## COMMITTEE ON GROUNDS AND BUILDINGS May 17, 2000

B. <u>CERTIFICATION OF ENVIRONMENTAL IMPACT REPORT AND APPROVAL</u>
OF DESIGN, HEALTH SCIENCES SEISMIC REPLACEMENT BUILDING 2 AND
ORTHOPAEDIC HOSPITAL, J. VERNON LUCK, SR. M.D. CENTER, LOS
ANGELES CAMPUS

The President recommends that upon review and consideration of the environmental consequences of the proposed project as indicated in the attached Environmental Impact Report, the Committee on Grounds and Buildings:

- (1) Certify the attached Final Environmental Impact Report.
- (2) Adopt the attached Findings, Statement of Overriding Considerations, and Mitigation Monitoring Program.
- (3) Approve the design of the Health Sciences Seismic Replacement Building 2 and the design of the Orthopaedic Hospital, J. Vernon Luck, Sr. M.D. Center, Los Angeles campus.

#### **BACKGROUND**

In May 1997, The Regents were presented with an overview of the proposed UCLA Academic Health Center Facilities Reconstruction Plan (AHCFRP), which will repair and replace major portions of the Center for Health Sciences (CHS) and Santa Monica–UCLA Medical Center that were damaged by the 1994 Northridge earthquake.

In November 1998, The Regents approved inclusion of the Health Sciences Seismic Replacement Building 2 (HSSRB2), Los Angeles campus, in the 1999-2000 Budget for Capital Improvements and the 1999-2004 Capital Improvements Program at a total project cost of \$57,866,000 at CCCI 3847. The current approved budget is \$58,705,000 at CCCI 3909. The project will be funded by state funds (\$29,725,000) and gift funds (\$28,980,000). Funding of \$1,169,000 for partial funding of preliminary plans, and \$1,461,000 for partial funding of working drawings were included in the 1999-00 State Capital Outlay Program, with matching funds of \$1,146,000 and \$1,433,000 provided by the campus for each phase. The state's share of construction funding is being requested in the 2000-01 State Capital Outlay Program.

Approval of external financing, if required to cover unreceived gift funds during the construction period, will be requested prior to the solicitation of construction bids, currently scheduled for Spring 2001.

The HSSRB2 Building provides for relocation of existing immunology research programs of the Los Angeles campus, currently located in seismically hazardous space in the Center for Health Sciences. The programs that will be relocated to the HSSRB2 building include biochemistry, microbiology, molecular, cell and developmental biology, and transplant and AIDS research programs that are currently dispersed through the CHS.

In March 2000, The Regents approved inclusion of the Orthopaedic Hospital, J. Vernon Luck, Sr. M.D. Center (Luck Center), Los Angeles campus, in the 1999-2000 Budget for Capital Improvements and the 1999-2004 Capital Improvements Program at a total project cost of \$37,700,000 at CCCI 3909. The project will be funded by gift funds from the Orthopaedic Hospital Foundation Charitable Pledge as represented in the Alliance Agreement (\$30,000,000) and other donor funds available to the College of Letters and Sciences (\$7,700,000). The Orthopaedic Hospital Charitable Pledge will be financed through the issuance of tax-exempt 501(c)(3) bonds repaid by the Orthopaedic Hospital. At the same meeting, The Regents approved interim external financing for the College of Letters and Sciences donor funding commitment.

The proposed Luck Center project results from the Master Alliance Agreement between the UCLA Medical Center and School of Medicine and Orthopaedic Hospital approved by The Regents in June 1998. It will support expanded research capacity and collaboration between researchers from Orthopaedic Hospital and the Los Angeles campus and facilitate the discovery of new therapies for debilitating injuries and permanent cures to diseases of the musculoskeletal system. Scientific disciplines of special relevance to modern orthopedic research include biochemistry, molecular genetics, molecular, cell and developmental biology, and biological chemistry.

Because of the similarities between the programs for the two facilities and their physical adjacencies, the campus selected the same executive architect and laboratory consultant to plan and design them.

In April 2000, the appointment of Cesar Pelli and Associates, Architects of New Haven, Connecticut, as executive architect was administratively approved within the Office of the President. Construction will begin in 2001 and be completed in 2003.

#### **Project Site**

The proposed site for the HSSRB2 and Luck Center is located to the east of the existing Life Sciences Building on the north side of Young Drive South, adjacent to the Center for Health Sciences and to the academic, research, and educational functions comprising UCLA's Court of Sciences. The site use is consistent with provisions of the 1990 Long Range Development Plan as amended (see attached site plan).

#### Project Design

The proposed Health Sciences Seismic Replacement Building 2 will construct approximately 133,000 gross square feet of new space, providing 86,606 assignable square feet for medical research laboratories and support functions including vivarium space and faculty offices. The proposed Luck Center building will construct 95,000 gsf of new space, providing 51,520 asf for medical research laboratories and support functions.

In the course of preliminary design work, it became apparent that the provision of some physical linkages and shared support services between the buildings will be more efficient, increase productivity, and decrease operational costs. Therefore, the design solution proposes to construct the two buildings adjacent to each other, sharing a common dividing wall. Access will be provided at each floor level to allow occupants of both buildings to interact and work together.

Vivarium functions for the two projects will be consolidated in the HSSRB2 building, and selected support functions including the loading dock and mechanical equipment room will be consolidated in the Luck Center and sized to serve both buildings. The proposed design reduces service access problems among existing buildings in the Court of Sciences and the HSSRB2 building and Luck Center, by providing one consolidated facility in the Luck Center with belowgrade connection to several neighboring buildings.

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The ratio of asf to gsf of the Luck Center component is .54 (54%); the HSSRB2 component is .66 (66%), for a combined efficiency of 61%. The differential of efficiency between the components is related to placement of common functions as described above.

A major design objective for both facilities is that they be adaptable to changing needs of occupants over the life of the building. The facilities are developed as generic laboratory space with flexible laboratory support systems. The laboratories will accommodate most types of research, and the support systems will be tailored to the needs of individual investigators or disciplines.

The HSSRB2 will consist of a five-story building with one basement level and four stories above the basement, exclusive of a mechanical penthouse.

The basement level will contain the vivarium shared with the Luck Center. The first floor will contain mostly lab and lab support areas, as well as house the main entrance lobby and a large seminar room. The second, third, and fourth floors will be typical laboratory floors including laboratory support space, conference rooms, and faculty and administrative offices.

The Luck Center will be designed as a six-story structure (four research laboratory floors, a loading dock floor, and basement mechanical room). The basement and first floor levels will house most of the building support elements.

The second floor will consist primarily of research space, but will also include lobby and some departmental administration space for the Orthopaedic Hospital Research Institute. The primary entrance to the building will be from the Court of Sciences. The third, fourth, and fifth floors will be entirely dedicated to research.

Both buildings will be of Type 1 (fireproof) construction, fully sprinklered, with a structural system combining cast-in-place concrete foundations and a steel braced frame. The exterior walls will be clad with the UCLA brick, tan colored pre-cast concrete panels, and an aluminum/glass curtain wall system. The window system will provide painted aluminum window frames and clear low-E glass utilized to control heat gain. The rooftop mechanical equipment will be screened by a perimeter wall around the equipment composed of painted metal louvers (see attached plans and sketches). Additional project details are provided in the attached Project Statistics.

In accordance with University policy, both projects have been reviewed by an independent cost estimator. Independent structural review for seismic resistance will be conducted at each stage of the project development.

The projects will be managed, with oversight by the Administrative Vice Chancellor, by senior project management staff from Capital Programs who have extensive experience in research laboratory project management. Construction management will be provided by an outside construction management firm, also experienced in the management of comparable research laboratory projects.

#### **Environmental Impact Summary**

The potential environmental effects of the proposed Health Sciences Seismic Replacement Building 2 project were first analyzed in the Environmental Impact Report for the Academic Health Center Facilities Reconstruction Plan (SCH #97061016), which was certified by The Regents in November 1998, concurrent with the approval of design for the Westwood Replacement Hospital.

Pursuant to state law and University procedures for the implementation of the California Environmental Quality Act, the potential environmental effects of the proposed Orthopaedic Hospital, J. Vernon Luck, Sr. M.D. Center project and of its concurrent construction with the proposed Health Sciences Seismic Replacement Building 2 were analyzed in the Final EIR entitled "Luck Research Center and Related Facilities" (SCH# 20000011099). Related facilities analyzed in the Final EIR include a Court of Sciences Replacement Instructional Center and the Thermal Energy Storage System, which will be considered for approval at the appropriate level at a later date. A Notice of Preparation for the project EIR was mailed to the State Clearinghouse and various State, regional, and local agencies, and interested individuals on February 1, 2000. On March 2, 2000, the campus filed a Notice of Completion of the Draft EIR and released the document for public review, establishing a 45-day public review period from March 3, 2000, to April 17, 2000. Public notice of the availability of the Draft EIR was provided with advertisements in the Los Angeles Times and the UCLA Daily Bruin. Copies of the Draft EIR were made available at two on-campus and four community libraries, and were distributed to interested agencies, groups, and individuals. A public hearing was held on April 6, 2000, during which no comments on the Draft EIR were received. One letter from Caltrans was received during the public review period and the responses to comments are contained in the Final EIR.

The Final EIR evaluates the potential effects of the project in 14 environmental issue areas: land use; population, employment and housing; traffic and transportation; biological resources; archeological and historical resources; visual quality; geology, soils and seismicity; hydrology and water quality; air quality; noise and vibration; utilities; energy; hazardous materials; and public services.

The Final EIR indicates that the project would result in significant impacts, prior to mitigation, in the following areas: traffic; biological resources; visual quality; air quality; noise; and hazardous materials. With implementation of the proposed mitigation measures, construction impacts related to traffic, noise, and air quality would remain significant and unavoidable.

Five alternatives to the project were analyzed in the EIR: (1) no project; (2) Seismic Replacement Building 2 only; (3) alternative design; (4) alternative site; and (5) reduced project.

A Mitigation Monitoring Program, to ensure implementation of project-specific mitigation measures to reduce significant impacts, is included as an Appendix to the Final EIR. Monitoring of the implementation of mitigation measures will be conducted on an annual basis in conjunction with the annual status report for the 1990 LRDP Mitigation Monitoring Program.

#### **Findings**

The attached Findings discuss the project's impacts, mitigation measures for the projects, project alternatives, and reasons for rejecting the alternatives. The Findings also set forth overriding considerations for approval of the projects in view of their unavoidable significant environmental effects for short-term construction-related traffic, noise, and criteria air pollutant emissions.

(Attachments: Findings)

# PROJECT STATISTICS HEALTH SCIENCES SEISMIC REPLACEMENT BUILDING 2 & ORTHOPAEDIC HOSPITAL J. VERNON LUCK, SR., M.D. CENTER

### CAPITAL IMPROVEMENT BUDGET

#### LOS ANGELES CAMPUS CCCI 3909

(Approved October 1998 & March 2000)

	HSSRB2			<b>Luck Center</b>		
	<b>Amount</b>	0	% of Total	<u>Amount</u>	% of Total	
Site Clearance	\$ 194,000		0.3	\$ 414,000	1.1	
Building	46,750,000		80.2	28,990,000	77.4	
Exterior Utilities	1,029,000		1.8	591,000	1.6	
Site Development	867,000		1.5	887,000	2.4	
A/E Fees <sup>(a)</sup>	4,004,000		6.9	2,550,000	6.8	
Campus Admin. (b)	1,239,000		2.1	800,000	2.1	
Surveys, Tests	983,000		1.7	670,000	1.8	
Special Items <sup>(c)</sup>	748,000		1.3	1,004,000	2.7	
Contingency	2,438,000		4.2	1,544,000	4.1	
Total	58,252,000		100.0	37,450,000	100.0	
Group 2 & 3	453,000			250,000		
Equipment						
Total Project <sup>(d)</sup>	<u>\$58,705,000</u>			\$37,700,000		
Statistics		HSSRB2			Luck Center	
Gross Square Feet (gsf) <sup>(e)</sup>		133,000		95,000		
Assignable Square Feet (asf) <sup>(e)</sup>		86,606		51,520		
Rentable Square Feet (rsf) <sup>(f)</sup>		120,675		87,855		
Ratio asf/gsf (%): UC		66%	54%			
Ratio rsf/gsf (%): BOMA (f)		90%	92%			
Building Cost/gsf <sup>(e)(f)</sup>			\$351.50/gsf \$305.16/gsf		5.16/gsf	
Building Cost/asf <sup>(e)</sup>			\$539.80/asf	\$562.69/asf		
Building Cost/rsf			\$390.55/rsf	\$33	1.69/rsf	
Comparable University Projects @ CCCI 3909						
				Building Cost/gsf		
U Penn Institute of Advanced Science & Technology				\$408.93		
Yale Bass Center				\$408.83		
Harvard Warren Alpert Building East Quad Research				\$363.53		
UCLA Gonda (Goldschmied) Neurosciences & Genetics				\$347.61		
UCSF Mt. Zion Research Building				\$347.34		
UCLA Health Sciences Seismic Replacement Building 1				\$337.11		

<sup>(</sup>a) A/E fees include executive architect basic services contract of \$3,283,000 which represents 6.72% of approved construction budget for HSSRB2 and \$2,167,000 which is 7.03% of the approved construction budget for the Luck Center.

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<sup>(</sup>b) Campus Administration includes project management and inspection.

<sup>(</sup>c) Special Items include environmental impact report preparation, laboratory planning consultant, value engineering, structural peer review, wind tunnel consultant, moving costs, State Fire Marshal and Department of State Architect Review, and Environmental Safety, Telecommunications Services and Facilities Management assistance. They total \$748,00 for HSSRB2 and \$804,000 for the Luck Center with an additional interest expense totaling \$200,000 for the Luck Center.

<sup>(</sup>d) Current formal estimates verify that projected costs are within the approved budget.

<sup>(</sup>e) Gross square feet is the total area, including usable area, stairways, and space occupied by the structure itself. Assignable square feet is the net program area.

BOMA (Building Owners and Managers' Association). Rentable square feet is the usable area determined in accordance with BOMA standards for single tenant occupancy in commercial building space.