

Office of the President

TO MEMBERS OF THE COMMITTEE ON GROUNDS AND BUILDINGS:¹

ACTION ITEM

For Meeting of January 16, 2013

APPROVAL OF THE BUDGET FOR CAPITAL IMPROVEMENTS AND THE CAPITAL IMPROVEMENT PROGRAM AND APPROVAL OF EXTERNAL AND STANDBY FINANCING, 2013-14 STATEWIDE ENERGY PARTNERSHIP PROGRAM, SYSTEMWIDE

EXECUTIVE SUMMARY

The proposed 2013-14 Statewide Energy Partnership Program (Program) includes over 180 energy efficiency projects at seven participating campuses. Through the Program, the investor-owned utilities will provide incentive payments to the University for projects that increase the energy efficiency of University buildings and infrastructure, thereby reducing the University's overall energy consumption and greenhouse gas emissions. Once constructed, the projects included in the Program will save the University \$10,800,000 in energy costs per year. The annual debt service is projected at \$7,000,000 for the 15 years, leaving a net savings of \$3,800,000 per year during the 15-year term of the external finance period and the full \$10,800,000, unadjusted for inflation, thereafter.

The projects included in the program were identified by campuses based on campus priorities and findings of the systemwide Strategic Energy Plan (see Background). Included in the Program are a wide spectrum of projects of varying size and complexity. The projects include renewal and retrofits of HVAC systems, lighting retrofits, retrofits of building controls, and monitoring-based commissioning that benefit whole buildings.

The Regents are being asked to:

- 1) Approve the program budget of \$102,312,000 to be funded from external financing (\$73,766,000), campus and auxiliary sources (\$7,733,000), and energy efficiency incentive payments from investor-owned utilities (\$20,813,000).
- 2) Approve external financing (\$73,766,000) to be made available to campuses to cover the University's portion of projects costs.

¹ Of interest to the Committee on Finance.

- 3) Approve standby financing (\$19,948,000) that is necessary until the utilities pay the incentives at the completion of the projects.

RECOMMENDATION

The President recommends that the Committee on Grounds and Buildings recommend to the Regents that:

1. The 2012-13 Budget for Capital Improvements and the Capital Improvement Program be amended to include the following project:

Systemwide: 2013-14 Statewide Energy Partnership Program – preliminary plans, working drawings, construction, equipment - \$102,312,000 to be funded from external financing (\$73,766,000), energy efficiency incentive payments from investor-owned utilities (\$20,813,000), and campus and auxiliary sources (\$7,733,000).
2. The President be authorized to obtain external financing not to exceed \$73,766,000 to finance the 2013-14 Statewide Energy Partnership Program. The President shall require that:
 - A. Interest only, based on the amount drawn down, shall be paid on the outstanding balance during the construction period.
 - B. As long as the debt is outstanding, general revenues from the Berkeley, Davis, Irvine, San Diego, San Francisco, Santa Barbara, and Santa Cruz campuses shall be maintained in amounts sufficient to pay the debt service for each campus' respective energy projects and to meet the related requirements of the authorized financing.
 - C. The general credit of the Regents shall not be pledged.
3. The President be authorized to obtain standby financing not to exceed \$19,948,000 for the program. The President shall require that:
 - A. Interest only, based on the amount drawn down, shall be paid on the outstanding balance during the construction period.
 - B. Repayment of the standby financing shall be from energy efficiency incentive payments from investor-owned utilities under the terms of the Second Amendment to the UC/CSU/IOU Energy Efficiency Partnership Program Agreement; in the event that the incentive payments are insufficient, and as long as the debt is outstanding, the general revenues of the Berkeley, Davis, Irvine, San Diego, San Francisco, Santa Barbara, and Santa Cruz campuses shall be maintained in amounts sufficient to pay the debt service for the portion of the

standby financing that relates to each campus' respective energy projects and to meet the related requirements of the authorized financing.

- C. The general credit of the Regents shall not be pledged.

BACKGROUND

Strategic Energy Plan

Funded by a court settlement with Enron Energy Services, the defunct energy services provider to the University from 1998 to 2002, the University commissioned in 2007 a systemwide Strategic Energy Plan that, among other pertinent energy issues, focused on all University facilities greater than 50,000 square feet in usable space to determine energy efficiency opportunities. The plan produced a portfolio of 2,700 energy projects which were further scrutinized for financial feasibility by the campuses, resulting in over 900 viable projects. This project portfolio was presented to the Regents to authorize implementation of the first Statewide Energy Partnership in 2009. Of the initial 900 qualified projects, close to 600 have been or will be completed shortly. The goal of the plan was and is to reduce operating expenses and simultaneously reduce greenhouse gas emissions in compliance with the University's Policy on Sustainable Practices.

Funding Challenges

Chronically underfunded operations and maintenance budgets continue to be severely strained. A sustained lack of systematic investment in capital renewal and the elimination of State deferred maintenance funding have exacerbated the higher costs associated with operating and maintaining a growing inventory of aging facilities and an increasing number of complex laboratories and specialized research facilities.

With no foreseeable augmentations in State funding for operation and maintenance, the University created a pilot energy efficiency program with generous, utility-provided incentive grants in 2004 that formed the basis for the Program.

Projects included in the preceding and proposed program mostly address highly inefficient HVAC and other mechanical systems in buildings that are more than 35 years old and represent a major portion of a building's energy consumption. The program helps to address the University's growing capital renewal needs, improve energy efficiency and renew obsolete and inefficient mechanical systems.

As with the preceding programs, the 2013-14 Statewide Energy Partnership Program will continue to make it possible for the University to take significant steps toward achieving the energy conservation and climate action goals set forth in the University's Policy on Sustainable Practices. The policy calls for a reduction in energy use by 2014 to levels ten percent below 2000 levels, reducing greenhouse gas emissions to 1990 levels by 2020, and becoming climate neutral as soon as possible. The 2013-14 Partnership Program is expected to deliver 72 million kilowatt-hours of electricity savings or about four percent of the University's total electricity

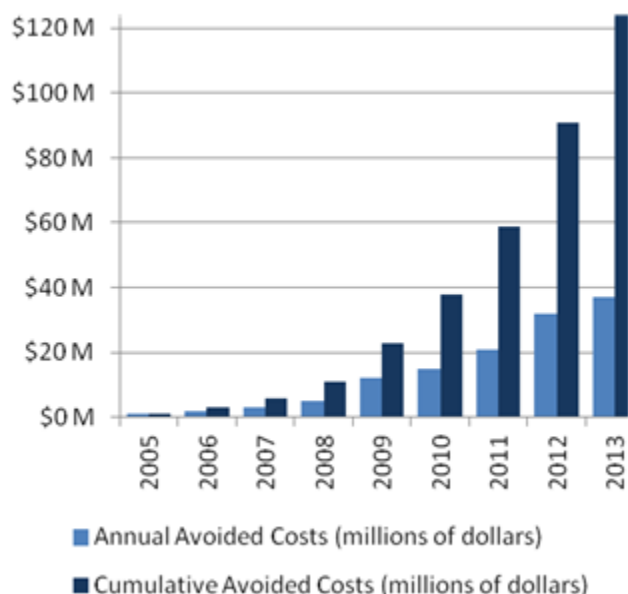
usage, and 3.6 million therms of natural gas savings or three percent of total gas consumption. The Program's combined electricity and natural gas savings will lower the University's purchased utility cost by 3.5 percent. At the same time, the decrease in energy usage will result in a 42,000 metric ton reduction in the University's carbon footprint. These savings are in addition to the achievements of the previously approved Statewide Energy Partnership Program. In addition, it is anticipated that the Program will expand an additional 20 percent during this authorization time period. The projects will come forward with budget authorization and corresponding external finance requests and be approved under corresponding delegated authority.

Success of 2009-2011 Statewide Energy Partnership

In September 2008, the Regents were presented with information on the then-proposed 2009-11 Statewide Energy Partnership, a program through which the State's investor-owned and participating publicly-owned utilities would pay the University incentive grants to reduce energy consumption.

In March 2009, the Regents authorized the 2009-11 Statewide Energy Partnership and subsequently extended the Partnership Program through December 31, 2012. This expanded program encompasses almost 600 projects at a total cost of \$220 million. These projects, most of which were completed by December 31, 2012, will provide an average payback of six years based on net project cost, generate an estimated \$26 million in annual avoided energy cost before debt service, and net \$16 million per year after debt service through 2027 when the long-term financing is amortized. Additionally, these projects will earn an estimated \$46.4 million in utility incentive grants.

The Partnership Program took advantage of an extraordinary opportunity to leverage limited resources at a time when the University is struggling to operate and maintain facilities that can continue to support the institution's vast array of instructional, research, and service programs.



The above graph shows that the cumulative net avoided costs for the University now total \$91 million through 2011. Projects started and completed in 2012 will increase the annual net avoided utility costs by an additional \$37 million.

Since the Partnership was formed in 2004, the program will be delivering cumulative savings of approximately \$128 million. This achievement does not include the savings projections of the requested Partnership program authorization for 2013-14.

A recent independent Navigant Consulting report² commissioned by the California Public Utilities Commission “concludes that the approach (i.e., the systemwide strategic energy plan and involving all stakeholders) used by the UC system to assess, plan, and manage a portfolio approach to energy efficiency is responsible” for the Program’s success. Navigant Consulting further points out that the UC model could be replicated by other State entities if they are to meet their respective energy efficiency and cost reduction targets.

PROGRAM DESCRIPTION

The Program is designed to achieve immediate, long-term, electric and thermal energy savings and establish a permanent framework for sustainable, comprehensive energy management programs. The Program expands on an initial successful systemwide effort that was started in partnership with the four investor-owned utilities and the California State University in 2004.

Through this program, the University has initiated an ambitious portfolio of infrastructure projects and building upgrades to reduce energy consumption, lower campus operating costs, shrink carbon footprints, and improve indoor environmental quality and safety for the university community, faculty, staff, and students.

² Program Assessments Study: Statewide Institutional IOU Energy Efficiency Partnership Program – WO012 (Draft Report) Navigant Consulting, Inc October 9, 2012. The link will be available early 2013.

The Program's viability is supported extensively by incentive grants from the participating investor-owned utilities, and since 2004 those utilities have made available significant funding contingent upon the University delivering verified energy savings. The University has entered into contracts with the joint utilities for each of the Partnership Program cycles. The contracts delineate the terms and conditions that the University must adhere to in order to receive the incentive grants. The verification of energy savings by the utilities further assures the University that the investment and associated debt service has been a successful effort.

The University proposes a Program budget of \$102,312,000 for the 2013-14 Program. This will include over 180 energy efficiency projects at the campuses. These projects will increase the energy efficiency of University buildings and infrastructure and reduce the University's overall energy consumption. The \$73,766,000 in requested external financing will be made available to campuses to cover the University's portion of project costs, with incentive payments projected at \$20,813,000 provided by the utilities under the terms of the contract covering the remaining costs. (See Attachment 1.) Additional campus and auxiliary funds of \$7,733,000 will be used to cover the costs of projects that are not being financed through the Partnership, but that will be eligible for the utility incentive grants. Attachment 2 provides further detail by campus. The projects included in the Program were identified based on campus priorities. Included in the program are a wide spectrum of projects of varying size and complexity. The most common projects include bringing the heating, ventilation and air-conditioning (HVAC) systems back up to design standard, or replacing obsolete ventilation and temperature controls with cutting-edge technologies. These employ many systems that were developed and tested by the University's faculty and laboratories and then commercialized for public sale. While lighting represents a relatively small proportion of the University's energy consumption, virtually all lighting system upgrades include pioneering, emerging technologies that serve to demonstrate to the general public that such systems are aesthetically and economically feasible. Thus, through the Program, the University achieves several of its objectives to educate, demonstrate energy efficiency opportunities, and reduce its operating expenses.

ATTACHMENTS

- Attachment 1: Terms of the Partnership and Financial Analysis
- Attachment 2: Campus Project Funding Sources Summary
- Attachment 3A: Summary of Financial Feasibility - Berkeley Campus
- Attachment 3B: Summary of Financial Feasibility - Davis Campus
- Attachment 3C: Summary of Financial Feasibility - Irvine Campus
- Attachment 3D: Summary of Financial Feasibility - San Diego Campus
- Attachment 3E: Summary of Financial Feasibility - San Francisco Campus
- Attachment 3F: Summary of Financial Feasibility - Santa Barbara Campus
- Attachment 3G: Summary of Financial Feasibility - Santa Cruz Campus

TERMS OF THE PARTNERSHIP AND FINANCIAL ANALYSIS

Terms of the 2013-2014 Statewide Energy Partnership

The University and the investor-owned utilities have signed an Amendment to Jointly Deliver the 2010-2012 UC/CSU/IOU Energy Efficiency Partnership program (Program). The effective date of the Amendment is January 1, 2013 and its provisions are subject to the requested Regents authorization of the 2013-14 Program. The Amendment essentially extends all provisions of the 2010-12 Program. The University will be paid: \$0.24 for each kilowatt-hour and \$1.00 for each therm of demonstrated energy savings; up to 50 percent of the costs of lighting projects; up to 80 percent of the costs of all other energy projects; and \$0.10 above the current Savings-By-Design program for new construction. The University will seek opportunities to bundle projects to maximize incentive payments.

Campus Financing Needs

The \$73,766,000 in external financing that the Regents are asked to approve will be made available to campuses to cover the University's portion of the \$102,312,000 in project costs to be expended over the two years of the proposed 2013-14 Partnership Program. As set forth in Attachment 2, campuses have pledged several sources of repayment of debt service. Additional campus and auxiliary funds of \$7,733,000 are being used to cover costs of some projects included in the Program.

Approximately 90 percent of the projects included in the proposed Partnership Program are in state-eligible space. The Office of the President has negotiated revised language in the 2012-13 Budget Act (Provision 2 of Item 6440-001-0001 of Section 2.00 of the Budget Act of 2012-13 (Assembly Bill No. 88)) to clarify the reporting requirements related to the use of State operating funds for Partnership Program projects and debt service for these Projects. The revised language provision remains in effect for the duration of the Program and successor programs. The new language permits the University to submit for legislative approval a comprehensive list of projects for which State funds will be used while preserving a mechanism for amending the project list as necessary. Legislative mandate continues to require annual reporting on the status of the Program.

For each portfolio of projects paid by each fund source, the amount of annual debt service that can accrue is limited to no more than 85 percent of the energy savings, based on each campus's utility recharge rates. This ratio ensures energy savings from financed energy projects will always be greater than the debt service incurred by the projects. Based on campus-submitted summaries of financial feasibility (Attachments 3A through 3G) the aggregate energy cost savings exceed the annual debt service by more than 30 percent, well within the stipulated parameters.

The campuses have identified over 180 projects for completion over the proposed two year program. An additional 800 projects have been identified through the Strategic Energy Plan that the campuses may choose to implement through the proposed Program or independent of the currently requested authorization. On a campus project portfolio basis, all projects implemented in the proposed Program will meet all related financing requirements.

CAMPUS PROJECT FUNDING SOURCES SUMMARY

	External Financing (\$)	Energy Efficiency Incentive Payments (\$)	Campus/ Auxiliary Sources (\$)	Total Project Funding (\$)	Standby Financing (\$)
Berkeley	10,822,000	3,329,000	149,000	14,300,000	3,329,000
Davis	11,045,000	4,298,000	-	15,343,000	4,298,000
Irvine	10,444,000	2,479,000	1,060,000	13,983,000	2,479,000
San Diego	26,200,000	5,704,000	-	31,904,000	5,704,000
San Francisco	7,560,000	2,633,000	5,530,000	15,723,000	2,633,000
Santa Barbara	4,266,000	1,505,000	994,000	6,765,000	1,505,000
Santa Cruz	3,429,000	865,000	-	4,294,000	-
System Total	73,766,000	20,813,000	7,733,000	102,312,000	19,948,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

SOURCES OF PAYMENT FOR CAMPUS AND AUXILIARY FUNDING

	Campus Funds (\$)	Auxiliary Reserves (\$)	Total Campus/ Auxiliary Funding (\$)
Berkeley		149,000	149,000
Davis		0	0
Irvine		1,060,000	1,060,000
San Diego		0	0
San Francisco	5,010,000	520,000	5,530,000
Santa Barbara		994,000	994,000
Santa Cruz		0	0
System Total	5,010,000	2,723,000	7,733,000

SUMMARY OF FINANCIAL FEASIBILITY

BERKELEY CAMPUS	
Project Name	UCB 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$14,300,000
Anticipated Interest During Construction	\$280,000

PROPOSED SOURCES OF FUNDING	
External Financing	\$10,822,000
Energy Efficiency Incentive Payments (Standby Financing)	\$3,329,000
Housing Funds	\$149,000
Total	\$14,300,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

*For Externally Financed projects, please refer to Section I.
For Standby and Interim financings, please refer to Section II & III.*

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the Berkeley campus
Anticipated Fund Source	Campus Funds
Financial Feasibility Rate	5.00%
First Year of Principal	FY 2013
Final Maturity (e.g. 20XX)	FY 2027 ¹
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$1,034,000

¹The multiple projects within the SEP program will take place in CY 2013 and 2014, with financing issued over FY 2013 through 2015. Debt issued in FY 2013 will have a final maturity of FY 2027, debt issued in FY 2014 will have a final maturity of FY 2028, and debt issued in FY 2015 will have a final maturity of FY 2029.

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	5.6% max (2016)	6.0%
Debt Service Coverage	4.39x min (2016)	1.75x
Expendable Resources to Debt	N/A	1.00x

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$3,329,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds
Term of Standby Request	1 year

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
<i>Debt Service to Operations (%)</i>	<i><u>Annual Debt Service</u> <u>Total Operating Expenses</u></i>
<i>Debt Service Coverage (x)</i>	<i><u>Operating Income + Depreciation + Interest</u> <u>Annual Debt Service</u></i>
<i>Expendable Resources to Debt (x)</i>	<i><u>Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)</u> <u>Total Debt Outstanding</u></i>

SUMMARY OF FINANCIAL FEASIBILITY

DAVIS CAMPUS	
Project Name	UCD 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$15,343,000
Anticipated Interest During Construction	\$412,370

PROPOSED SOURCES OF FUNDING	
External Financing	\$11,045,000
Energy Efficiency Incentive Payments (Standby Financing)	\$4,298,000
Total	\$15,343,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

*For Externally Financed projects, please refer to Section I.
For Standby and Interim financings, please refer to Section II & III.*

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the Davis campus
Anticipated Fund Source	State Operating Funds(*)/Recreation Revenue
Financial Feasibility Rate	5.00%
First Year of Principal	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$1,064,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	3.2% (max) 2017 (yr)	6.0%
Debt Service Coverage	3.64x (min) 2016 (yr)	1.75x
Expendable Resources to Debt	n/a	1.00x
Auxiliary Financing Benchmarks		
Debt Service Coverage	1.64x; 2016 (yr)	1.25x

(*)State Operating Funds as provided for in terms set forth in Provision 2 of item 6440-001-0001 of Section 2.00 of the 2008 Budget Act and continued until the end of State Energy Partnerships Program (SEPP).

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$4,298,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds/Recreation Revenues
Term of Standby Request	3 Years

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
<i>Debt Service to Operations (%)</i>	<i>$\frac{\text{Annual Debt Service}}{\text{Total Operating Expenses}}$</i>
<i>Debt Service Coverage (x)</i>	<i>$\frac{\text{Operating Income} + \text{Depreciation} + \text{Interest}}{\text{Annual Debt Service}}$</i>
<i>Expendable Resources to Debt (x)</i>	<i>$\frac{\text{Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)}}{\text{Total Debt Outstanding}}$</i>

SUMMARY OF FINANCIAL FEASIBILITY

IRVINE CAMPUS	
Project Name	UCI 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$13,983,000
Anticipated Interest During Construction	\$428,000

PROPOSED SOURCES OF FUNDING	
External Financing	\$10,444,000
Energy Efficiency Incentive Payments (Standby Financing)	\$2,479,000
Housing	\$630,000
Student Center	\$430,000
Total	\$13,983,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

For Externally Financed projects, please refer to Section I. For Interim financings, please refer to Section II.

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the Irvine Campus
Anticipated Fund Source	State Operating Funds(*)
Financial Feasibility Rate	5.00%
First Year of Payment	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$1,046,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	4.7% (max) 2013 (yr)	6.0%
Debt Service Coverage	3.9x (min) 2013 (yr)	1.75x
Expendable Resources to Debt	n/a	1.00x

(*) State Operating Funds as provided for in terms set for in Provision 2 of item 6440-001-0001 of Section 2.00 of the 2008 Budget Act and continued until the end of State Energy Partnerships Program (SEPP).

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$2,479,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds
Term of Standby Request	4 years

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
<i>Debt Service to Operations (%)</i>	<i><u>Annual Debt Service</u> <u>Total Operating Expenses</u></i>
<i>Debt Service Coverage (x)</i>	<i><u>Operating Income + Depreciation + Interest</u> <u>Annual Debt Service</u></i>
<i>Expendable Resources to Debt (x)</i>	<i><u>Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)</u> <u>Total Debt Outstanding</u></i>

SUMMARY OF FINANCIAL FEASIBILITY

SAN DIEGO CAMPUS	
Project Name	UCSD 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$31,904,000
Anticipated Interest During Construction	\$1,537,000

PROPOSED SOURCES OF FUNDING	
External Financing	\$26,200,000
Energy Efficiency Incentive Payments (Standby Financing)	\$5,704,000
Total	\$31,904,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

*For Externally Financed projects, please refer to Section I.
For Standby and Interim financings, please refer to Section II & III.*

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the San Diego campus
Anticipated Fund Source	Campus Funds
Financial Feasibility Rate	5.0%
First Year of Principal	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$2,524,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	4.44% (max) 2016 (yr)	6.0%
Debt Service Coverage	2.18x (min) 2016 (yr)	1.75x
Expendable Resources to Debt	n/a	1.00x

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$5,704,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds
Term of Standby Request	2 years

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
Debt Service to Operations (%)	$\frac{\text{Annual Debt Service}}{\text{Total Operating Expenses}}$
Debt Service Coverage (x)	$\frac{\text{Operating Income} + \text{Depreciation} + \text{Interest}}{\text{Annual Debt Service}}$
Expendable Resources to Debt (x)	$\frac{\text{Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets - net investment in plant)}}{\text{Total Debt Outstanding}}$

SUMMARY OF FINANCIAL FEASIBILITY

SAN FRANCISCO CAMPUS	
Project Name	UCSF 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$15,723,000
Anticipated Interest During Construction	\$351,015

PROPOSED SOURCES OF FUNDING	
External Financing	\$7,560,000
Energy Efficiency Incentive Payments (Standby Financing)	\$2,633,000
Campus Funds	\$5,010,000
Auxiliary Services	\$520,000
Total	\$15,723,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

*For Externally Financed projects, please refer to Section I.
For Standby and Interim financings, please refer to Section II & III.*

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the UCSF campus
Anticipated Fund Source	Campus Funds
Financial Feasibility Rate	5.00%
First Year of Principal	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$728,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	4.1% (max) 2021 (yr)	6.0%
Debt Service Coverage	2.46x (min) 2021 (yr)	1.75x
Expendable Resources to Debt	1.09x	1.00x

The funding for the present slate of Statewide Energy Partnership projects will be drawn down over two fiscal years, in tranches of \$5.6 million in 2012-13 and \$4.6 million in 2013-14, for a total of \$10.2 million. This includes both capitalized interest and the PG&E incentive funding described in the Standby Financing section, below. The amount of long-term financing being requested is \$7.6 million (total less PG&E incentives). The debt ratios reported here are based on the total drawdown, but the estimated average annual debt service is based on the long-term financing portion only.

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$2,633,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds
Term of Standby Request	2 years

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The Statewide Energy Partnership is subject to reimbursement from PG&E upon completion of projects and certification of utilities savings. The amount of the reimbursement is to be expended by the campus over two years, and reimbursed upon receipt of incentive payments. Therefore, the campus will require standby financing for the duration of the construction and certification period, but the entire amount can be repaid upon receipt of the incentive payments.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
<i>Debt Service to Operations (%)</i>	<i><u>Annual Debt Service</u> <u>Total Operating Expenses</u></i>
<i>Debt Service Coverage (x)</i>	<i><u>Operating Income + Depreciation + Interest</u> <u>Annual Debt Service</u></i>
<i>Expendable Resources to Debt (x)</i>	<i><u>Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)</u> <u>Total Debt Outstanding</u></i>

SUMMARY OF FINANCIAL FEASIBILITY

SANTA BARBARA CAMPUS	
Project Name	UCSB 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$6,765,000
Anticipated Interest During Construction	\$0

PROPOSED SOURCES OF FUNDING	
External Financing	\$4,266,000
Energy Efficiency Incentive Payments (Standby Financing)	\$1,505,000
Recreation	\$592,000
Student Union	\$60,000
Parking Reserves	\$342,000
Total	\$6,765,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

For Externally Financed projects, please refer to Section I.

For Standby and Interim financings, please refer to Section II & III.

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the Santa Barbara campus
Anticipated Fund Source	Campus Funds
Financial Feasibility Rate	5.00%
First Year of Principal	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$411,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	6.0% 2015 (*)	6.0%
Debt Service to Operations	6.6% 2015 (*)	6.0%
Debt Service Coverage	3.46x 2015 (*)	1.75x
Debt Service Coverage	3.76x 2015	1.75x
Expendable Resources to Debt	n/a	1.00x

(*) The campus at 6.0% is at debt capacity and is constrained going forward. The campus' debt model is inclusive of other anticipated external financing projects. With the inclusion of the Davidson Library (an SPWB approved project), Debt Service to Operations is at 6.6% and Debt Service Coverage Ratio stands at 3.46 X. The Davidson Library at \$71.4 million in interim financing is currently carried as campus debt for interim financing purposes. The campus expects the State will provide bond proceeds through an SPWB bond issuance for the entire project.

SECTION II. Standby Financed Projects (if applicable)

Approval for Standby and Interim financing is sought in order to bridge the timing difference between project expenditures and receipt of gift or other specified funds.

FUND SOURCE SUMMARY	
Standby Financing Amount	\$1,505,000
Fund Type	Energy Efficiency Incentive Payments
Secondary Source of Repayment	Campus Funds
Term of Standby Request	2 years

*Box above is to be used for standby financing request that is not gift related. Backup information should be provided to Capital Markets Finance on Fund Type.

The metrics used to determine financing feasibility are defined below:

Measure	Definition
<i>Debt Service to Operations (%)</i>	<i>$\frac{\text{Annual Debt Service}}{\text{Total Operating Expenses}}$</i>
<i>Debt Service Coverage (x)</i>	<i>$\frac{\text{Operating Income} + \text{Depreciation} + \text{Interest}}{\text{Annual Debt Service}}$</i>
<i>Expendable Resources to Debt (x)</i>	<i>$\frac{\text{Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)}}{\text{Total Debt Outstanding}}$</i>

SUMMARY OF FINANCIAL FEASIBILITY

SANTA CRUZ CAMPUS	
Project Name	UCSC 2013-14 Statewide Energy Partnership
Project ID	TBD
Total Estimated Project Costs	\$4,294,000
Anticipated Interest During Construction	\$71,518

PROPOSED SOURCES OF FUNDING	
External Financing	\$3,429,000
Energy Efficiency Incentive Payments	\$865,000
Total	\$4,294,000

Fund sources for external financing (including standby and interim financing) shall adhere to University policy on repayment for capital projects.

For Externally Financed projects, please refer to Section I.

For Standby and Interim financings, please refer to Section II & III.

SECTION I. Externally Financed Projects

Long-term external financing assumptions are listed below.

FINANCING ASSUMPTIONS	
Anticipated Repayment Source	General Revenues of the Santa Cruz campus
Anticipated Fund Source	State Operating Funds(*)
Financial Feasibility Rate	5.00%
First Year of Principal	2013
Final Maturity (e.g. 20XX)	2027
Term (e.g. 30 years)	15 years
Estimated Average Annual Debt Service	\$330,000

Below are results of the financial feasibility analysis for the proposed project using the campus' Debt Affordability Model. External financing approval requires the campus to meet the debt service to operations benchmark and one of the two other benchmarks for approval. The financial projections take into consideration market conditions, new sources of revenue and all previously approved projects. The corresponding campus Debt Affordability Model has been submitted to Capital Markets Finance at UCOP.

CAMPUS FINANCING BENCHMARKS		
Measure	10 Year Projections	Approval Threshold
Debt Service to Operations	5.7% (max) 2019 (yr)	6.0%
Debt Service Coverage	5.26x (min) 2013 (yr)	1.75x
Expendable Resources to Debt	n/a	1.00x

(*)State Operating Funds as provided for in terms set forth in Provision 2 of item 6440-001-0001 of Section 2.00 of the 2008 Budget Act and continued until the end of State Energy Partnerships Program (SEPP).

The metrics used to determine financing feasibility are defined below:

<i>Measure</i>	<i>Definition</i>
<i>Debt Service to Operations (%)</i>	<i><u>Annual Debt Service</u></i> <i><u>Total Operating Expenses</u></i>
<i>Debt Service Coverage (x)</i>	<i><u>Operating Income + Depreciation + Interest</u></i> <i><u>Annual Debt Service</u></i>
<i>Expendable Resources to Debt (x)</i>	<i><u>Expendable Financial Resources (unrestricted net assets + temporarily restricted net assets – net investment in plant)</u></i> <i><u>Total Debt Outstanding</u></i>