completion schedule for ASPC-Lewis is:
   a) Morey unit - two remaining housing units are scheduled for completion by January 2021.
   b) Buckley unit - all housing units are scheduled for completion by May 2021.
   c) Rast unit - all housing units are scheduled for completion by December 2021.
   d) Stiner, Morey and Bachman detention units are scheduled for completion by December 2021.
   e) The work included in the completion schedule is:
      i) installation of new swinging cell doors with detention grade locks
      ii) installation of air conditioning systems with supply ductwork
      iii) installation of stainless steel combination toilet and sink units
      iv) installation of cell and pod LED security lighting
      v) Includes upgrades to the fire alarm and fire suppression systems

4) As required by provision D of the April 29, 2020, JCCR favorable review:

   a) The CMAR contractor is having ongoing discussions regarding the claim for an additional $2,289,788 for parts and materials related to the original locking solution. These costs are being evaluated by the CMAR and its sub-contractor for validity. ADCRR continues to push for resolution of this issue.

   b) ADCRR has received the remainder of the locking components from the original locking solution. There are 114 locking devices to be repurposed: 49 locking devices will be installed on non-cell doors as part of the locking systems upgrades at ASPC-Lewis and ASPC-Yuma, 51 devices will be installed at ASPC Safford, Perryville, Winslow and Eyman, and 14 locking devices will be retained as attic stock with utilization once needs arise. Installation of these locking devices will begin at the Lewis complex in January 2021.

Project Cost Update:

The current estimated project cost is $42,265,959 which is $13.3M less than the previous cost estimate. This estimate is based on current contract commitments as well as estimated costs for the Yuma portion of the project. This savings is the result of a decrease in expected HVAC costs from Lewis and Yuma.

The revised project cost includes an additional $8.5M in costs allocated to two projects:
- ✓ $4.5M for Stainless-Steel Sink/Toilet combination units and Cell Lighting
- ✓ $4M in contingency funds.

The increase to Stainless-Steel Sink/Toilet combination units and Cell Lighting is due to the addition of water system controls. The original estimate of $3.3M did not include water system controls for the Stainless-Steel Sink/Toilet combination units that were discovered to be non-operational during the bid process. Additionally, the original cost projections did not include Yuma. These repairs are critical to the safety of staff and inmates in both Lewis and Yuma. The porcelain sinks and toilets are a major safety concern because an inmate can easily break these fixtures to fashion a lethal weapon.

Additionally, the lighting in these complexes is substandard and did not meet the American Correctional Association Standards for correctional settings. The low lighting hinders visibility, particularly in camera footage, making it difficult to identify inmates involved in incidences. The cell infrastructure upgrades of lighting and stainless-steel toilet and sink combination unit upgrades are vital to bring the previously deficient physical security to an appropriate level for the high security population. The repairs will be done simultaneously with the locks and HVAC to not keep the beds out of commission longer than necessary.

A contingency line item has been carved out from the HVAC savings to address unforeseen needs. This contingency fund is 8.65% of the total project cost. The industry standard for projects of this size is 10%. This ensures the project has a reserve to utilize, if need be.

As required by provision C of the April 29, 2020, JCCR favorable review, the project expenditure plan is updated as outlined in the table below.

Lewis and Yuma Lock, HVAC and Fire System Project Costs

Phase	Original Proposal	Current Proposal as of 07/28/2020	Difference
Phase 1 – Lewis Locks/Fire	$25,890,000	$6,766,257	-$19,123,743
Phase 2 – Lewis HVAC Conversion	$11,610,000	$11,548,212	-$61,788
Phase 3 – Yuma	$13,900,000	$9,600,702	-$4,299,298
Originally Purchased Locks - Repurposed	$0	$6,533,288	$6,533,288
Potential Cancellation Penalties	$0	$0	$0
New Upgrades (Stainless Steel Sink/Toilet and Cell Security Lighting Upgrades)*	$0	$7,817,500	$7,817,500
Contingency	$0	$4,000,000	$4,000,000
Total Project Costs	**$51,400,000**	**$46,265,959**	**-$5,134,041**

* Cell infrastructure upgrades to cell lighting, stainless steel toilet and sink upgrades are vital to bring the previously deficient physical security to an appropriate level for the high security population. Lewis is $5.9M, Yuma is $1.9M.

In this table, the current estimated project cost is $5.1M less than the original proposal cost estimate. When project costs estimates are compared from May 2020 to July 2020, there is a $13.3M reduction in project costs as described in the first paragraph in this section. The project cost comparison history is included as an enclosure to this report.

If you have any questions, please contact Deputy Director Frank Strada or Deputy Director Joseph Profiri at 602.542.5225.

Sincerely,

/David Shinn
Director

cc: Richard Stavneak, Director, Joint Legislative Budget Committee
Matthew Gress, Director, Office of Strategic Planning and Budgeting
Geoffrey Paulsen, Senior Fiscal Analyst, Joint Legislative Budget Committee
Ryan Vergara, Budget Manager, Office of Strategic Planning and Budgeting
Charlotte Hallett, Budget Analyst, Office of Strategic Planning and Budgeting

Arizona Department of Corrections Rehabilitation & Reentry

1601 WEST JEFFERSON
PHOENIX, ARIZONA 85007
(602) 542-5497
www.azcorrections.gov

DOUGLAS A. DUCEY
GOVERNOR

DAVID SHINN
DIRECTOR

November 25, 2020

The Honorable Regina E. Cobb
Chair, Joint Committee on Capital Review
Arizona House of Representatives
1716 W Adams
Phoenix, AZ 85007

The Honorable David M. Gowan
Vice-Chair, Joint Committee on Capital Review
Arizona State Senate
1716 W Adams
Phoenix, AZ 85007

RE: Submission for Review of Additional Funds - FY 2021 Capital Appropriation
ASPC-Lewis & ASPC-Yuma Locking and Fire Safety Project

Dear Representative Cobb and Senator Gowan:

The Arizona Department of Corrections, Rehabilitation & Reentry (ADCRR) requests review of the $30,000,000 funding from the FY 2021 Capital Appropriation for the ASPC-Lewis & ASPC-Yuma Locking and Fire Safety Project.

Background

This project is essential to the safety and security of staff and inmates. The project represents a necessary investment in critical infrastructure at the identified locations. The scope of the project includes three phases for the repair and/or replacement of locks, HVAC, and fire alarm and suppression systems at select units of ASPC-Lewis and ASPC-Yuma.

At the JCCR meeting on June 18, 2019, an overall project summary was provided and JCCR favorably reviewed the $17,700,000 in non-appropriated funds to begin Phase 1.

In December 2019, ADCRR requested review of an additional $6,280,000 in funding to continue the project. JCCR favorably reviewed this request. This represented a total of $23,980,000 in project funding from ADCRR non-appropriated funds.

In August 2020, JCCR favorable reviewed an additional $14.1 million in requested funding from FY 2021 enacted budget Capital Appropriation of $30,000,000 [Laws 2020, Second Regular Session,

Chapter 57 (SB 1691) Sec. 2.] for the ASPC-Lewis & ASPC-Yuma Locking and Fire Safety Project. The $14.1 million in approved funding included ½ of the project contingency amount requested, $2 million.

At the upcoming JCCR meeting on December 16, 2020, ADCRR requests approval to spend an additional $8.9 million of the total $30 million capital appropriation to complete the project. The capital appropriation balance is $7.0 million.

Project Update

The $46,254,959 project cost estimate has not changed since the last JCCR appropriation review on August 21, 2020. This project cost estimate is $13.3M less than the previous cost estimate. This savings is the result of a decrease in expected HVAC costs from Lewis and Yuma. The revised project cost includes an additional $8.5M in costs allocated to two projects:

1. $4.5M for Stainless Steel Sink/Toilet and Cell Lighting
2. $4M in contingency funds

The increase to Stainless Steel Sink/Toilet and Cell Lighting is due to the addition of water system controls. The original estimate of $3.3M did not include water system controls for the combination stainless-steel sink/toilet units that were discovered to be non-operational during the bid process. Additionally, original cost projections did not include Yuma. These repairs are critical to the safety of staff and inmates in both Lewis and Yuma.

The porcelain sinks and toilets are a major safety concern because an inmate can easily break these fixtures to fashion a lethal weapon. Additionally, lighting in these complexes is substandard and does not meet standards set forth by the American Correctional Association for illumination within correctional settings. The low lighting hinders visibility, particularly in camera footage, making it difficult to identify inmates involved in incidences. The cell infrastructure upgrades of lighting and stainless-steel toilet and sink upgrades are vital to bring the previously deficient physical security to an appropriate level for the high security population. Identified repairs will be done simultaneously with the locks and HVAC to not keep the beds out of commission longer than necessary.

A contingency line item has been carved out from the HVAC savings to address unforeseen needs. This contingency fund is 8.65% of the total project cost. The industry standard for projects of this size is 10%. This ensures the project has a reserve to utilize, if need be.

Funding Summary

Dec 2020 Funding Request	
January 2021 to June 2021 Need	$6.9M
½ Contingency	$2.0M
Total Request	$8.9M

Appropriation Fund Source	
General Fund (1000)	$8.9M

ADCRR will provide additional project details with its next quarterly report due to JCCR on March 1st, 2020. This report will include conditions added to project report from each of the FY 2020 JCCR project reviews.

As always, if I can provide additional information please do not hesitate to contact me.

Sincerely,

David Shinn
Director

Enclosures

cc: Richard Stavneak, Director, Joint Legislative Budget Committee
Matthew Gress, Director, Office of Strategic Planning and Budgeting
Geoffrey Paulsen, Senior Fiscal Analyst, Joint Legislative Budget Committee
Ryan Vergara, Budget Manager, Office of Strategic Planning and Budgeting
Charlotte Hallett, Budget Analyst, Office of Strategic Planning and Budgeting

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Henry Furtick, Senior Fiscal Analyst

SUBJECT: Arizona State Parks Board - Review of Alamo Lake State Park Wastewater Treatment Project

Request

A.R.S. § 41-1252 requires Committee review of expenditure plans for capital projects. The Arizona State Parks Board (ASPB) requests review of $325,000 from the State Lake Improvement Fund (SLIF) to replace the main sewer pipe at the Alamo Lake State Park wastewater treatment facility.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following provision:

A. On or before January 31, 2021 and July 31, 2021, ASPB shall report to the JCCR Chairman and the JLBC Staff on the status of the Alamo Lake State Park wastewater treatment project.

Key Points

1) ASPB is requesting review of $325,000 from SLIF to replace the main sewer pipe at the Alamo Lake wastewater treatment facility.
2) In July 2018, the Committee reviewed $250,000 of funding for the same project, however the appropriation authority lapsed at the end of FY 2020 before the project's completion.

(Continued)

Analysis

Background

Alamo Lake State Park (ALSP) is located in northeastern La Paz County, roughly 40 miles north of the City of Wenden. The state park includes Alamo Lake, which collects water from the Bill Williams River and is used as both a flood control station and a recreational reservoir for the state park. ALSP allows for overnight camping and cabin reservations as well as swimming, fishing, and boating on the lake itself.

Prior ALSP Wastewater Treatment Facility Maintenance

In 2016, ASPB used $355,000 from state and Federal Funds to replace the storage tank and lift station pump at the ALSP wastewater treatment facility. These components were over 50 years old at the time and failing due to age deterioration. The facility's main sewer pipe was not replaced in 2016 but is of similar age and is now in disrepair due to age, use, and erosion around the pipe's lining. This main sewer pipe connects to 2 campgrounds, a contact station, a maintenance building, and the park residence structures.

The FY 2019 Capital Outlay Bill included a $2.0 million appropriation from the State Parks Revenue Fund (SPRF) for ASPB capital projects. Of that amount, ASPB budgeted $250,000 to replace the main sewer pipe at the ALSP wastewater treatment facility. The Committee reviewed the project at its July 2018 meeting and ASPB subsequently used $87,800 of the $250,000 to complete the design plans and purchase most of the project materials. The design plans have ADOA approval and underwent a third-party review by an engineering firm.

Project Cost Estimate and Timeline

During the third-party engineering review, the project's scope changed and the estimated construction cost increased, resulting in an estimate of $325,000 of funding needed to complete the project.

ASPB plans to resume construction through its existing job order contract and anticipates the project can be completed before the end of FY 2021.

Table 1

Alamo Lake Sewer Pipe Replacement Cost

Current Request	
Construction, materials and site work	$298,800
Architect and engineering fees	10,000
Contingency	16,200
Requested Funding	**$325,000**

HF:kp

Doug Ducey
Governor

ARIZONA
STATE PARKS & TRAILS

Robert Broscheid
Executive Director

November 25, 2020

The Honorable Regina E. Cobb
Chairman, Joint Committee on Capital Review
Arizona House of Representatives
1716 West Adams
Phoenix, AZ. 85007

RE: Arizona State Parks Board Alamo Lake State Parks Force Main Project for the Joint Committee on Capital Review

Dear Representative Cobb:

The Arizona State Parks Board (Arizona State Parks & Trails - ASPT) respectfully requests to be placed on the agenda of the next Joint Committee on Capital Review (JCCR) meeting being held on December 16, 2020 for review of funding to complete the Alamo Lake State Parks force main project.

The Alamo Lake State Park wastewater treatment facility received a new storage tank and lift station pump in 2016. These were originally installed in the 1960's. The force main line was also installed in the 1960's but it was not replaced at the same time as the storage tank and pump. Unfortunately, it is in a state of disrepair due to age, use and years of erosion around the line causing it to implode. This line is the sewage conduit that flows from the storage tank to the leach fields.

ASPT received a favorable JCCR review and an appropriation of $250,000 from the State Park Revenue Fund (SRPF) for Fiscal Year 2019 regarding this project. However, the funding lapsed prior to the project being completed. Prior to lapsing, ASPT was able to complete the design plans and purchase a considerable amount of the necessary materials for the project, which are currently being stored on-site. The design plans have been approved through ADOA and Bureau Veritas (third-party review); therefore, the project is construction ready.

In addition, the construction bid ASPT received through its job order contract (JOC) increased significantly from the original estimate and what was originally approved ($250,000 to $505,000). This was a result of scope changes that occurred through the required third-party plan design review. However, through value engineering ASPT has decreased the anticipated remaining project costs to $325,000.

Doug Ducey
Governor

ARIZONA STATE PARKS & TRAILS

Robert Broscheid
Executive Director

Construction, remaining materials and site work	**$ 298,750**
Architect and Engineering Fees	**$ 10,000**
Contingency	**$ 16,250**
Cost Estimate (SLIF)	**$ 325,000**

ASPT is requesting Committee review on this capital project pursuant to A.R.S 41-1252. Upon such review, ASPT will resume construction activities through its existing JOC and anticipates the project to be completed prior to the end of Fiscal Year 2021.

Thank you for your consideration of this request. If you have any questions or need additional information, please contact Mark Weise, Chief of Development, at 602-542-7157.

Sincerely,

Bob Broscheid
Executive Director
Arizona State Parks Board

cc: The Honorable Regina E. Cobb, Chairman, JCCR
Matthew Gress, Director, Office of Strategic Planning and Budgeting
Richard Stavneak, JLBC Director
Henry Furtick, JLBC Analyst
Zachary Harris, OSPB Analyst
Tim Franquist, ASPT Deputy Director

5

STATE OF ARIZONA

Joint Committee on Capital Review

STATE SENATE

DAVID M. GOWAN
VICE-CHAIRMAN
LELA ALSTON
SEAN BOWIE
DAVID BRADLEY
RICK GRAY
SINE KERR
VINCE LEACH

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

HOUSE OF REPRESENTATIVES

REGINA E. COBB
CHAIRMAN
CHARLENE R. FERNANDEZ
RANDALL FRIESE
JOHN KAVANAGH
AARON O. LIEBERMAN
WARREN PETERSEN
BEN TOMA

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: David Hoffer, Economist

SUBJECT: Arizona Game and Fish Department - Review of Building Renewal Reallocation Plan

Request

A.R.S. § 41-1252 requires Committee review of expenditure plans for building renewal monies. The Arizona Game and Fish Department (AGFD) is requesting review of $523,600 for new building renewal projects, which are being funded from the reallocation of building renewal monies previously reviewed by the Committee.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following provisions:

A. The AGFD shall report any change in the building renewal spending plan to the Joint Committee on Capital Review Chairman and the JLBC Staff. If there is significant change of scope in the reallocation reported by AGFD, the Chairman may require further Committee review.

Key Points

1) The AGFD proposes reallocating $523,600 of FY 2020 and FY 2021 building renewal monies for various new projects. These funds are available due to previously reviewed projects being completed under budget.
2) The 11 items include 7 regional office projects and 4 wildlife area projects.

(Continued)

Analysis

The FY 2020 Capital Outlay Bill appropriated a total of $1,043,700 from the Game and Fish Fund and the FY 2021 Capital Outlay Bill appropriated a total of $1,175,900 from the Game and Fish Fund to the AGFD for building renewal expenditures. At the September 2019 JCCR Meeting and June 2020 JCCR meetings, the Committee favorably reviewed the AGFD building renewal expenditure plans.

FY 2020 and FY 2021 Building Renewal Reallocations

The department proposes reallocating $254,100 from FY 2020 and $269,500 from FY 2021 building renewal monies to new projects. These monies are being reallocated due to previously reviewed projects being under the budgeted amount and AGFD deferring the Horseshoe Wildlife Area Wastewater System Phase II project. The department proposes reallocating monies to the following new projects listed in *Table 1*.

Table 1

FY 2022 Building Renewal Expenditure Plan 1/

Regional Office Projects	
Ben Avery Clay Target Center - Pavement Repair	$125,000
Pinetop - Staff Office Renovations	8,700
Pinetop - Re-roofing Project	47,500
Flagstaff - Fleet Parking Automatic Gate Controller Replacement	8,900
Flagstaff - Parking Lot Repairs	35,000
Mesa - Office Exterior LED Lighting Upgrade	22,500
Tucson - Security Camera System Replacement	32,000
Subtotal	$279,600
Wildlife Area Projects	
Canyon Creek Hatchery - Pavement Repair	$120,000
Robbins Butte - Domestic Well Renovation/Deepening	52,000
Sipe - Generator Replacement	47,000
Tonto Creek Hatchery - Pavement Repair	25,000
Subtotal	$244,000
Total	**$523,600**

DH:kp

November 25, 2020

Representative Regina Cobb, Chairman
Joint Committee on Capital Review
Capitol Complex
1700 W. Washington
Phoenix, AZ 85007-2890

Re: Request for Placement on Joint Committee on Capital Review Agenda

Honorable Representative Cobb:

In accordance with A.R.S. § 41-1252 A(4), the Arizona Game and Fish Department respectfully requests to be on the next scheduled agenda of the Joint Committee on Capital Review to review updates to the Arizona Game and Fish Department's Building Renewal Expenditure plan.

Sincerely,

Ty Gray
Director

cc: Senator David Gowan, Vice Chairman, JCCR
Richard Stavneak, Staff Director, JLBC
Matthew Gress, Director, OSPB

Project: Renovation to Wolf Reintroduction Staff Office Located at Pinetop Regional office

Category: Preservation of Assets; Buildings; Health/Life Safety

Need: The Arizona Game and Fish Department is the state's lead agency in the Mexican Wolf Reintroduction Program in southeastern Arizona. Department staff work directly with United States Fish and Wildlife Services to administer this program using the best available science and methods appropriate for this state. The Service has expressed interest in leasing a modular building located at the Pinetop Regional Office complex that was recently vacated by the Department of State Forestry and Fire Management in order to continue the joint program coordination effort with our Regional staff. The United States Fish and Wildlife Service hired a certified building inspection company to assess the condition of the building prior to its occupation, this project addresses the priority issues that were identified as necessary to make the space usable.

Solution: Perform necessary renovations to provide safe, occupiable space (painting, flooring, minor wood repair, roofing and electrical upgrades).

Cost Estimate

Activity	Quantity	Unit	Unit Cost	Cost
Renovation work to bring the building back to usable space.	1	LS	$8,700	$8,700
TOTAL ESTIMATE:				**$8,700**
*Estimate based on a local contractor's bid				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to providing a safe working environment for its employees and preserving its administrative assets. To defer this work could result in loss of occupancy, further degradation and more costly repairs to the structure and would impose an increasing safety issue for Department staff.

Project: Sipe Wildlife Area Headquarters Generator Replacement - Additional Electrical Upgrades Associated with Generator Replacement.

Category: Preservation of Assets; Health/Life Safety; Supporting Infrastructure

Need: The Sipe White Mountain Wildlife Area (Sipe) is located within the White Mountains of northeastern Arizona at an elevation of 7,800 feet, approximately ten miles south of the towns of Eagar and Springerville in Apache County. The primary purpose of the acquisition was to conserve and enhance sensitive species and habitats, including the Little Colorado spinedace, while providing compatible natural resource recreational opportunities for the public. Numerous improvements, including a manager's residence, bunkhouse, visitor center, water wells, a diesel powered backup generator, barn and outbuildings are located within the Sipe ranch headquarters area.

Due to the remote nature of this property, electrical power failures, including multi-day power outages, are common, typically occurring as a result of heavy winter snows, and summer monsoon activity. When power outages occur during freezing conditions, it is necessary to maintain heat within the residence house, bunkhouse, and visitor center, for both personnel safety, and to prevent water pipes within these structures from freezing and breaking, and causing subsequent water damage. During the summer months, power outages can result in the loss of power to a large walk-in freezer, and thus spoilage of stored wildlife carcasses that are used by the Mexican Wolf Recovery Team. In addition, the water well at Sipe, which is the only source of potable water, needs electric power to pump water.

The generator was replaced in accordance with a prior building renewal proposal of $60,000. It was subsequently determined that additional equipment, conduit and conductors need to be replaced as well to better maintain the functionality of the entire system and avoid premature failure of the new equipment.

Solution: Replace electrical equipment, conduit and conductors.

Cost Estimate

Activity	Quantity	Unit	Unit Cost	Cost
Replace electrical equipment, conduit and conductors. (FY20 $25,700 & FY21 $21,300)	1	LS	$47,000	$47,000
TOTAL ESTIMATE:				**$47,000**
*Estimate based on a local contractor's bid				

Impact of Not Approving this Request: The Arizona Game and FIsh Department is committed to preserving its administrative assets. Deferral of this work would leave recently updated equipment operating in a non-optimal state that could result in premature degradation or failure that would impose an increasing safety issue for Department staff.

Project: Re-roof Historic Barn and Two Auxiliary Buildings at Pinetop Regional Office with Standing Seam Metal Roofing.

Category: Building Shell - Roofing

Need: The existing roofing on a historic barn and two auxiliary buildings (bunkhouse and administrative/storage building) are in a deteriorated state and have exceeded their useful life.

Solution: The old roofing will be removed and replaced with additioanl roof deck material replaced as necessary. This project was coordinated with the State Historic Preservation Office.

Cost Estimate

Activity	Quantity	Unit	Unit Cost	Cost
The old roof will be removed, roof deck material that requires replacement will be replaced, and a new roof installed that is coordinated with the state historic preservation office.	1	LS	$47,500	$47,500
TOTAL ESTIMATE:				**$47,500**
*Estimate based on Estimate from a local contractor.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to preserving its administrative assets and maintaining a safe working environment. The poor condition of these roofs may lead to additional damage as they fail to protect the structure from the elements, pose a risk to employees, and detracts from the public's image of AGFD.

Project: Flagstaff Regional office Fleet Parking Automatic Gate Controller Replacement

Category: Preservation of Assets

Need: The Arizona Game and Fish Department owns and operates six Regional Offices around the state (Pinetop, Flagstaff, Kingman, Yuma, Tucson and Mesa). The regional offices are the Department's primary customer service locations throughout the state and provide a range of services including hunting and fishing license sales, boating registration as well as offering a variety of information resources regarding Arizona's wildlife. These offices are typically occupied by 25 to 35 permanent staff and act as a base station for law enforcement officers and other field personnel.
The Flagstaff regional office separates public parking and public building access from staff parking, Department resources (such as state vehicles) and employee access by means of an electronic main gate which has failed and is no longer operational. A secondary gated access is currently in use.

Solution: Replace gate control and operator.

Cost Estimate

Activity	Quantity	Unit	Unit Cost	Cost
Replace gate control and operator.	1	LS	$8,900	$8,900
TOTAL ESTIMATE:				**$8,900**
*Estimate based on Estimate from a local contractor.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to proper stewardship of state resources, providing a safe work environment and to preserving its administrative assets. Continued exclusive use of the the secondary gate and operator could cause premature failure, and creates an unnecessary safety concern by increasing the frequency of State vehicles and equipment utilizing the secondary gate location which is a further distance from the primary access along a traffic calmed route with multiple pedestrian crossings.

Project: Flagstaff Regional Office Parking Lots Repairs, CrackSeal and Seal coat.

Category: Infrastructure and Building Sitework

Need: The Arizona Game and Fish Department owns and operates six Regional Offices around the state (Pinetop, Flagstaff, Kingman, Yuma, Tucson and Mesa). The regional offices are the Department's primary customer service locations throughout the state and provide a range of services including hunting and fishing license sales, boating registration as well as offering a variety of information resources regarding Arizona's wildlife.
The public and employee parking lots of the Flagstaff Regional Office have reached their utilization threshold and are in need of repair and resurfacing. Asphalt has failed to the point of requiring removal in some sections where it could pose a risk of damage to vehicles.

Solution: Saw cut, remove and replace damaged asphalt; seal all cracks; apply double seal coat; apply new striping

Cost Estimate:

Activity	Quantity	Unit	Unit Cost	Cost
Furnish materials, labor and equipment for AC patching, crack fill, seal coat and striping	1	LS	$35,000	$35,000*
TOTAL ESTIMATE:				**$35,000**
*Estimate based on other parking area paving maintenance projects.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to preserving its administrative assets. To defer this work could result in further pavement degradation and more costly repairs, including the eventual failure of the existing asphalt, in the future. Poor parking lot conditions can cause damage to staff and visitor vehicles, pose a risk of walking injury, and detract from the public's experience with and image of the Department.

Project: Tucson Regional Office Security Camera System Replacement

Category: Preservation of Assets

Need: The Arizona Game and Fish Department owns and operates six Regional Offices around the state (Pinetop, Flagstaff, Kingman, Yuma, Tucson and Mesa). The regional offices are the Department's primary customer service locations throughout the state and provide a range of services including hunting and fishing license sales, boating registration as well as offering a variety of information resources regarding Arizona's wildlife.
The existing legacy security camera system in use at the Tucson Regional Office is not compatible with the statewide standard camera system in use by Department facilities, rendering it essentially non functional. This deficiency complicated the investigation of a recent break in of the office because the camera system was not able to be used to retrieve a recording of the occurrence. This project will upgrade the regional office equipment to the current AZGFD statewide standard and allow better monitoring and access control by our 24 hour staffed radio room.

Solution: Replace existing camera system with AZGFD standard system.

Cost Estimate -

Activity	Quantity	Unit	Unit Cost	Cost
Replace existing camera system with new AZGFD standard system.	1	LS	$32,000	$32,000
TOTAL ESTIMATE:				**$32,000**
*Estimate based on Estimate from a local contractor.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to maintaining a safe environment for employees and the public. Deferral of this project would prolong an identified safety risk.

Project: Robbins Butte Headquarters Domestic Well Renovation/Deepening

Category: Infrastructure and Building Sitework; Major Building Services

Need: The Arizona Game and Fish Commission owns and operates the Robbins Butte Wildlife Area west of Buckeye. This actively managed 1,680 acre wildlife adjoins the Gila River corridor and features diverse habitats that draw large populations of resident and migratory wildlife to this area. Robbins Butte offers a variety of hunting opportunities including mule deer, javelina, dove, quail and rabbit. The largest youth opportunity is held on opening weekend in September and provides a mentored experience for youth hunters.
The domestic well at the manager's residence at Robbins Butte Wildlife Area has experienced a decline in water quality and performance that has been associated with insufficient depth. The current well depth accesses an aquifer that is shallow and of poor water quality for domestic use. Increasing the depth of the well would allow withdrawal of water from a lower water aquifer of better water quality. A specialized drill rig will add length to the drop pipe and create a seal to prevent water transfer between aquifers. The current hydropneumatic pressure tank will also be replaced as it is significantly aged and undersized for this application.

Solution: Deepen the well to use the lower aquifer and seal the upper aquifer, lower the pump so the well drawdown does not impede the pumps performance; brush and bail the well; test the pump for flow rate/drawdown; replace hydropneumatic tank.

Cost Estimate:

Activity	Quantity	Unit	Unit Cost	Cost
Lower well pump; brush and bail; replace existing hydropneumatic tank	1	LS	$52,000	$52,000
TOTAL ESTIMATE:				**$52,000**
*Estimate based on Estimate from a local contractor.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to providing a quality work environment for its employees, to the active management of habitat to conserve and protect Arizona's wildlife and to provide opportunities for safe, healthy outdoor recreation. Deferment of repairs continues a health risk for the public and Department employees as current conditions cause significant water quality concerns for the Manager and their family living on site.

Project: Mesa Regional Office Exterior LED Lighting Upgrade

Category: Major Building Services: Electrical/Energy Efficiency

Need: The Arizona Game and Fish Department owns and operates six Regional Offices around the state (Pinetop, Flagstaff, Kingman, Yuma, Tucson and Mesa). The regional offices are the Department's primary customer service locations throughout the state and provide a range of services including hunting and fishing license sales, boating registration as well as offering a variety of information resources regarding Arizona's wildlife.
The Mesa Regional Office is located near major population centers and is often utilized for evening hour public events. It is also heavily utilized outside of daylight hours by law enforcement and Department field staff. Most of the facility lighting is over 25 years old and its obsolescence presents difficulty in maintaining safe lighting while making inefficient use of electricity. Pursuant to the FY2020 Building Renewal plan favorably reviewed by JCCR in September 2019, and the Department began replacing exterior lighting fixtures at its Headquarters, Flagstaff, and Pinetop Regional Offices.

Solution: Replace existing exterior fixtures with new LED fixtures.

Cost Estimate -

Activity	Quantity	Unit	Unit Cost	Cost
Replace existing exterior fixtures with new LED fixtures.	1	LS	$19,500	$19,500
TOTAL ESTIMATE:				**$19,500**
*Estimate based on Estimate from a local contractor.				

Impact of Not Approving this Request: To defer this work would result in continued safety and security concerns for both staff and the public and lost opportunity to reduce power and maintenance cost long term.

Project: Canyon Creek Hatchery Pavement Repair, Crackseal and Sealcoat

Category: Infrastructure

Need: The Arizona Game and Fish Department (AGFD) owns and operates six hatcheries in Arizona (Page Springs, Tonto Creek, Canyon Creek, Silver Creek, Sterling Springs, and Bubbling Ponds). All hatcheries are open to the public for viewing of the hatchery operations, bird watching, and wildlife information. These facilities raise sportfish as well as threatened or endangered native fish for stocking in lakes and streams throughout the State and must be able to accommodate the large transport trucks used for stocking on a regular basis.
The pavement at Canyon Creek Hatchery has degraded and is in need of major repair work. Many cracks have opened open to over two inches due to sub-base problems and are creating safety concerns for employees, delivery vendors, and the public. These conditions are also damaging the concrete curbing and undermining the slope stability of the site. Due to the severity of the pavement conditions this will be a multi- year project taken in two phases. The first phase will utilize hatchery program funds to address major cracks requiring extensive saw cutting, pavement removal and sub-base improvements. The second phase will utilize building renewal funds for crack seal and pavement overlay.

Solution: Saw cut, remove and replace damaged asphalt; seal all cracks; apply double seal coat; apply new striping

Cost Estimate:

Activity	Quantity	Unit	Unit Cost	Cost
Canyon Creek Fish Hatchery Parking Lot Maintenance	1	LS	$120000	$120,000*
TOTAL ESTIMATE:				**$120,000**
*Estimate based on Engineers estimate for work				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to preserving its administrative assets. To defer this work could result in further degradation and more costly repairs in the future and creates a risk of failure that could potentially render the site inoperable. Poor pavement conditions can cause damage to staff, vendor and visitor vehicles, pose a risk of walking injury, and detract from the public's experience with and image of the Department.

Project: Tonto Creek Hatchery Pavement Repair, Crackseal and Sealcoat

Category: Infrastructure

Need: The Arizona Game and Fish Department (AGFD) owns and operates six hatcheries in Arizona (Page Springs, Tonto Creek, Canyon Creek, Silver Creek, Sterling Springs, and Bubbling Ponds). All hatcheries are open to the public for viewing of the hatchery operations, bird watching, and wildlife information. These facilities raise sportfish as well as threatened or endangered native fish for stocking in lakes and streams throughout the State and must be able to accommodate the large transport trucks used for stocking on a regular basis.
The pavement at Tonto Creek Hatchery has degraded and is in need of major repair work. Many cracks have opened open to over two inches due to sub-base problems and are creating safety concerns for employees, delivery vendors, and the public. These conditions are also damaging the concrete curbing and undermining the slope stability of the site. Due to the severity of the pavement conditions this will be a multi- year project taken in two phases. The first phase will utilize hatchery program funds to address major cracks requiring extensive saw cutting, pavement removal and sub-base improvements. The second phase will utilize building renewal funds for crack seal and pavement overlay.

Solution: Saw cut, remove and replace damaged asphalt; seal all cracks; apply double seal coat; apply new striping

Cost Estimate

Activity	Quantity	Unit	Unit Cost	Cost
Tonto Creek Fish Hatchery Pavement Maintenance	1	LS	$25,000	$25,000*
TOTAL ESTIMATE:				**$25,000**
*Estimate based on Engineers estimate for work				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to preserving its administrative assets. To defer this work could result in further degradation and more costly repairs in the future and creates a risk of failure that could potentially render the site inoperable. Poor pavement conditions can cause damage to staff, vendor and visitor vehicles, pose a risk of walking injury, and detract from the public's experience with and image of the Department.

Project: Ben Avery Clay Target Center Pavement Repair, Crackseal and Sealcoat

Category: Infrastructure and Building Sitework

Need: The Ben Avery Clay Target Center is a public shotgun shooting range located on the grounds of the 1,650 acre Ben Avery Shooting Facility offering trap, skeet, and sporting clay opportunities. The clay target center is open to the public and frequently hosts local, national and international events. Millions of clay targets are thrown from the Clay Target Center's various stations every year.
The drive and access way pavement to the Clay Target facility is aged and in need of repair. Many cracks have opened and rutting has occurred creating safety concerns for employees, delivery vendors, and the public.

Solution: Saw cut, remove and replace damaged asphalt; seal all cracks; apply double seal coat; apply new striping

Cost Estimate:

Activity	Quantity	Unit	Unit Cost	Cost
Furnish materials, labor and equipment for AC patching, crack fill, seal coat and striping	1	LS	$125,000	$125,000*
TOTAL ESTIMATE:				**$125,000**
*Estimate based on other parking area paving maintenance projects.				

Impact of Not Approving this Request: The Arizona Game and Fish Department is committed to preserving its administrative assets. To defer this work could result in further degradation and more costly repairs in the future. Poor pavement conditions can cause damage to staff, vendor and visitor vehicles, pose a risk of walking injury, and detract from the public's experience with and image of the Department.

AGFD REALLOCATION PLAN FOR SURPLUS BUILDING RENEWAL FUNDS FROM FY20 AND FY21 APPROPRIATIONS

LOCATION/PROJECT	BUILDING RENEWAL PROJECT CATAGORY	ESTIMATED PROJECT COST	FY20 BUILDING RENEWAL REALLOCATION BALANCE	FY21 BUILDING RENEWAL REALLOCATION BALANCE
			$254,105.00	$270,293.00
REGION 1 Pinetop				
Renovation to Wolf Reintroduction Staff Office Located at Pinetop Regional Office	Shell:Superstructure; Exterior Walls & Roofing; Interiors:Interior Construction Stairs;Finishes	$8,700.00		$8,700.00
Sipe Wildlife Area Headquarters Generator Replacement - Addtional Electrical Upgrades Associated with Generator Replacement	Major Building Services	$47,000.00	$25,700.00	$21,300.00
Re-roof Historic Barn and two Auxillary Buildings at Pinetop Regional Office with Standing Seam Metal Roofing	Shell:Superstructure; Exterior Walls & Roofing	$47,500.00	$47,500.00	
REGION 2 Flagstaff				
Flagstaff Regional Office Fleet Parking Automatic Gate Controller Replacement	Infrastructure & Building Sitework	$8,900.00	$8,900.00	
Flagstaff Regional Office Parking Lots - Repairs, Crack Seal and Seal Coating	Infrastructure & Building Sitework	$35,000.00		$35,000.00
REGION 3 Kingman				
REGION 4 Yuma				
REGION 5 Tucson				
Tucson Regional Office Security Camera System Replacement	Major Building Services	$32,000.00		$32,000.00
REGION 6 Mesa				
Robbin Butte Headquarters Domestic Well Renovation/Deepening	Infrastructure & Building Sitework	$52,000.00	$52,000.00	
Mesa Regional Office Exterior LED Lighting Upgrades	Energy Conservation			$22,500.00
HATCHERIES				
Canyon Creek Hatchery Pavement Repair, Crackseal and Sealcoat	Infrastructure & Building Sitework	$120,000.00	$120,000.00	
Tonto Creek Hatchery Pavement Repair, Crackseal and Sealcoat	Infrastructure & Building Sitework	$25,000.00		$25,000.00
SHOOTING RANGES				
Ben Avery Clay Target Center Pavement Maintenance - Repairs, Crackseal and Seal Coat	Infrastructure & Building Sitework			$125,000.00
Totals:		**$351,100.00**	**$254,100.00**	**$269,500.00**
Balance:			**$5.00**	**$793.00**

ARIZONA GAME AND FISH FY21 BUILDING RENEWAL STATUS REPORT

LOCATION/PROJECT	CATAGORY CODE	FACILITY TYPE	ESTIMATED PROJECT COST (May Include other funding)	JCCR APPROVED FY21 BUILDING RENEWAL PROJECTS	FY21 BUILDING RENEWAL EXPENDITURE	PROJECT STATUS OF DECEMBER 31, 2020	FY21 BALANCE TO BE REALLOCATED
BEGINNING BALANCES				**$1,063,230.00**			
REGION 1 Pinetop							
REGION 2 Flagstaff							
REGION 3 Kingman							
Regional Office LED Lighting Conversions (Exterior)	9	Administrative Facility	$20,000.00	$20,000.00	$17,548.00	Completed	$2,452.00
REGION 4 Yuma							
Quigley Wildlife Area Residence Renovation	3	Wildllife Area	$125,000.00	$125,000.00	$82,589.00	In Progress	$42,411.00
Regional Office LED Lighting Conversions (Exterior)	9	Adminitrative Facility	$20,000.00	$20,000.00	$18,451.00	Completed	$1,549.00
REGION 5 Tucson							
Whitewater Draw Wildiife Area Residence Renovation	3	Wildlife Area	$150,000.00	$150,000.00	$76,119.00	In Progress	$73,881.00
REGION 6 Mesa							
Horseshoe Wildlife Area Outbuilding Re-roofing	2	Wildlife Area	$90,000.00	$90,000.00	$90,000.00	In Progress	$0.00
Horseshoe Wildlife Area Solar Power System	3	Wildlife Area	$95,000.00	$95,000.00	$116,029.00	Completed	$0.00
Horshoe Ranch Wildlife Area Wastewater System Phase II	8	Wildlife Area	$150,000.00	$150,000.00	$0.00	Deferred	$150,000.00
Robbins Butte Wildlife Area Residenct Septic System	8	Wildlife Area	$40,000.00	$40,000.00	$40,000.00	Under Design	$0.00
HATCHERIES							
SHOOTING RANGES							
HEADQUARTERS							
Facilitiy Inventory and Assessment	3	Statewide	$150,000.00	$150,000.00	$150,000.00	In Negotion	$0.00
AGFD State Headquaters Major Maintence Fund	3	Administrative Facility	$52,230.00	$52,230.00	$52,230.00	Completed	$0.00
Set Aside Allocations							
Preventative Maintenance (8% of Appropriation)	3	Statewide	$96,000.00	$96,000.00	$11,985.00	On Going	$0.00
Emergency Allocation	1	Statewide	$75,000.00	$75,000.00	$8,603.00	On Going	$0.00
Totals:			**$1,063,230.00**	**$1,063,230.00**	**$663,554.00**		**$270,293.00**
Balance							

CATAGORY CODES			
Fire & Life Safety	*1*	$75,000.00	$8,603.00
Shell:Superstructure; Exterior Walls & Roofing	*2*	$90,000.00	$90,000.00
Major Building Services	*3*	$668,230.00	$488,952.00
Interiors:Interior Construction Stairs;Finishes	*4*	$0.00	$0.00
Special Construction & controls; Hazardous Abatement	*5*	$0.00	$0.00
ADA accessibility	*6*	$0.00	$0.00
Land Acquisition	*7*	$0.00	$0.00
Infrastructure & Building Sitework	*8*	$190,000.00	$40,000.00
Energy Conservation	*9*	$40,000.00	$35,999.00
New Construction	*10*	$0.00	$0.00
Grand Totals		**$1,063,230.00**	**$663,554.00**

ARIZONA GAME AND FISH FY20 BUILDING RENEWAL PROJECT STATUS REPORT

LOCATION/PROJECT	CATAGORY CODE	FACILITY TYPE	ESTIMATED PROJECT COST (May Include other funding)	JCCR APPROVED FY20 BUILDING RENEWAL PROJECTS	JCCR APPROVED FY20 BUILDING RENEWAL REALLOCATION PROJECTS	FY20 BUILDING RENEWAL EXPENDITURE	PROJECT STATUS S OF DECEMBER 31, 2020	FY20 BALANCE TO BE REALLOCATED
BEGINNING BALANCES				**$1,043,746.00**	**$102,900.00**			
REGION 1 Pinetop								
Regional Office Pavement Maintenance	8	Regional Office	$100,000.00	$100,000.00		$0.00	Completed	$0.00
Replace Smoke Alarm Detectors at Regional Office	1	Regional Office	$2,500.00	$2,500.00		$2,500.00	Completed	$0.00
Replace Smoke Alarm Detectors at Sipe WLA	1	Wildlife Area	$2,500.00	$2,500.00		$2,500.00	Completed	$0.00
Re-roof Historic Barn at Regional Office	2	Regional Office	$10,000.00	$10,000.00		$0.00	Completed	$0.00
Paint Bunkhouse, garage, Barn, & Anex Biulding at Regional Office	2	Regional Office	$16,000.00	$16,000.00		$15,852.00	Completed	$0.00
Sipe Wildlife Area Generator Replacement/Electrical Upgrades	2	Wildlife Area	$110,000.00		$60,000.00	$106,843.00	Completed	
REGION 2 Flagstaff								
Jacobs Lake Restroom Renovation	4	Administrative Site	$14,000.00	$14,000.00		$0.00	Scheduled for Spring 2021	$0.00
Flagstaff Regional Office Improvements (Gutters/Screens/Downspouts, Painting, Siding Repairs, Front Entry Railing, Ext LED Lighting Upgrade, Urinal Replacement)	2	Regional Office	$100,000.00	$38,000.00		$38,000.00	Completed	$0.00
REGION 3 Kingman								
Regional Office Rain Gutters	2	Regional Office	$20,000.00	$20,000.00		$0.00	Deferred	$0.00
Regional Office Door Locks (office, storage, boat storage biuldings)	2	Regional Office	$20,000.00	$20,000.00		$0.00	Deferred	$0.00
REGION 4 Yuma								
Regional Office Pavement Maintenance	8	Regional Office	$90,000.00	$90,000.00		$87,005.00	Completed	$2,995.00
Regional Office Bay Door Locks	2	Regional Office	$20,000.00	$20,000.00		$20,000.00	Completed	$0.00
REGION 5 Tucson								
Regional Office Pavement Maintenance	8	Regional Office	$100,000.00	$100,000.00		$19,380.00	Completed	$80,620.00
Cluff Ranch Office Renovation	4	Wildlife Area	$36,000.00	$36,000.00		$26,157.00	Completed	$9,843.00
Cluff Ranch Bunkhouses Restroom Renovations	4	Wildlife Area	$37,000.00	$37,000.00		$36,772.00	Completed	$228.00
Whitewater Draw WA Domestic Well Refurbishment	8	Wildlife Area	$12,000.00	$12,000.00		$2,700.00	Completed	$9,300.00
Regional Office Entry Road Maintenance	8	Wildlife Area	$10,000.00		$10,000.00	$10,000.00	Completed	
REGION 6 Mesa								
Regional Office Pavement Maintenance	8	Regional Office	$75,000.00	$75,000.00		$0.00	Scheduled for Spring 2021	$0.00
Horseshoe WA Septic System Phase 1	8	Wildlife Area	$200,000.00	$150,000.00		$0.00	Completed	$0.00
Additional Cost for Horseshoe Ranch Septic System	8	Wildlife Area	$32,900.00		$32,900.00	$32,900.00	Completed	
HATCHERIES								
SHOOTING RANGES								
HEADQUARTERS								
Facilitiy Inventory and Assessment	3	Statewide Facilities	$125,000.00	$90,000.00		$0.00	Completed	$0.00
AGFD State Headquaters Major Maintence Fund	2	Administrative Office	$52,230.00	$52,230.00		$52,230.00	Deposited	$0.00
Set Aside Allocations								
Preventative Maintenance (8% of Appropriation)	3	Statewide Facilities	$83,499.00	$83,499.00		$2,880.00	Ongoing	$80,619.00
Emergency Allocation	1	Statewide Facilities	$75,000.00	$75,000.00		$4,500.00	Ongoing	$70,500.00
								$0.00
Totals:			**$1,343,629.00**	**$1,043,729.00**	**$102,900.00**	**$460,219.00**		**$254,105.00**
Balance								
CATAGORY CODES								
Fire & Life Safety	*1*			$80,000.00		$9,500		
Shell:Superstructure; Exterior Walls & Roofing	*2*			$176,230.00		$232,925		
Major Building Services	*3*			$173,499.00		$2,880		
Interiors:Interior Construction Stairs;Finishes	*4*			$87,000.00		$62,929		
Special Construction & controls; Hazardous Abatement	*5*							
ADA accessibility	*6*			$0.00				
Land Acquisition	*7*			$0.00				
Infrastructure & Building Sitework	*8*			$527,000.00		$151,985		
Energy Conservation	*9*			$0.00				
New Construction	*10*			$0.00				
Grand Totals				**$1,043,729.00**		**$460,219.00**		

STATE OF ARIZONA

Joint Committee on Capital Review

1716 WEST ADAMS
PHOENIX, ARIZONA 85007

(602) 926-5491

azleg.gov

DATE: December 9, 2020

TO: Members of the Joint Committee on Capital Review

FROM: Jeremy Gunderson, Senior Fiscal Analyst

SUBJECT: Arizona State Lottery Commission - Review of FY 2021 Building Renewal Allocation Plan

Request

A.R.S. § 41-1252 requires Committee review of expenditure plans for building renewal monies. The Arizona State Lottery Commission requests the Committee review its FY 2021 Building Renewal Allocation Plan. The FY 2021 Capital Outlay Bill appropriated $146,700 from the State Lottery Fund to the State Lottery Commission to fund 100% of the building renewal formula in FY 2021 for capital improvement projects.

Committee Options

The Committee has at least the following 2 options:

1. A favorable review of the request.

2. An unfavorable review of the request.

Under either option, the Committee may also consider the following provision:

A. The commission shall report any change in the building renewal spending plan to the Joint Committee on Capital Review Chairman and the JLBC Staff. If there is significant change of scope in the reallocation reported by the commission, the Chairman may require further Committee review.

(Continued)

Key Points

1) The Arizona State Lottery Commission is requesting review of a $146,700 expenditure plan for its FY 2021 building renewal appropriation.
2) The FY 2021 expenditure plan includes numerous projects, including $105,200 to replace 14-year old carpeting in the main Phoenix facility.

Analysis

The commission operates out of 4 facilities; a 38,500 square foot state-owned building in Phoenix, a 3,398 square foot leased building in Tucson, a 500 square foot location at Phoenix Sky Harbor Airport, and a new 440 square foot space in Kingman located in a Walmart store. The Phoenix facility includes administrative offices, tickets sales, and redemption centers. The other 3 locations offer ticket sales and redemption services. This request pertains only to the main building in Phoenix.

The Lottery Commission is requesting review of their $146,700 allocation plan that seeks to address 5 project areas identified at the Phoenix facility. Costs for each component of the plan are listed in *Table 1* below.

Table 1

Components of Building Renewal Plan

Walk-Up Window Covering	$ 7,500
New Emergency Door	10,000
Enlarge HVAC Access Gate	9,000
Enlarge Warehouse Rollup Door	15,000
Replace Building Flooring	105,200
Total Costs of Plan	**$146,700**

Walk-Up Window Covering
Due to the COVID-19 pandemic, the Commission has closed its lobby to visitors and installed a new walk-up window on the outside of the building for customers to purchase and redeem tickets. The walk-up window currently has a small covering. The Commission plans to spend $7,500 to replace the existing small covering, with larger corrugated metal roof panels and a rain gutter, which the Commission believes will more adequately shield customers from the weather elements.

New Emergency Door
The Commission plans to spend $10,000 to add a new emergency access door on the east side of the building. The building currently has 2 emergency access doors, in the front of the building and on the far north side of the warehouse. The location of the new emergency access door will be closer to the employee office space than the existing 2 doors. The door will be configured with badge access on the outside and a push bar on the inside.

Enlarge HVAC Access Gate
The agency plans to spend $9,000 to enlarge the opening and replace the access gate to 2 cooling towers on the north side of the building. According to the agency, an SRP box is located just inside the

(Continued)

gate, limiting the clearance space to the area beyond the box, including access to the HVAC cooling towers. To increase access, the agency would remove part of the surrounding fence, enlarge the rolling gate, and add a concrete ramp in front of the gate. These changes would make it easier for vendors to bring in equipment for maintenance and repairs, according to the agency.

Enlarge Warehouse Rollup Door

The Commission plans to spend $15,000 to enlarge a rollup access door on the north side of the warehouse. The project would include removing a portion of the brick wall that makes up the doorway and replacing the rollup door with a larger 10 feet by 11 feet rolling steel door. The larger access door would allow employees to more easily use their forklift to load items into the warehouse. According to the agency, the door was originally built with the intention of using smaller hand-operated pallet jacks and hand trucks.

Replace Building Flooring

The Commission is proposing to budget $105,200 to replace the existing carpet in the office area of the building. The existing carpet covers approximately 17,000 square feet and was installed in 2006. According to the agency the carpet is fraying, stained and is past its life expectancy of 10 years. The Commission has not yet determined what type of flooring to use to replace the carpet and indicates it may consider vinyl flooring instead of carpet depending on the cost, maintenance and life expectancy.

JG:kp

Douglas A. Ducey
Governor

Gregory R. Edgar
Executive Director

November 13, 2020

The Honorable Regina E. Cobb, Chairman
Joint Legislative Budget Committee
Arizona House of Representatives
1700 W. Washington Street
Phoenix, AZ 85007

The Honorable David M. Gowan, Vice-Chairman
Joint Legislative Budget Committee
Arizona State Senate
1700 W. Washington Street
Phoenix, AZ 85007

Re: JCCR Agenda Request

Dear Representative Cobb:

The Arizona Lottery respectfully requests placement on the JCCR meeting agenda for the December 16, 2020 meeting to review the Lottery FY21 Building Renewal Allocation Plan.

A.R.S. §41-1252 requires Committee review of expenditure plans for building renewal monies.

Information of this item is attached.

Sincerely,

Gregory R. Edgar
Executive Director

Attachment

cc: Darbi Jenkins, Deputy Director of Legislative Affairs
Richard Stavneak, Director, JLBC
Jeremy Gundersn, Lottery Analyst, JLBC
Matthew Gress, Director, OSPB
Zachary Milne, Analyst, OSPB

Arizona Lottery – Building Renewal Funds
FY21 Allocation Plan

Background

The Arizona Lottery operates out of four facilities – a 38,500 sq. ft. building constructed in 1987, owned by the State of Arizona, located in Phoenix, a 3,398 sq. ft. building leased in Tucson, a 500 sq. ft. airport location, and most recently a 440 sq. ft. Kingman location housed within a local Walmart. The Phoenix facility includes administrative offices as well as a ticket sales and redemption section. The Tucson, airport, and Kingman offices provides ticket sales and redemption services and the Tucson office also includes office space for the district sales manager. This plan provides information on proposed maintenance expenses for the Phoenix facility.

Allocation

As part of the FY21 approved budget, the Lottery received a capital outlay appropriation of $146,700 from the Lottery Fund for building renewal purposes.

FY21 Capital Outlay/Building Renewal Allocation:	$146,700
Proposed FY21 Expenditures –	
Walk-Up Window Covering	7,500
Additional Emergency Door	10,000
HVAC Access Roll Gate/Ramp	9,000
Warehouse Rollup Door	15,000
Replace Building Flooring	105,200
TOTAL:	$146,700

Cost estimates were either supplied by state-contracted vendors or provided by ADOA. All projects are funded from the Lottery Fund - no General Funds monies are impacted.

1. **Walk-Up Window Covering - $7,500**

The Lottery implemented adjustments to customer-related operations as a result of COVID-19. This included installing an exterior walk-up window for customers to conduct transactions since lobby access was available by appointment only. The window is located on the west outside wall in the front of the building, but currently only has a minimal overhead covering. This means customers are subject to weather conditions while waiting outside to conduct transactions.

Proposed Solution

Construct a covering over the existing window to protect customers from weather conditions. The proposed covering would be corrugated metal roof panels with metal framework. Construction would also include a rain gutter to provide appropriate drainage.

Principal Benefits

The principal benefit is to provide protection for Lottery customers while conducting transactions. Under normal conditions, players can also conduct transactions in the lobby. However, at this time the building lobby remains closed and the covering will provide a more comfortable experience for Lottery customers.

2. **Additional Emergency Door - $10,000**

The Lottery Phoenix office building is structured in a semi-circular configuration (see attached diagram). Although there are exit doors/stairwells located in the front of the building, as well as

exits on the far side of the warehouse, there are currently no access doors located near the curved section of the building on the east side. This portion of the building serves as employee office space, and in the event of emergency, employees in this area must exit via the front door or through the far side of the warehouse. Installing an emergency/side door near this area will provide an additional exit point.

Proposed Solution

Create a first floor emergency/side door in the east side of the Lottery building located just inside the warehouse (and outside the last office space). Similar to other building entrances, the door would be configured with a push bar on the inside and badge access outside for security purposes. There is already an indoor building security camera stationed in that area that can provide video coverage.

Principal Benefits

The primary benefit would be an additional exit location for Lottery staff in event of emergency. As a lesser benefit, the door would provide a means for facilities staff to access Lottery grounds on the east side of the building.

3. HVAC Access Roll Gate/Ramp - $9,000

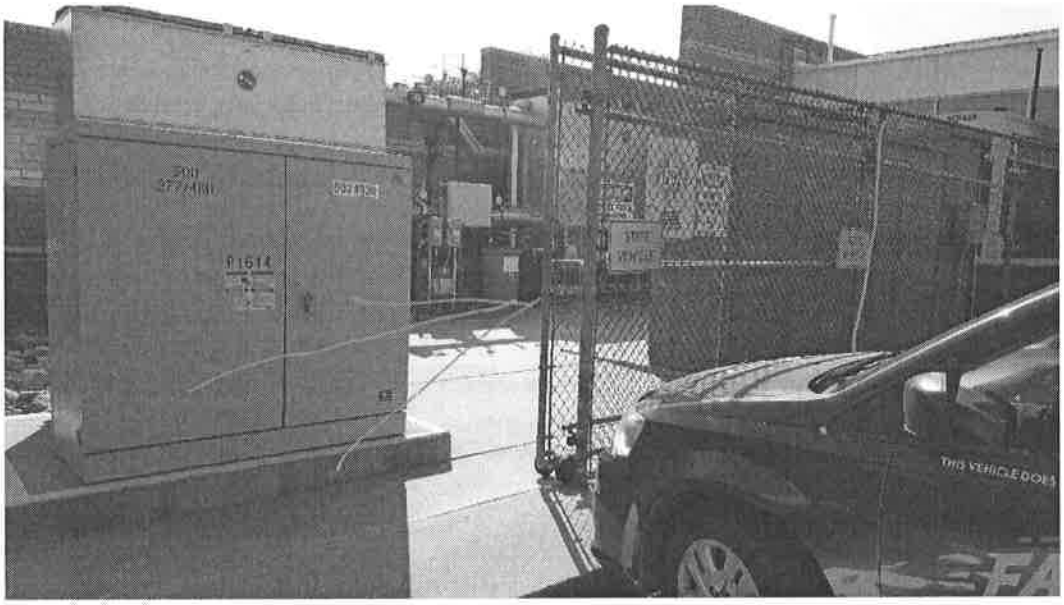
The Lottery Phoenix office has outside cooling towers and other HVAC equipment that is accessed by a rolling gate. The current configuration makes entry difficult – an SRP box is located just inside the gate entrance, allowing for only minimal clearance and access to the area beyond. This makes it very difficult to conduct maintenance or repairs on the cooling towers, especially if equipment is required. This entrance should be expanded to allow easier access to these systems.

Proposed Solution

Widen and expand the existing roll gate to create a larger opening. This would involve removing a section of existing fence and enlarging the rolling gate. In addition, a concrete ramp would be installed in front of the gate using the adjacent parking lot area to allow easier access for any equipment needs.

Principal Benefits

Reconfiguring outside access to HVAC equipment will make it easier for vendors and Lottery facilities staff to conduct maintenance and repairs. These services have been difficult in the past, especially when equipment must be brought in to do the necessary work.



4. Warehouse Rollup Door - $15,000

The Lottery warehouse area currently has a rollup door located on the north outside wall. To facilitate better workflow, the door area needs to be enlarged. At the time the building was constructed, deliveries were primarily moved via pallet jacks or hand trucks. The Lottery now has a forklift that is used for many deliveries and the forklift will not clear the door when loaded and raised. The Lottery receives deliveries on a routine basis for advertising/promotional purposes and the current door configuration is not efficient for day-to-day operations.

Proposed Solution

Enlarge the existing rollup door on the north side of the warehouse. This involves removing a portion of the brick wall and installing a new 10' x 11' custom rolling steel frame and door.

Principal Benefits

The primary benefit would be improved efficiency for unloading deliveries or moving items in/out of the warehouse. Another advantage is that the door would now be large enough to accommodate the Lottery promotions ticket van if indoor storage were necessary.

5. Replace Building Flooring - $105,200

The carpeting in the Lottery Phoenix office building was last replaced in 2006 and is showing signs of wear. Although routine cleaning is conducted to prolong the life of the existing carpet, there are areas that have become frayed and permanently stained over the years. The life expectancy for commercial carpet is about 10 years on the high end, with an average of 7 years. The Lottery's carpeting is well past that life expectancy and should be considered for replacement within the next couple of years.

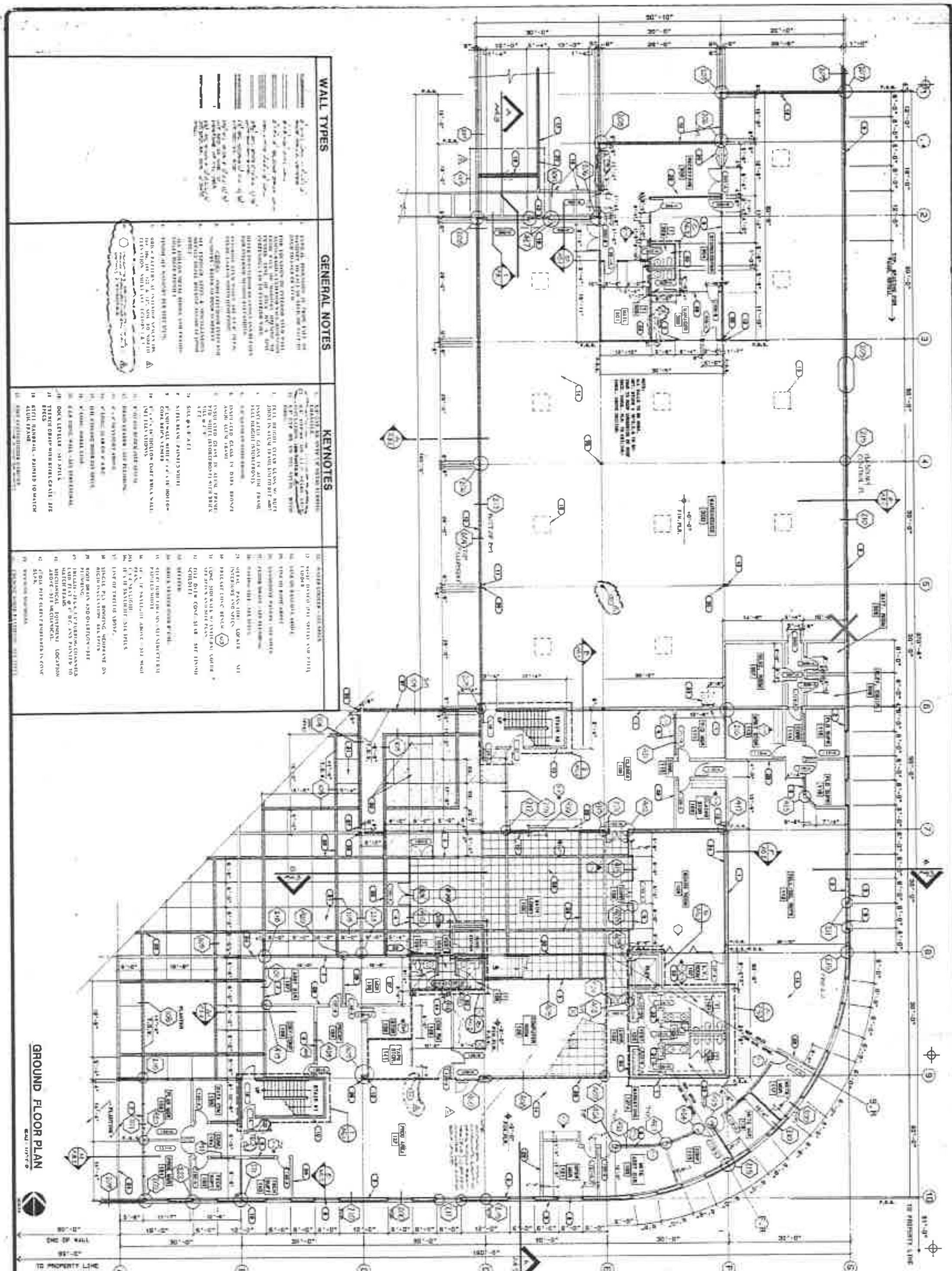
Proposed Solution

Remove and replace the existing building flooring for the Phoenix Lottery office, approximately 17,000 sq. ft. The exact type of flooring will be determined later and may include consideration of other flooring material such as vinyl if the cost, maintenance, and life expectancy are comparable or

better than carpeting. The cost estimate includes lifting and moving of existing furniture and cubicles.

Principal Benefits

The principal benefit would be to provide a healthier workplace environment for employees. Carpet is an item that requires replacement after a period of time. Even with periodic cleaning, carpeting builds up dust and dirt over time which are subsequently released into the air. Carpet replacement will also reduce the potential trip hazard created by frayed areas.



A2.1	NOTED	10145.00 APRIL 14, 1988 BB BW OH BB FIRST FLOOR PLAN	ARIZONA LOTTERY 4740 E. UNIVERSITY DRIVE PHOENIX, ARIZONA	PETER A. LENDRUM ASSOCIATES ARCHITECTS ENGINEERS PLANNERS