EXECUTIVE SUMMARY

Item Name: FY 2020 Capital Development Plan (ASU)

☑ Action Item

Requested Action: Arizona State University (ASU) asks the board for authorization of its $71.2 million Annual Capital Development Plan (CDP), which includes four new projects, as described in this executive summary. This annual CDP does not include any third-party projects.

Previous Board Action

- FY 2021-2023 Capital Improvement Plan September 2019
  - Building and Infrastructure Enhancements and Modifications
  - Classroom and Academic Renovations
  - Research Laboratories and Faculty Startup

- Amended Capital Development Plan June 2018
  - Novus Place Parking Structure

Prior Year Activity

- One third-party capital project was substantially completed in the last twelve months.

- Fifteen capital projects, totaling $857.35 million, began or were under construction in the last twelve months. Additionally, two third-party projects began construction activity in the last twelve months.

- Details on completed and ongoing capital projects are listed in Exhibit 1.

Overview and Alignment with Enterprise and University Goals and Objectives

- The ASU Annual CDP includes four new projects totaling $71.2 million.

- ASU has developed this Annual CDP to align with the university’s campus master plan and the System and university strategic goals and objectives.

- These primary institutional priorities are supported by the projects proposed in this Annual CDP:

Contact Information:
Morgan R. Olsen, ASU Morgan.R.Olsen@asu.edu 480-727-9920
Academic Success: The proposed projects will contribute to advancing the university’s twin pillars of academic success—leadership in academic excellence and accessibility and establishing national standing in academic quality. These projects will provide essential support to achieving these goals and metrics by 2025:
- Increase total student enrollment to 125,000.
- Improve the freshman retention rate to 90 percent.
- Increase the six-year graduation rate to 75 percent.
- Increase the number of bachelor’s degrees awarded to 21,430 and graduate degrees to 10,670.

Research and Development: The proposed projects will support the university’s research goals, including the enhancement of its research competitiveness to more than $815 million in annual research expenditures by 2025. University research expenditures are used in part to advance the state of knowledge in various fields; purchase local goods and services; help create new companies and jobs; support the development of next-generation scientists and innovators; and attract top research talent to the faculty. Research and development expenditures also support the state’s competitive advantage in the fields of science, technology and medicine.

Campus Operations and Infrastructure Priorities: To advance the university’s academic and research goals, its facilities and related infrastructure must be maintained in a safe and reliable operational condition. Buildings and utility systems also must be cost-effective to maximize the use of the university’s operational funds over time.

Life Safety and Code Compliance: Life safety and code compliance issues must be resolved promptly and assume the highest priority in ensuring the safety and security of students, faculty, staff and visitors, as well as supporting the achievement of the university’s academic and research goals.

Community Service: Serving Arizona communities is an integral aspect of the university’s mission and its programs. Enhancing and expanding the university’s local impact and social embeddedness is vital to improving the quality of life and economic prosperity in Arizona.

Student Support and Engagement: The proposed projects will support the advancement of the university’s mission to enhance student development and learning to national leadership levels. These projects will foster student engagement in programs, events and activities that will enhance their learning and personal
development by connecting them with their campus and community, building leadership skills, and preparing them for academic, personal and career success.

**Capital Development Plan Projects**

- Following are the new projects proposed for Annual CDP approval:
  - Building and Infrastructure Enhancements and Modifications
  - Classroom and Academic Renovations
  - Research Laboratories/Faculty Startup
  - Novus Place Parking Structure Expansion

- Additional details on project costs, financing and scope are included in the tables in Exhibits 2 and 3 and the attached individual Project Justification Reports.

**Fiscal Impact and Management**

- This ASU CDP, if fully implemented, will cost a total of $71.2 million.

- Of the total amount, $55.0 million will be debt-financed with system revenue bonds. The university will internally fund $16.2 million with auxiliary revenue and amortize the cost over an approximate thirty-year term.

- The incremental total annual operating and maintenance (O&M) cost associated with the projects in this CDP is estimated to be $32,275. ASU plans to use auxiliary revenues to pay the O&M cost.

- ASU will:
  (a) sell one or more series of System Revenue Bonds to finance the project, as identified in Exhibit 2, costs of issuance, and payments to a bond insurer or other credit enhancer, provided such payments result in a benefit that exceeds the amount of such payments;
  (b) sell bonds at a price at, above or below par, on a tax-exempt or taxable basis, in one or more series, at a fixed or variable rate of interest; and
  (c) enter into necessary agreements, including those related to bond insurance or other credit enhancement agreements.
  (d) ASU intends to utilize a financial advisor, bond counsel and bond trustee for the financing. The system revenue bonds will be marketed and sold on a negotiated basis, either to one or more investment banking firms currently in a pool of bond underwriters procured by the three state universities or by the State of Arizona or by a direct sale to a bank or banks or other financial institutions.
EXECUTIVE SUMMARY

- **Debt Ratio Impact:** Based upon the projects included in this CDP and the first year of the CIP, the university’s projected debt ratio is expected to reach its maximum in FY 2023 at 5.1 percent excluding SPEED debt and 5.4 percent including SPEED debt.

- The tables in Exhibits 2 and 3 provide details on project financing, funding sources and debt ratio impact.

Committee Review and Recommendation

The Finance, Capital and Resources Committee reviewed this item at its January 30, 2020 meeting and recommended forwarding to the full board for approval.

Statutory and Policy Requirements

- Pursuant to Arizona Board of Regents policy number 7-107 (B), each university shall submit an annual Capital Development Plan for the upcoming twelve-month period in accordance with the calendar approved by the executive director of the board.

- Capital Development Plans are reviewed by the Finance, Capital and Resources Committee and are approved by the board.

- Capital Development Plan approval authorizes the university to complete design and planning, execute construction and financing agreements, and begin construction, as outlined in policy.
**Arizona State University Capital Project Status Report**

<table>
<thead>
<tr>
<th>Project Name</th>
<th>Gross Square Feet</th>
<th>Total Budget</th>
<th>Direct Construction Budget</th>
<th>Percent Work Completed</th>
<th>Percent to Gift Target</th>
<th>Date Last Board Approval</th>
<th>Original/Revised Occupancy Date</th>
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<td>N/A</td>
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<td>2/1/2022</td>
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<td>1/15/2021</td>
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<td>N/A</td>
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<td>12/31/2021</td>
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<td>Classroom and Academic Renovations</td>
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<td>$7,500,000</td>
<td>32</td>
<td>N/A</td>
<td>11/15/2018</td>
<td>5/31/2021</td>
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<td>Durham Language and Literature Building Renovation</td>
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<td>$65,000,000</td>
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<td>$12,950,000</td>
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<td>Health Futures Center</td>
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<td>N/A</td>
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<td>Interdisciplinary Science and Technology Building (ISTB) 7</td>
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<td>Research Laboratories and Faculty Startup</td>
<td>40,000</td>
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<td>$10,400,000</td>
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<td>5/31/2021</td>
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<td>Thunderbird School of Global Management</td>
<td>111,000</td>
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<td>7/31/2021</td>
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<td>Wells Fargo Arena Renovation and New Multi-Purpose Arena</td>
<td>405,000</td>
<td>$160,000,000</td>
<td>$113,100,000</td>
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<td>2/8/2018</td>
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<td><strong>Ongoing Third-Party Projects</strong></td>
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<td>Downtown Phoenix Residence Hall and Entrepreneurial Center</td>
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<td>Polytechnic New Residence Hall</td>
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<td>8/1/2020</td>
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<td>Sun Devil Energy Center, LLC</td>
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<td>N/A</td>
<td>6/7/2017</td>
<td>5/22/2019</td>
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</tbody>
</table>

1. Percent of work completed is calculated by dividing the actual project duration from the construction phase start date to this report date by the total project duration through substantial completion.
### EXHIBIT 2

**Arizona State University Annual Capital Development Plan**

<table>
<thead>
<tr>
<th>Project</th>
<th>Board Approval Status</th>
<th>Gross Square Footage</th>
<th>Project Cost</th>
<th>Amount Financed</th>
<th>Funding Method</th>
<th>Annual Debt Service</th>
<th>Debt Ratio</th>
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<tbody>
<tr>
<td><strong>New Academic/Support Projects</strong></td>
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<tr>
<td>ASU–Building and Infrastructure Enhancements and Modifications</td>
<td>CIP Sept. 2019</td>
<td>N/A</td>
<td>$20,000,000</td>
<td>$20,000,000</td>
<td>System Revenue Bonds</td>
<td>$1,471,600</td>
<td>0.05%</td>
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<tr>
<td>ASU–Classroom and Academic Renovations</td>
<td>CIP Sept. 2019</td>
<td>50,000</td>
<td>$15,000,000</td>
<td>$15,000,000</td>
<td>System Revenue Bonds</td>
<td>$1,103,700</td>
<td>0.03%</td>
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<tr>
<td>ASU–Research Laboratories and Faculty Startup</td>
<td>CIP Sept. 2019</td>
<td>40,000</td>
<td>$20,000,000</td>
<td>$20,000,000</td>
<td>System Revenue Bonds</td>
<td>$1,471,600</td>
<td>0.05%</td>
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<td><strong>New Academic/Support Project Total</strong></td>
<td></td>
<td>90,000</td>
<td>$55,000,000</td>
<td>$55,000,000</td>
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<td>$4,046,900</td>
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<td><strong>New Auxiliary Project</strong></td>
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<td>ASUT - Novus Place Parking Structure Expansion</td>
<td>Amended CDP June 2018</td>
<td>179,770</td>
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<td><strong>New Auxiliary Project Total</strong></td>
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<td>179,770</td>
<td>$16,200,000</td>
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<td>$4,046,900</td>
<td>0.13%</td>
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### Capital Development Plan–Annual Debt Service by Funding Source

<table>
<thead>
<tr>
<th>Project</th>
<th>Amount Financed</th>
<th>CIF</th>
<th>TUI</th>
<th>AUX</th>
<th>ICR</th>
<th>OLF</th>
<th>SLP</th>
<th>FGT</th>
<th>DFG</th>
<th>OTH</th>
<th>Total Annual Debt Service</th>
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<td><strong>New Academic/Support Projects</strong></td>
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<tr>
<td>ASU–Building and Infrastructure Enhancements and Modifications</td>
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<td>$1,471,600</td>
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<td>$1,471,600</td>
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<tr>
<td>ASU–Classroom and Academic Renovations</td>
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<td><strong>New Academic/Support Projects Total</strong></td>
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<td><strong>Total CDP</strong></td>
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#### Annual Capital Development Plan – Operation and Maintenance By Funding Source

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<tr>
<th>Project</th>
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<th>AUX</th>
<th>ICR</th>
<th>OLF</th>
<th>GFA</th>
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<th>DFG</th>
<th>OTH</th>
<th>Total Annual 0&amp;M</th>
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<td><strong>New Academic/Support Projects</strong></td>
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<td>ASU–Research Laboratories and Faculty Startup</td>
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<td>ASU–Novus Place Parking Structure Expansion</td>
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<td>$0</td>
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**Funding Source Codes:**
- CIF: Capital Infrastructure Fund
- TUI: Tuition
- AUX: Auxiliary
- ICR: Indirect Cost Recovery
- OLF: Other Local Funds
- GFA: General Fund Appropriation
- FGT: Federal Grant
- DFG: Debt Financed by Gifts
- OTH: Other
PURPOSE

To demonstrate Arizona State University’s ability to finance additional capital investment through debt instruments and to fund the related debt service (principal and interest).

PROJECTED DEBT CAPACITY

Based upon the projects included in this CDP and the first year of the CIP, the maximum projected debt ratio is 5.1 percent in FY 2023. Outstanding debt in FY 2023 is projected to be $2.12 billion, with total annual debt service of $173.9 million. The 5.1 percent ratio is within the range used by credit rating firms to confirm an institution’s creditworthiness and is below the 8 percent statutory maximum.

Currently outstanding (issued) debt declines from $1.7 billion in FY 2020 to $1.0 billion in FY 2028 as debt is retired. Planned debt includes future financings of projects presented in this annual CDP and those included in the first year of the 2021-2023 CIP. Additional debt capacity represents debt that can be issued in any given year based on the statutory 8 percent debt ratio maximum.

FUTURE PROJECTS

Future debt-financed projects include those in this annual Capital Development Plan (CDP), and those included in the first year of the FY 2021-23 Capital Improvement Plan (CIP). These projects are included in the future debt capacity assumptions.
CREDIT RATINGS

Positive rating factors cited by the credit rating agencies include ASU’s rapid growth and increasing brand recognition, solid donor support, robust revenue growth, good budgetary oversight, consistent operating surpluses, healthy cash flow, strategic reinvestment, and stable debt service support from the State of Arizona.

Offsetting factors identified by the agencies include comparatively higher financial leverage, narrow reserves relative to debt, weak state funding, and limited revenue diversity.

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Moody's Rating</th>
<th>Moody's Outlook</th>
<th>Standard &amp; Poor's Rating</th>
<th>S&amp;P Outlook</th>
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RATIO OF DEBT SERVICE TO TOTAL EXPENSES

Annual debt service on system revenue bonds and certificates of participation (COPs) is projected to increase from $120.6 million in FY 2019 to a maximum of $174.2 million in FY 2024. The projected ratio of debt service to total expenses is expected to reach its highest point in FY 2023, at 5.1 percent.

SPEED (Stimulus Plan for Economic and Educational Development) bonds are funded up to eighty percent by state lottery revenues, with the balance funded by the University. SPEED debt service is excluded from the statutory debt ratio, but if SPEED debt service of $11.9 million is included, the highest projected debt ratio increases to 5.4 percent.
Exhibit A
Arizona State University
Tempe Campus Site Location Map

ANNUAL CAPITAL DEVELOPMENT PLAN

NEW PROJECT
NOVUS PLACE PARKING STRUCTURE EXPANSION
Arizona Board of Regents
Arizona State University
Annual Capital Development Plan–Project Justification Report
Building and Infrastructure Enhancements and Modifications

Previous Board Action

- FY 2021-2023 Capital Improvement Plan September 2019

Project Justification/Description/Scope

- This project bundle will address the university’s primary areas of concern for buildings and infrastructure at all campuses, such as the upgrade and replacement of aging mechanical, electrical, plumbing and other critical building systems, the renewal of aging elevators and the repair and replacement of timeworn roofs.

- Many components of the ASU built environment have exceeded their useful life and are incapable of effectively supporting the advancement of the university’s mission of academic and research excellence. The planned projects will ensure the efficient, reliable and safe operation of all essential campus infrastructure and systems, including those that must continue without interruption to support the university’s critical academic and research initiatives.

- These projects not only will enhance the quality of the campus infrastructure and systems, but also will keep the university in compliance with code requirements and address ABOR directives to reduce deferred maintenance. Projects essential for life safety, code compliance and the advancement of university strategic initiatives will be given top priority.

Project Delivery Method and Process

- Depending on the nature of the work, components of this project bundle may be delivered through the Design Build (DB), Construction Manager at Risk (CMAR) or Job Order Contracting (JOC) methods.

- ASU has not yet selected a DB, CMAR, JOC contractor or design professional firm for any components of this project bundle. Contractors and design professionals will be selected according to ABOR policy and Arizona law.
Project Status and Schedule

Design Professionals (DPs) will be selected after CDP approval. The project design will be completed approximately six to twelve months after the DP contract has been awarded for that component of work.

- General construction is scheduled to begin when the design is complete and after all approvals are in place. Construction on all project components is targeted for completion by February 2023.

Project Cost

- The total budget for this project bundle is $20.0 million.

- Independent cost estimates will be provided by the DP, DB, CMAR or JOC contractor after these selections are complete.

- For projects selected to use the DB or CMAR delivery method, the construction manager will be at risk to provide the completed project within the agreed-upon Guaranteed Maximum Price (GMP).

Fiscal Impact and Financing Plan

- This $20.0 million project bundle will be funded with system revenue bond proceeds. The annual debt service of approximately $1.47 million will be funded by tuition.

- There are no expected increases in operation and maintenance costs associated with this project bundle.

- Debt Ratio Impact: The projected incremental debt ratio impact for this project bundle is 0.05 percent.

Occupancy Plan

- These projects will not affect occupancy or programs but will renew building and campus infrastructure and support the advancement of the university’s academic and research initiatives.
Statutory/Policy Requirements

- ABOR Policy 7-102 (B) requires that 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.
Capital Project Information Summary

**University:** Arizona State University  **Project Name:** Building and Infrastructure Enhancements and Modifications

**Project Description and Location:** This project bundle will address the university’s primary building and infrastructure areas of concern at all campuses, such as the upgrade and replacement of aging mechanical, electrical, plumbing and other critical building systems, the renewal of aging elevators and the repair and replacement of timeworn roofs.

**Project Schedule:**
- Planning: February 2020
- Design Start: February 2020
- Construction Start: February 2020
- Construction Completion: February 2023

**Project Budget:**
- Total Project Cost: $20,000,000
- Total Project Construction Cost: $14,000,000
- Total Project Cost per GSF: N/A
- Construction Cost per GSF: N/A

**Change in Annual O & M Cost:**
- Utilities: $0
- Personnel: 0
- All Other Operating: 0
- Subtotal: $0

**Funding Sources:**
**Capital:**
- System Revenue Bonds: $20,000,000
- Debt Service Funding Sources: Tuition

**Operation/Maintenance:**
- $0

**Funding Sources:** Not Applicable
Arizona Board of Regents
Arizona State University
Annual Capital Development Plan–Project Justification Report
Classroom and Academic Renovations

Previous Board Action
- FY 2021-2023 Capital Improvement Plan September 2019

Project Justification/Description/Scope
- ASU intends to renovate existing classrooms, create new classrooms of various sizes and add smaller instructional spaces at all campuses. This project bundle will include the renovation of approximately 50,000 gross square feet of university classroom and academic space. Building components, such as heating, ventilation and air conditioning (HVAC), plumbing and electrical systems, flooring, ceilings, roofs, windows, doors, internal walls and partitions, elevators, and fire prevention equipment may be upgraded in these projects. These projects will comprise multiple components at each ASU campus.

- The ASU Strategic Enterprise Framework identifies several goals that will be supported by this project bundle, including improved retention and graduation performance, curricular reform, and improved student outcomes. The resources needed to achieve these goals include a continued investment in faculty and in space renovations that will support teaching innovations and better student and faculty interactions. These projects will renovate worn areas that distract from teaching and learning effectiveness and create updated and growth spaces for academic programs to enable student learning and success.

- The components of this project bundle will enhance the quality of the built environment, provide improved space for faculty and a better classroom experience for students, comply with code requirements for safety, and reduce deferred maintenance. Project components essential for life safety, code compliance and those that support university strategic initiatives will be given top priority.

Project Delivery Method and Process
- Depending on the nature of the work, components of this project bundle may be delivered through either the Construction Manager at Risk (CMAR) or Job Order Contracting (JOC) method.
EXECUTIVE SUMMARY

- ASU has not yet selected a CMAR, JOC contractor or design professional firm for any components of this project bundle. Contractors and design professionals will be selected according to ABOR policy and Arizona law.

Project Status and Schedule
- Design Professionals (DPs) will be selected after CDP approval. The design will be completed within approximately six to nine months after the DP contract is awarded.

- General construction for these projects is scheduled to begin when the design is complete and after all approvals are in place. Construction on all project components is targeted for completion by February 2023.

Project Cost
- The total budget for this project bundle is $15.0 million. This budget represents an estimated construction cost of $225 per gross square foot. The estimated total project cost is $300 per gross square foot.

- For this CDP phase, no preliminary external cost estimates have been provided by third-party consultants. DP and CMAR or JOC contractor teams have not yet been selected for these projects. Independent cost estimates will be provided by the DP, CMAR or JOC contractor after these selections are complete.

- For projects selected to use the CMAR delivery method, the construction manager will be at risk to provide the completed project within the agreed-upon Guaranteed Maximum Price (GMP).

Fiscal Impact and Financing Plan
- This $15.0 million project bundle will be funded with system revenue bond proceeds. The annual debt service of approximately $1.1 million will be funded by tuition.

- There are no expected increases in operation and maintenance costs associated with this project bundle.

- Debt Ratio Impact: The projected incremental debt ratio impact for this project bundle is 0.03 percent.
Occupancy Plan
- These project components will reconfigure and renew spaces for classroom and academic areas. Programs may be temporarily displaced as spaces are renovated.

Statutory/Policy Requirements
- ABOR Policy 7-102 (B) requires that 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.
Capital Project Information Summary

University: Arizona State University  Project Name: Classroom and Academic Renovations

Project Description and Location: This project bundle includes the renovation of approximately 50,000 gross square feet of classrooms and academic space, including faculty and student space at all campuses. Building components, such as HVAC, plumbing and electrical systems, flooring, ceilings, roofs, windows, doors, internal walls and partitions, elevators, and fire prevention equipment may be upgraded in these projects.

Project Schedule:
- Planning: February 2020
- Design Start: February 2020
- Construction Start: February 2020
- Construction Completion: February 2023

Project Budget:
- Total Project Cost: $15,000,000
- Total Project Construction Cost: $11,250,000
- Total Project Cost per GSF: $300
- Construction Cost per GSF: $225

Change in Annual O & M Cost:
- Utilities: $0
- Personnel: 0
- All Other Operating: 0
- Subtotal: $0

Funding Sources:
- Capital
  - A. System Revenue Bonds: $15,000,000
  - Debt Service Funding Sources: Tuition
  - Operation/Maintenance: $0
  - Funding Sources: Not applicable
Previous Board Action

- FY 2021-2023 Capital Improvement Plan    September 2019

Project Justification/Description/Scope

- Approximately 40,000 gross square feet of existing laboratory spaces at all campuses will be renovated in this project bundle to meet the requirements of the university’s new and current research initiatives. Multiple wet and dry lab spaces, as well as infrastructure and building systems, will be upgraded to maximize adaptable and flexible technologies. Renovation activities will involve building systems, such as heating, ventilation and air conditioning (HVAC), electrical and mechanical, as well as fume hoods, laboratory gas lines, and code-required life safety upgrades.

- Many existing university laboratories and building systems are inadequate, due to age and the requirements of emerging technologies. The poor condition of these spaces and the age of the building systems constrain the development of these strategically important areas. This project bundle will ensure the university’s facility systems meet its research demands and these areas are maintained in code compliance. These projects will convert inadequate classroom laboratories, research laboratories and research building systems into state-of-the-art facilities.

- Increasing research activity and the resultant arrival of new faculty continue to make laboratory renovation projects an imperative. Spaces must be updated and renovated to address the needs of incoming researchers and support successful grant applications. These laboratories will provide the core infrastructure required to enable faculty and students to compete in the global marketplace of ideas, not only stimulating advances in science and human health, but also potentially advancing the regional economy.

- The university’s 2012 Master Plan Update identified a need for additional research space totaling 350,000 gross square feet. This project bundle will contribute to meeting the need for additional research space and accomplishing the goal of establishing the university as a leading global center for interdisciplinary research, discovery and development by 2025.
Project Delivery Method and Process
- Depending on the nature of the work, components of this project bundle may be delivered through either the Construction Manager at Risk (CMAR) or the Job Order Contracting (JOC) methods.

- ASU has not yet selected a CMAR, JOC contractor or design professional firm for any components of this project bundle. Contractors and design professionals will be selected according to ABOR policy and Arizona law.

Project Status and Schedule
- Design Professionals (DPs) will be selected after CDP approval. Design completion is targeted for approximately six to nine months after the DP contract is awarded.

- General project construction is scheduled to begin when the design is complete and after all approvals are in place. Construction on all project components is targeted for completion by February 2023.

Project Cost
- The total budget for this project bundle is $20.0 million. This budget represents an estimated construction cost of $350 per gross square foot. The estimated total project cost is $500 per gross square foot.

- For this CDP phase, no preliminary external cost estimates have been provided by third-party consultants. DP and CMAR or JOC contractor teams have not been selected for these project components. Independent cost estimates will be provided by the DP, CMAR or JOC contractor after these selections are complete.

- For project components selected to use the CMAR delivery method, the construction manager will be at risk to provide the completed project within the agreed-upon Guaranteed Maximum Price (GMP).

Fiscal Impact and Financing Plan
- This $20.0 million project bundle will be funded with system revenue bond proceeds. The annual debt service of approximately $1.47 million will be funded by tuition.

- There are no expected increases in operation and maintenance costs associated with this project bundle.
• **Debt Ratio Impact:** The projected incremental debt ratio impact for this project bundle is 0.05 percent.

**Occupancy Plan**

• These project components will not affect occupancy or programs but will renew research spaces and support the advancement of the university’s research initiatives.

**Statutory/Policy Requirements**

• ABOR Policy 7-102 (B) requires that 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.
Capital Project Information Summary

**University:**  Arizona State University  **Project Name:** Research Laboratories and Faculty Startup

**Project Description and Location:** This project bundle will involve the renovation of approximately 40,000 gross square feet of existing laboratory space required to establish the university as a leading global center for interdisciplinary research and discovery. Multiple wet and dry lab spaces, as well as infrastructure and building systems, will be upgraded to maximize adaptable and flexible technologies.

**Project Schedule:**

<table>
<thead>
<tr>
<th>Task</th>
<th>Start Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>Planning</td>
<td>February 2020</td>
</tr>
<tr>
<td>Design Start</td>
<td>February 2020</td>
</tr>
<tr>
<td>Construction Start</td>
<td>February 2020</td>
</tr>
<tr>
<td>Construction Completion</td>
<td>February 2023</td>
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</table>

**Project Budget:**

<table>
<thead>
<tr>
<th>Cost Category</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Project Cost</td>
<td>$ 20,000,000</td>
</tr>
<tr>
<td>Total Project Construction Cost</td>
<td>$ 14,000,000</td>
</tr>
<tr>
<td>Total Project Cost per GSF</td>
<td>$ 500</td>
</tr>
<tr>
<td>Total Construction Cost per GSF</td>
<td>$ 350</td>
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</table>

**Change in Annual O & M Cost:**

<table>
<thead>
<tr>
<th>Category</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Utilities</td>
<td>$ 0</td>
</tr>
<tr>
<td>Personnel</td>
<td>0</td>
</tr>
<tr>
<td>All Other Operating</td>
<td>0</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td>$ 0</td>
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</table>

**Funding Sources:**

**Capital**

<table>
<thead>
<tr>
<th>Source</th>
<th>Amount</th>
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<tr>
<td>A. System Revenue Bonds</td>
<td>$ 20,000,000</td>
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<tr>
<td>Debt Service Funding Sources:</td>
<td>Tuition</td>
</tr>
<tr>
<td>Operation/Maintenance</td>
<td>$ 0</td>
</tr>
<tr>
<td>Funding Sources:</td>
<td>Not Applicable</td>
</tr>
</tbody>
</table>
Arizona Board of Regents  
Arizona State University  
Annual Capital Development Plan–Project Justification Report  
Novus Place Parking Structure Expansion

Previous Board Action
- Amended Capital Development Plan       June 2018

Project Justification/Description/Scope
- The proposed project will construct an expansion of the multi-level parking structure now under construction near the northwest corner of University Drive and Rural Road in Tempe, within the Novus Innovation Corridor. Two floors and approximately 524 parking spaces will be added to this structure to address the university’s essential need for expanded parking capacity on the Tempe campus. The project site location is depicted on the attached map as Exhibit B.

- The Novus Innovation Corridor includes more than seven million square feet of forward-focused development designed to transform north Tempe into a global-caliber, mixed-use urban destination. Phase 3 of the Novus Innovation Corridor includes three mid-rise, Class A commercial office buildings that will enable the university to connect world-class research with commerce and practical business applications to fuel economic growth.

- This ASU-owned parking structure will provide the essential parking capacity required to support community engagement in the events and activities scheduled at the Desert Financial Arena, the planned new multi-purpose arena and the Sun Devil Stadium 365 Community Union. Additionally, the structure will provide capacity to support the new Interdisciplinary Science and Technology Building (ISTB) 7, which will connect to the Novus Innovation Corridor via a future pedestrian bridge.

- This parking structure also will provide parking capacity for the tenants of the three adjacent mid-rise office buildings, the restaurants and retail operations located in each of the office buildings, and the hotel planned for the northeast corner of Veterans Way and Sixth Street.

- This multi-level parking structure was designed with an option to expand capacity, as needed. Since this structure is currently in the construction phase, the university has determined that proceeding with plans to expand it to its essential capacity at this time provides the most cost-effective option. Additionally, expanding the structure during the project’s construction phase will mitigate the disruption to university
programs and events, as well as the operations of the adjacent office buildings, restaurants and retail establishments that are currently in development.

- This structure has been designed for an anticipated useful life of at least fifty years and constructed of high-quality, durable materials and building systems to minimize operational, repair and replacement costs. Additionally, energy-efficient, sustainable components will be integrated into the structure design, including the future installation of rooftop photovoltaic panels, to further our institutional commitment to climate neutrality.

- The expansion of this parking structure will provide the capacity required to enhance the university’s local impact through community engagement and the advancement of intellectual collaboration that fuels economic development, as well as facilitate the replacement of existing surface parking that will be included in future site development.

**Project Delivery Method and Process**
- The project will be constructed through the Design-Build delivery method. This approach was selected to streamline project delivery and to alleviate potentially adversarial project environments. This parking structure is suited to the Design-Build delivery method due to its limited program requirements.

**Project Status and Schedule**
- Project construction on the expansion is scheduled to start in March 2020 and completion is targeted for October 2020. The project schedule is planned to coordinate with the completion of the adjacent Novus office building 1 in Phase 3 of the Novus Innovation Corridor.

**Project Cost**
- The budget for this 179,770 gross-square-foot project is $16.2 million. The budget represents an estimated construction cost of $74 per gross square foot. The estimated total project cost is $90 per gross square foot.

- The Design-Build contractor will be at risk to provide the completed project within the agreed-upon Guaranteed Maximum Price (GMP).
Comparable Projects

<table>
<thead>
<tr>
<th>Project</th>
<th>Description</th>
<th>Location</th>
<th>Project Size GSF</th>
<th>Total Project Cost/GSF *</th>
<th>Year Completed</th>
</tr>
</thead>
<tbody>
<tr>
<td>University of Arizona South Stadium Structure</td>
<td>Five levels above grade, 915 spaces</td>
<td>Tucson, AZ</td>
<td>282,000</td>
<td>$ 93</td>
<td>2017</td>
</tr>
<tr>
<td>Carl T. Hayden VA Parking Garage</td>
<td>Four levels above grade, 426 spaces</td>
<td>Phoenix, AZ</td>
<td>145,000</td>
<td>$ 106</td>
<td>2015</td>
</tr>
<tr>
<td><strong>Average Comparable Project Cost</strong></td>
<td></td>
<td></td>
<td></td>
<td><strong>$ 100</strong></td>
<td></td>
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</table>

* Project costs per gross square foot (GSF) have been adjusted to reflect 2019 values.

Fiscal Impact and Financing Plan

- The university will internally fund construction of the parking structure with auxiliary revenue and amortize the cost of the project over an approximate 30-year term.

- Operations and maintenance costs for this project are estimated at $32,275 annually and will be funded by auxiliary revenue.

- **Debt Ratio Impact**: This project will not impact the university’s debt ratio.

Occupancy Plan

- This project will not require a backfill plan.

Statutory/Policy Requirements

- ABOR Policy 7-102 (B) requires that 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.
Capital Project Information Summary

University:  Arizona State University  Project Name:  Novus Place Parking Structure Expansion

Project Description and Location: This project will construct an approximately 179,770 gross square foot expansion of a multi-level parking structure now under construction on the northwest corner of University Drive and Rural Road in Tempe. The structure will provide the parking capacity required to connect the university’s world-class research with commerce and business enterprises that will fuel economic growth.

Project Schedule:
Planning: December 2019
Design Start: January 2020
Construction Start: March 2020
Construction Completion: October 2020

Project Budget:
Total Project Cost: $16,200,000
Total Project Construction Cost: $13,308,155
Total Project Cost per GSF: $90
Construction Cost per GSF: $74

Change in Annual O & M Cost:
Utilities: $12,753
Personnel: -
All Other Operating: $19,522
Subtotal: $32,275

Funding Sources:
Capital: $16,200,000  Funding Source: Auxiliary Revenue
Operation/Maintenance: $32,275  Funding Source: Auxiliary Revenue
Capital Project Budget Summary

University: Arizona State University  
Project: Novus Place Parking Structure Expansion

<table>
<thead>
<tr>
<th>Capital Costs</th>
<th>Annual Capital Development Plan</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Land Acquisition</td>
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</tr>
<tr>
<td>2. Construction Cost</td>
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</tr>
<tr>
<td>A. New Construction</td>
<td>$13,008,155</td>
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<tr>
<td>B. Tenant Improvement</td>
<td>-</td>
</tr>
<tr>
<td>C. Special Fixed Equipment</td>
<td>150,000</td>
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<tr>
<td>D. Site Development (excl. 2.E.)</td>
<td>-</td>
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<tr>
<td>E. Parking and Landscaping</td>
<td>150,000</td>
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<tr>
<td>F. Utilities Extensions</td>
<td>-</td>
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<tr>
<td>G. Other* (Demolition/abatement)</td>
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</tr>
<tr>
<td><strong>Subtotal Construction Cost</strong></td>
<td>$13,308,155</td>
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<tr>
<td>3. Fees</td>
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<tr>
<td>A. CMAR Pre-Construction</td>
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<tr>
<td>B. Architect/Engineer</td>
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<tr>
<td>C. Other</td>
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<td><strong>Subtotal Consultant Fees</strong></td>
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<td>4. FF&amp;E Movable</td>
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<tr>
<td>5. Contingency, Design Phase</td>
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<td>6. Contingency, Constr. Phase</td>
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<td>7. Parking Reserve</td>
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<td>8. Telecommunications Equipment</td>
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<td><strong>Subtotal Items 4-8</strong></td>
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<td>9. Additional University Costs</td>
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<td>A. Surveys, Tests, Haz. Mat. Abatement</td>
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<tr>
<td>B. Move-in Costs</td>
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</tr>
<tr>
<td>C. Printing Advertisement</td>
<td>10,000</td>
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<tr>
<td>D. Keying, signage, facilities support</td>
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<td>E. Project Management Cost</td>
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<td>F. State Risk Mgt. Ins. (.0034 **)</td>
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<td><strong>Subtotal Addl. Univ. Costs</strong></td>
<td>$701,845</td>
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</table>

**Total Capital Cost** | $16,200,000

* Universities shall identify items included in this category.  
** State Risk Management Insurance factor is calculated on construction costs and consultant fees.
EXHIBIT B
Novus Place Parking Structure Expansion
Site Location Map in Detail