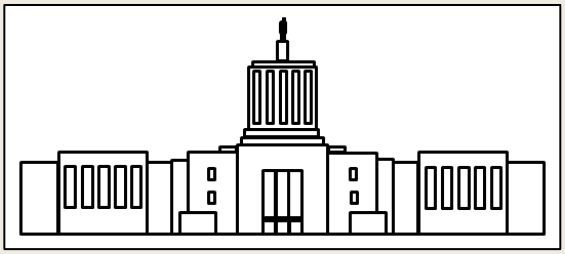
Report

to the

Seventy-Seventh

Legislative Assembly



Capitol Master Plan Review Committee

February 2013

The Capitol belongs to the people of Oregon, and the Legislature has an obligation to protect and preserve it. In our region, earthquakes are a serious threat. If a major earthquake strikes, the Capitol will likely be destroyed and lives lost.

Twenty years ago, the Legislature received a wake-up call when the Scotts Mills earthquake cracked the Rotunda, requiring extensive repairs. That wake-up call was echoed by the Public Commission on the Oregon Legislature in 2006 when it called for seismic improvements to the Capitol.

The Review Committee repeats that wake-up call today. The risks are real, and so are the safety and economic benefits of the Master Plan project as updated by the Review Committee. In the considered judgment of the Review Committee, the project is the right thing to do for the State of Oregon, its People, and their State Capitol. Given these warnings, the time to act is now.

TABLE OF CONTENTS

PREFACE 1

MASTER PLAN BACKGROUND 2

CONCERNS 5

1. Seismic Concerns 5
2. Other Life-Safety Concerns 7
3. Operational Concerns 9

RECOMMENDATIONS 11

1. Recommendation 1: Address the seismic and life-safety concerns as top priorities and address the operational concerns when efficient opportunities arise 13
2. Recommendation 2: Use guidelines for addressing the operational concerns, while leaving specific decisions to the Legislative Administrator and design team 17
3. Recommendation 3: Gain the early benefit of a planning consultant and then use the CM/GC contracting method with clear legislative oversight and a streamlined historic design review process 22
4. Recommendation 4: Following the 2015 Session, temporarily vacate the Capitol and coordinate the Master Plan with projects planned by DAS 26
5. Recommendation 5: Fund the project in stages 28

CONCLUSION 31

Appendix A – Seismic Retrofit Classifications 32

Appendix B – Recommended Project Organizational Chart 33

Appendix C – Historic Design Review Entities 34

Appendix D – Projected Master Plan Timeline 35

Appendix E – Specific Recommended Changes to 2009 Master Plan 36

PREFACE

The people of Oregon and their legislators have a long history of caring for their Capitol. Oregon's current Capitol was built in 1938 using a unique art deco design after the previous Capitol was destroyed by fire in 1935. From the very beginning, Oregon legislators sought to protect and preserve their new Capitol. For example, in as early as 1941, members of the Legislature were already working to protect the State Seal in the Rotunda from being "continuously desecrated and damaged" by being "walked upon as part of the rotunda floor."[1] Thanks to the perseverance of early legislators over several years, the State Seal ultimately received the protection it deserves.

That perseverance in service to the Capitol was shown again with the addition of the House and Senate Wings. The need for additional space in the Capitol was recognized in the early 1960's, but it was not until the 58th Legislative Assembly finally authorized the project in 1975 that the Wings became a reality. The project was completed in 1977, and the 58th Legislative Assembly is memorialized in the Capitol's Galleria for solving a problem that long vexed the Capitol. Every Legislative Assembly since has benefited.

Perhaps the greatest display of affection for the Capitol came from Oregon's schoolchildren. When the Golden Pioneer atop the Capitol needed to be re-gilded in 1984, schoolchildren throughout Oregon raised the money to do the job. They did it because they care about the Capitol. It belongs to them.

Every person who cares about the Oregon State Capitol follows in their footsteps. If the Capitol is lost, the efforts of those before us will be lost with it. By caring for Oregon's Capitol, the Legislative Assembly honors all Oregonians – past, present, and future.

[1] Senate Resolution 21 (1941).

MASTER PLAN BACKGROUND

The Oregon State Capitol belongs to the people of Oregon, and the Legislative Assembly is responsible for the operation, maintenance, and repair of the Capitol.[2] The Legislative Assembly takes that responsibility seriously.

On March 25, 1993, the Legislative Assembly got a wake-up call. The Scotts Mills earthquake rattled the Capitol, sending cracks through the Rotunda. In addition to immediate repairs, engineers at the time recommended a comprehensive seismic renovation of the Capitol, including base isolation.[3] Base isolation involves separating the Capitol's foundation from the ground and placing the foundation back down on flexible pads. These pads then help absorb the shock of an earthquake. In 1994, base isolation was included as part of a five-phase approach to seismically retrofit the Capitol. While the first phase was completed in 1994 by strengthening the Rotunda, the remaining four phases of seismic improvements – including base isolation – were never undertaken.

In 2005, the Legislature created the Public Commission on the Oregon Legislature to start a public conversation with the people of Oregon about the Legislative Assembly, including the Capitol. Among its recommendations, the Commission identified the "critical need for capital improvements to the Oregon State Capitol" including the "seismic rehabilitation of the building."[4] The Commission's 2006 report noted that "the price of renovation, no matter how extensive, will only increase over time" and recommended making "funding a renovation of the Capitol a priority."[5] The Commission recommended that the Legislature create an advisory committee to develop a comprehensive renovation plan to address seismic, life-safety, and operational needs in the Capitol.

The Legislative Assembly followed the Commission's recommendation. In 2007, the Legislature established the Capitol Master Plan Development Project. At the same time, the

---

[2] ORS 173.710, *et seq*. and ORS 276.002, *et seq*.

[3] Oregon State Capitol Master Plan Report, p. 5-27 to 5-28.

[4] Report by the Public Commission on the Oregon Legislature, pp. 39, 40.

[5] *Id*.

Legislature funded an immediate renovation of the House and Senate Wings to address serious plumbing and electrical concerns as well as to correct an overall blighted physical appearance of the Wings. The Wings renovation was completed during the 2007-08 interim between sessions.

The Master Plan project began in 2008. The Legislature's Master Plan Governance Group oversaw the development of the Master Plan by SRG Partnership, Inc., an architectural firm. The Oregon State Master Plan was released in June 2009 detailing recommended seismic repairs, life-safety improvements, and renovations to improve the operational efficiency of the Legislature.

In 2012, the Legislature created the Capitol Master Plan Review Committee ("Review Committee"). Members of the Review Committee are:

Gary Wilhelms, Chair
Senator Lee Beyer
Senator Ted Ferrioli
Representative Vicki Berger
Representative Nancy Nathanson
Fred VanNatta, Oregon State Capitol Foundation
Kerry Tymchuk, Oregon Historical Society
Glenn Gross, City of Salem
Randy Isaac, Facilities Services Manager, Oregon Legislature
Albert Castaneda, Citizen Member
Kim Duncan, Citizen Member
Kent Yu, Architect and Engineer*
Larry Sitz, Contractor*
* Non-voting *ex officio* members.

Under the authority of the Legislative Administration Committee, the Review Committee was asked to:

- Review the 2009 Capitol Master Plan and recommend changes, if necessary.
- Explore dislocation and relocation options.
- Determine a construction timetable and funding process.
- Develop a project methodology.
- Identify a project management structure.

- Evaluate publicity and public relations issues.
- Consider the impacts with local interest groups.
- Assess the economic impact of the project through job creation and increased economic activity.
- Examine the impact on traffic, parking, and street crossings.

Beginning in June 2012, the Review Committee conducted twelve meetings, heard testimony from experts and stakeholders, and completed its work in January 2013. Throughout its work, the Review Committee received assistance from Committee Administrator Obie Rutledge, Reading Clerk for the House of Representatives; Committee Assistant Patsy Wood, Committee Services; and Robert Taylor, Secretary of the Senate.

The Review Committee considered many alternatives to the Master Plan renovation, including constructing a new Capitol building in place of the current structure, or leaving the current Capitol intact as a museum without seismic upgrades and constructing a new office building to house the Legislature. The Review Committee, however, declined to embrace these alternatives. Instead, as in states like Utah, Idaho, and Washington, the Review Committee concluded that the Oregon State Capitol is worth the investment required to save it.

Based on its work and considered judgment, the Review Committee believes the Master Plan project is the right thing to do for the State of Oregon, its People, and their State Capitol. This report explains the Review Committee's recommendations for proceeding with the Master Plan.

CONCERNS

For 75 years, the current Oregon State Capitol building has served the people of Oregon well. The Capitol has been both an enduring symbol of the State of Oregon and a working office building housing the infrastructure of the entire Legislative Branch of state government.

Over the decades, however, the Capitol has developed three main concerns as identified by the Master Plan and Review Committee.

1. Seismic Concerns

The Capitol has serious seismic problems. In our region, earthquakes are a powerful threat. If a major earthquake strikes, the Capitol will likely be destroyed and lives lost.

Twenty years ago, the 1993 Scotts Mills earthquake exposed the Capitol's seismic flaws, cracking the Rotunda and requiring extensive repairs. Indeed, the 5.6 magnitude earthquake inspired a five-stage project to seismically retrofit the Capitol. The first phase of the project was completed in 1994, but the last four stages were never accomplished.

The risk and consequence of a major earthquake are real and severe. According to engineers, the Capitol is a collapse hazard in two different types of earthquakes: (1) an 8.0 magnitude Cascadia Subduction Zone earthquake near the coast; or (2) a 7.0 magnitude crustal earthquake in the Willamette Valley.[6]

For a Cascadia Subduction Zone earthquake, the likelihood of a magnitude 8.0 or larger earthquake in the next 50 years varies from 10% to 37%.[7] For the part of the subduction zone running south from Newport, the chance of a major earthquake in the next 50 years is 37%. For the part of the zone running north from Seaside, the chance of a major earthquake in the next 50

[6] Oregon State Capitol Master Plan, p. 5-28 (2009) (citing reports by KPFF Consulting Engineers and Miller-Gardner, Inc.).

[7] Richard A. Lovett, "Risk of giant quake off American west coast goes up," SCIENTIFIC AMERICAN, May 31, 2010 (citing study by Prof. Chris Goldfinger, marine geologist at Oregon State University).

years is 10-15%. The most commonly cited estimate places a 10-15% chance on a magnitude 9.0 earthquake impacting the Northwest in the next 50 years.[8]

Crustal, or shallow, earthquakes are recorded in the Northwest every day. Often these earthquakes are small, but larger damaging crustal earthquakes occur every few decades.[9] The Scotts Mills earthquake in 1993 was a crustal earthquake. Indeed, Oregon has had minor crustal earthquakes in just the last few months.[10] As one expert noted, "It reminds us we live in earthquake country and that we need to be prepared."[11]

If a large earthquake hits the Capitol, the consequences will be severe. These consequences include:

- **The loss of life to visitors and employees.** Each year 235,000 people visit the Capitol, including 130,000 schoolchildren.[12] In addition, over 400 people regularly work in the Capitol building, with as many as 1,000 people estimated to be present on a daily basis during legislative session. Further, with annual sessions approved by voters in 2010, more people will be in the building more often, increasing their exposure to the Capitol's seismic risks. An earthquake threatens the lives of those who visit and work in the building.

- **The loss of infrastructure for an entire branch of state government.** The Capitol houses the infrastructure for the entire Legislative Branch, including the Legislative Chambers, committee rooms, and information technology necessary for the Legislative Branch to operate. An earthquake could eliminate the infrastructure for this entire branch of government.

- **The destruction of an historic Oregon symbol.** The Oregon State Capitol is the most recognizable symbol of Oregon state government. The Capitol is home to artifacts from throughout Oregon's history, important works of art, and the historic Legislative Chambers.

As detailed below, the Review Committee recommends that the Legislative Assembly address these seismic concerns.

---

[8] Joe Rojas-Burke, "For Oregon coastal towns, lessons from the Japanese earthquake abound," *The Oregonian*, March 11, 2011.

[9] Cascadia Regional Earthquake Workgroup, SHALLOW EARTHQUAKES 2009, p. 4.

[10] "Minor earthquake rattles Portland area," *The Bend Bulletin*, November 20, 2012 (from wire reports; noting 3.1 magnitude quake 11 miles from Portland on November 19, 2012).

[11] *Id*. (quoting Scott Burns, a geologist from Portland State University).

[12] Estimates from Legislative Administration, Visitors Services.

2. Other Life-Safety Concerns

The Capitol has developed other serious life-safety concerns over the years. As compiled by the Legislature's Facility Services Division, these life-safety concerns include:

- **Lead.** In certain parts of the Capitol, lead is known to exist in the plumbing, ducting, and paint. This needs to be mitigated to limit exposure to occupants.

- **Asbestos.** Many areas of the Capitol pose asbestos dangers where it is unsafe for workers. Continued asbestos abatement is required to maintain existing equipment and to adapt areas for other uses.

- **Unsafe Electrical Panels.** Some areas of the building contain old electrical panels that were allowed in unsafe spaces. The risk to employees is significant, and the installations do not comply with code.

- **Fire Suppression at Electrical Systems.** The existing electrical distribution systems have no fire suppression. As the power feeds are large, substantial damage to life and property could occur before the systems are turned off.

- **Abandoned Wiring.** Although much was removed during the Wings renovation, a considerable amount of old data and power wiring runs throughout the building. In a fire, these would give off toxic gasses that could be deadly for those who may have otherwise escaped.

- **Fire Sprinklers and Alarms.** Many areas of the building are not protected by fire sprinklers and alarms. Some areas do not have signaling devices identifying that an emergency exits.

- **Fire Breaks.** The Capitol contains many passages and ducts that will likely act as chimneys, causing fire to spread uncontrollably from floor to floor. These passages include the stairways running from the ground floor to the top of the building without fire breaks. These passages and ducts need to be closed off with permanent structures or fire dampers.

- **False Ceilings.** Many areas have false ceilings below a plaster ceiling. This creates voids allowing a fire to spread and creates difficulty in finding and extinguishing fires.

- **Fire Doors.** At fire break lines, the existing doors do not close in the event of a fire alarm. A fire could spread through these openings.

- **Glazing.** Glass systems in the building do not have tempered glass at all needed locations. Non-tempered glass can cause serious injury when it breaks.

- **Ceiling Support.** Plaster ceiling structures have started separating from the concrete structure above in a number of locations throughout the 1938 building. Falling plaster from the ceiling can injure people below. Projects are underway to correct the current failures, and the remainder of these ceilings should be replaced or have additional support added to remove the risk of catastrophic failure and injury.

- **Flooding.** All utilities currently enter the Capitol underground, so the Capitol would be uninhabitable for some time after a flood.

- **High Pressure Steam.** The existing heat plant uses high pressure steam technology from 1938. In the event of a failure near a person, this high pressure steam system will cause injury.

- **Golden Pioneer Terrace.** There is no escape route for anyone touring the Golden Pioneer. Salem Fire Department trucks only reach half way to the observation platform. During a fire or other emergency, no means of rescue is readily available. This also applies to a medical emergency which would require over 100 steps down a small spiral staircase.

- **Paging System.** The Capitol does not have a public address system to advise occupants how to respond in an emergency. Given the large number of visitors to the Capitol, employees alone cannot communicate effectively to all visitors in an emergency.

- **Security.** The existing building lacks security perimeters, sufficient cameras, access systems, control points and other characteristics needed to provide a safe environment in a building which requires extensive public access.

As detailed below, the Review Committee recommends that the Legislative Assembly address these life-safety concerns.

3. Operational Concerns

Built in 1938 during the Great Depression, the Capitol has struggled to accommodate the operational needs of the Legislature. To increase space, the Capitol was expanded with the addition of two Wings in 1977. Since then, offices and utilities within the Capitol have been remodeled, reconfigured, and moved to meet the needs of the Legislature. While these changes satisfied immediate needs, they often did not take into account a comprehensive view of the Legislature's operations. As a result, the Capitol is no longer designed to efficiently do the Legislature's business. For example, the Review Committee has identified the following:

- **Outdated Building Systems.** The existing mechanical, electrical and plumbing systems have passed their designed useful life and require replacement or significant updating. Risks range from system failures to serious staff injury. For example, the elevator in the Governor's suite has not been significantly upgraded since 1938 and the unit is beyond its useful life. Further, the high pressure steam boiler used for heating the 1938 portion of the building requires high labor costs to operate and monitor.

- **Building Systems Conflict with Office Space.** For example, magnetic emissions from transformers in the basement interfere with computers on the first floor in Legislative Counsel.

- **Inefficient Allocation of Space.** Some departments, like Facility Services, have more space allocated to them in the Master Plan than they need, while other departments have too little. Some building systems, like the servers, are located in areas that could be used for offices.

- **Separation of Staff.** Committee staff are located two and three floors above the committee rooms they serve. Information Services staff are scattered among two floors and separated from the servers they support.

- **Duplication of Equipment and Cost.** Three different kitchens are dispersed throughout the building, duplicating maintenance and equipment costs.

- **Location of Public Safety Personnel.** The State Police are located in a corner of the basement instead of in a central and more responsive location.

- **Inconvenient Public Services.** Public services, like the café and ATM, are tucked away in hard to find places.

- **ADA Access.** Areas throughout the building pose ADA accessibility concerns.

- **School Bus Accessibility.** The layout of the Court Street entrance requires school buses to park in a reserved fire lane and off-load students into a vehicle thru-lane. This poses a danger to the students visiting the Capitol by bus.

As detailed below, the Review Committee recommends that the Legislative Assembly address these operational concerns when efficient opportunities arise.

RECOMMENDATIONS

Based on this background and these concerns, the Review Committee makes the following recommendations, which are described in detail in the remainder of the report:

Recommendation 1: Address the seismic and other life-safety concerns as top priorities and address the operational concerns when efficient opportunities arise. The Legislative Assembly should seismically retrofit the Capitol and correct the other life-safety issues throughout the building. When work is being done to achieve the seismic and life-safety repairs, it will be possible to do the work necessary to correct operational deficiencies at the same time in order to reduce overall construction costs.

Recommendation 2: Use guidelines for addressing the operational concerns, while leaving specific decisions to the Legislative Administrator and design team. The Legislative Assembly should provide guidelines for how space should be allocated and used in the Capitol, while leaving specific decisions about the location of offices in the Capitol to the Legislative Administrator and design team engaged in the construction. Further, needs within the Capitol change over time, and guidelines will provide useful direction while still giving the Legislative Administrator flexibility to address changing needs. The Review Committee has recommended a set of guidelines beginning at page 17 of this report.

Recommendation 3: Gain the early benefit of a planning consultant and then use the Construction Manager/General Contractor ("CM/GC") contracting method with clear legislative oversight and a streamlined historic design review process. Early help from a planning consultant will lay the groundwork for a successful project. Further, the CM/GC contracting method is widely used on projects of this size. The project should be overseen by the Legislative Administration Committee with a single point of contact from the Legislature to the construction team. To the greatest extent possible, the historic design review process for the Capitol Master Plan should be streamlined and coordinated within a single entity.

<u>Recommendation 4</u>: Following the 2015 Session, temporarily vacate the Capitol and coordinate the Master Plan with projects planned by the Department of Administrative Services ("DAS"). Construction of the Master Plan project should begin following the 2015 Session with the anticipated completion of the project before the 2019 Session. The Capitol should be vacated for the duration of the Master Plan project. DAS is planning other construction on the Capitol Mall, and space in a new office building planned by DAS can be used to house the Legislative Branch during construction of the Master Plan project. Close coordination with DAS's project will reduce overall costs and minimize complications with the Master Plan.

<u>Recommendation 5</u>: Fund the project in stages. The Legislature should fund the project in stages. First, a small initial expenditure should be made in the 2011-13 biennium to begin more detailed planning of the project. Next, a larger expenditure in the 2013-15 biennium should be made using bonding authority to complete the planning and design process. Finally, additional bonding authority should be granted beginning in the 2015 Session for the actual construction.

These recommendations are each discussed in detail in the remainder of the report.

Recommendation 1:

Address the seismic and other life-safety concerns as top priorities and address the operational concerns when efficient opportunities arise.

At a very basic level, the Legislature must decide whether the Capitol is worth the investment required to save it. The Review Committee engaged in a serious and thoughtful discussion of that topic, particularly since the Master Plan's estimated cost is approximately $252 million.[13] For example, the Legislative Assembly could simply decide to do nothing. In that case, if the building is destroyed in an earthquake, fire, or other calamity, the cost to rebuild a comparable Capitol building ranges between $300 and $475 million.[14] That cost is higher than the Master Plan's estimated $252 million and, of course, does not account for the lives potentially lost in such a scenario. Alternatively, the Capitol could be left open as a museum without seismic upgrades, and a comparably-sized and seismically-safe new legislative office building could be built for between $127 and $145 million, excluding land costs, site work and other expenses.[15] That option, however, leaves a large museum occupied by visitors still at risk of collapse or fire with the state then responsible for maintaining two buildings instead of one. Based on its analysis, the Review Committee declined to embrace either of these alternatives.

Instead, the Review Committee concluded that the Capitol is worth the investment to save. The Capitol houses the entire infrastructure of the Legislative Branch of state government, and the Capitol also serves as an historic symbol of our state. The Capitol should be saved, and it may be lost if the seismic and other life-safety concerns are not addressed. The risk of a major seismic event is real, and the Legislature must answer the wake-up call provided by the Scotts Mills earthquake. Indeed, while the Rotunda was strengthened in 1994, the other four phases of recommended seismic improvements were never undertaken.

---

[13] The Master Plan's estimated total cost is $227 million, not including moving and relocation costs. That cost is based on the Master Plan as released in June 2009 and does not take into account proposed changes to the Master Plan by the Review Committee that might increase or decrease costs. In addition, as discussed below, the Review Committee estimates that moving and relocation expenses could total approximately $25 million.

[14] Memorandum from SRG Partnership, Inc. titled "Master Plan Questions & Clarifications" dated October 15, 2012, p. 2.

[15] *Id*. (estimating construction costs in the $350-$400/s.f. range for a comparably sized 363,000 square foot office building).

Seismic retrofit projects are generally classified into four different levels depending on the extent of the work performed: (1) Basic Life Safety; (2) Enhanced Life Safety; (3) Enhanced Damage Control; and (4) Immediate Occupancy. Of the four classifications, Basic Life Safety is the least costly, and Immediate Occupancy is the most costly. These classifications are discussed further in Appendix A.

The 2009 Master Plan recommended a retrofit to the level of Immediate Occupancy. After an investigation into a similar seismic retrofit project at Utah's State Capitol, the Review Committee believes that a retrofit to the level of Immediate Occupancy is not realistic. To fully achieve Immediate Occupancy with a historic Capitol building, the building would have to be essentially reconstructed with new materials. That, of course, is inconsistent with preserving the historic building itself.

Instead, the Review Committee recommends a retrofit to at least the level of Enhanced Life Safety. Further, the Review Committee recommends that the design team study the performance, risk, and cost differences between an Enhanced Life Safety retrofit and an Enhanced Damage Control retrofit. The major differences appear to be cost, how soon the Capitol could be occupied after a major earthquake, and the level of repairs that would be required. The design team should review and present both options during the design phase, so the risks and costs of each alternative can be evaluated.

The Master Plan contemplates using base isolation to seismically retrofit the Capitol. Base isolation involves separating the Capitol's foundation from the ground and placing the foundation back down on flexible pads. These pads then help absorb the shock of an earthquake.

The Review Committee believes base isolation is the preferred option for the seismic work. To confirm that base isolation is the best approach, additional preliminary work must be done. This additional work incudes soil studies, engineering analysis, and an evaluation of other methods to seismically retrofit the Capitol. In addition to the base isolation identified in the 2009 Master Plan, other seismic work may be required, including strengthening shear walls throughout the Capitol. This additional seismic work may be extensive throughout much of the building and may add to the overall project costs depending on how much work is required.

The Review Committee also recommends that the 1938 portion of the Capitol be base isolated together with the 1977 Capitol Wings. In an attempt to find ways to stage the construction and minimize the disruption to the Legislature, the Review Committee considered scenarios for base isolating the Wings separately from the 1938 building. Those scenarios, however, were not fruitful. Indeed, separately isolating different portions of the building could actually result in

those separate parts of the building crashing into each other during an earthquake. Overcoming that problem to separately isolate the buildings poses an expensive engineering challenge. Instead, the most cost effective and safest approach to base isolation involves combining the isolation for both the 1938 and 1977 portions of the Capitol.

In addition to the seismic issues, the Capitol faces other serious life-safety concerns. These concerns include fire, flooding, lead, asbestos, and other issues. Correcting these issues will provide an obvious health and safety benefit to the people who visit and work in the Capitol. More than that, however, by correcting these problems the Oregon Legislature can demonstrate to the public that the Legislature has learned the lessons from the past. For example, two of Oregon's previous Capitol buildings were destroyed by fire (in 1855 and 1935) so the public might reasonably expect the Legislature to correct the known fire dangers in the current Capitol. Similarly, the public might reasonably expect the Legislature to correct the known dangers caused by flooding, lead, asbestos and other problems in the Capitol.

Making the Capitol safe and secure must be the top priority of any construction project. As part of these safety improvements, considerable parts of the Capitol will be under heavy construction. To perform the construction, these areas will have to be effectively demolished and rebuilt to finish the work. When that is being done, there will be opportunities to rebuild those areas in a way that better serves the Legislature and achieves operational efficiencies.

The starkest example of this potential for efficiency is the Master Plan's proposed Concourse Level on the Ground Floor. The Ground Floor will have to be essentially demolished to perform the seismic retrofit using base isolation. The Ground Floor will then have to be rebuilt after the base isolation is complete. When rebuilt, the Ground Floor could be constructed to match the current existing condition that does not serve the Capitol well, with its mechanical equipment taking up valuable space and high-traffic areas located in hard-to-find places. Alternatively, the Ground Floor could be constructed in a way that more effectively serves the needs of the Legislature and the public, which is the idea behind the Master Plan's Concourse Level with additional hearing rooms, centralized café, and relocated mechanical equipment. If the Legislature has to rebuild the area, it might as well rebuild it in a way that serves the Capitol better.

While the Concourse Level provides the starkest example of achieving efficiencies to address operational problems, there are other opportunities as well. For example, if walls have to be gutted to abate asbestos or replace lead-based plumbing, it might make sense to rebuild the walls in a different location to reconfigure floor space. The Review Committee does not intend to identify all the areas where efficiencies can be gained. Instead, the Review Committee

emphasizes that the seismic and life-safety repairs are the top priority, and while those repairs are being made the Legislature and design team should pursue ways to achieve operational efficiencies at the same time.

Indeed, these opportunities for efficiency may arise both during construction and after the repairs are complete. The needs of the Capitol change over time. For example, when the House of Representatives was tied 30-30 in 2011-13, space was reconfigured to accommodate the joint leadership structure in the House. This recent example shows how the needs of the Capitol are always changing, and any decision about specific locations and uses within the Capitol must yield to those changes over time. These changes, however, should always be done with an eye toward the efficient operation of the Capitol as a whole. As discussed below, the Review Committee believes a set of guidelines will help ensure that operational efficiencies are achieved while providing flexibility to meet the Legislature's changing needs over time.

In addition to the seismic and other life-safety benefits, the Master Plan project will provide a significant economic impact for the state. The Master Plan is estimated to cost approximately $252 million. As a result of that spending to improve the Capitol, the Legislative Revenue Office ("LRO") estimates[16] the following economic benefits:

- Over 800 direct, indirect, and induced full time equivalent positions (FTEs) for each of the four years from 2015 through 2018 during the construction of the project.[17]
- The addition of $166.6 million in labor income in the state.[18]
- The addition of $405.7 million in productivity to Oregon's Gross State Product.[19]

The economic impacts of this project are real and substantial. Those economic benefits can be achieved while preserving an historic symbol of Oregon and protecting the infrastructure of an entire branch of government.

---

[16] Compiled from testimony and materials provided by Paul Warner, Legislative Revenue Officer, to the Review Committee on October 2, 2012, and follow-up material provided on January 31, 2013, based on an estimated design and construction cost of $225.4 million over six years on the Projected Master Plan Timeline shown in Appendix D.

[17] LRO estimates that every $1 million in project spending yields 17 annual full time equivalent positions (FTEs), with 9.8 being directly related to the project, 2.9 being indirectly related to the project, and 4.3 being induced by the project. LRO assumed that the project would last six years, with $5 million spent in 2013, $15 million spent in 2014 and about $51 million spent in each of the last four years of the project from 2015 through 2018. This yields an estimated 85 FTEs in 2013, 255 FTEs in 2014, and 835 FTEs in each of the last four years from 2015 through 2018.

[18] LRO estimates that every $1 million in project spending yields $732,000 in labor income.

[19] LRO estimates that every $1 million in project spending yields $1.8 million in economic output added to the Gross State Product.

Recommendation 2:

Use guidelines for addressing the operational concerns, while leaving specific decisions to the Legislative Administrator and design team.

The 2009 Master Plan contained detailed plans for relocating offices and reallocating space within the Capitol. The Review Committee's recommendation to focus on seismic and other life-safety repairs, however, reduces the emphasis that should be placed on the 2009 Master Plan's specific allocation of space and location of offices. Instead, the work should focus on the seismic and other life-safety repairs with operational improvements done as opportunities arise.

This opportunistic approach to gain efficiencies requires flexibility. To achieve that flexibility, the Review Committee recommends using guidelines to address the operational concerns as they arise. [20] Ultimately, the Legislative Administrator is responsible for directing the renovation and repair of the Capitol, and the Administrator should develop guidelines at the direction of the Legislative Administration Committee.[21]

To assist the effort, the Review Committee has developed a set of recommended guidelines to address the operational concerns in the Capitol. Depending on the facts of a particular case, the guidelines may point in conflicting directions. Accordingly, the Review Committee recognizes the importance of the Legislative Administrator's role in considering and resolving any conflicts as effectively as possible.

The recommended guidelines[22] are:

1. **Retain Presence of Constitutional Officers in the Capitol:** The Governor, Secretary of State, and Treasurer have a long historic ceremonial presence in the Capitol. That presence should continue. The Governor's Suite in Room 254 should

[20] Where the Review Committee identified specific recommended changes to the 2009 Master Plan those items are listed in Appendix E. The Legislative Administrator and design team may also identify items to add to the list.

[21] ORS 173.720(1)(h).

[22] The guidelines are listed here by the Review Committee in no particular order, and no weight should be given to the order in which they appear.

remain intact. The Secretary of State and Treasurer should retain a presence in the Capitol, and the scope of that presence should be thoughtfully reviewed by the design team and the Legislative Administration Committee. Further, the Review Committee encourages the Secretary of State and Treasurer to make their ceremonial offices accessible to the public in the same way the Governor's ceremonial office is open to visitors. Accomplishing this public access might require creating working office space for the Secretary of State and Treasurer in Executive Branch buildings on the Mall close to the agencies they oversee.

2. **First Floor Focused on Public Services:** The first floor of the Capitol, including the Wings, should be focused primarily on offices that serve the public and not those with little public interaction. Offices on the first floor that have little public interaction include the Legislative Counsel's Office, the Legislative Fiscal Office, the Legislative Revenue Office and the Governor's space in Room 160. In relocating offices in the Capitol, first priority should be given to those offices and functions serving the public and the Legislature. Since space in the Capitol is limited, the Governor, Secretary of State and Treasurer should use their absences from the Capitol during construction to evaluate what staff is essential to have in the Capitol and whether executive staff may be better located in other Executive Branch buildings on the Capitol Mall closer to the employees they manage.

3. **Encourage Flexible Multi-Use Spaces:** The Capitol requires space for different purposes at different times. Flexible space is preferred, especially in cases where new space is constructed as a result of the seismic and other life-safety repairs. Promoting flexible space will help avoid having large parts of the Capitol out of service for long periods. Rather than reduce the space allocated for hearing rooms under the Master Plan, the Review Committee suggests planning those hearing rooms so they can be used for other purposes when the Legislature is not in session. New hearing room space should also promote remote access for the public through technology by providing both the ability to watch and participate in hearings.

4. **Keep Similar Functions Together:** Wherever possible, staff serving similar functions or operating within the same department should be located together. For example, Information Services personnel should be located together, and Facility Services personnel should be located together. Similarly, Committee Services staff should be located together in an area closer to the hearing rooms they support. Keeping departments together promotes good management.

5. **Consider Feasibility of Moving Building Systems:** Certain building systems will need to be moved to accommodate the seismic and other life-safety repairs. However, where systems are not required to be moved to accommodate those repairs, great care should be given to the cost associated with relocating wiring, media equipment, computer equipment, servers, ducting, mechanical systems, and plumbing systems. For example, it may be cost-prohibitive to move certain Information Services and Media Services functions due to the expense associated with rerouting cables or relocating equipment.

6. **Make Building Access Safer for Schoolchildren and Pedestrians:** The Capitol needs a safe place for school buses to drop off children, and options along Waverly Street should be considered. Pedestrian access to the Capitol can be dangerous and large crowds assembled on the front steps can cause congestion and safety concerns. The Review Committee recommends considering options to make the front steps more appealing, accessible, and safer for pedestrians. One option might be to create a plaza connecting the front of the Capitol to the Mall, while putting Court Street underground in front of the Capitol. This would provide a safe and seamless transition from the Capitol to the Capitol Mall, similar to the transition from the Lincoln Memorial to the Capitol Mall in Washington, D.C. This option, however, must consider the possible impact to the tunnel under Court Street and to drivers whose view of the Capitol from Court Street will be severely restricted. The Review Committee suggests that the design team evaluate the cost of any plaza together with any positive and negative impacts.

7. **General Building Accessibility:** Where possible, modifications should be made to the Capitol to keep the building open and accessible to visitors, including on weekends and holidays. This might include allowing certain parts of the building to be closed off at times to address fire-life-safety concerns and to promote weekend and evening uses.

8. **Areas Near Windows Should Generally be Used for Offices:** Areas near windows should generally be used for offices, not equipment like network servers as contemplated in the 2009 Master Plan. Also, committee rooms with windows often pose a challenge to audio-video equipment. Alternative locations for committee rooms away from windows should be considered.

9. **Locate Building Systems in Areas that do not Interfere with Offices:** For example, the transformers in the Wings interfere with the computers in Legislative

Counsel, and require Counsel to use their space less efficiently than they prefer. Similarly, the servers are located on the first floor of the Senate Wing in an area possibly more suitable for office space. These conflicts between building systems and office space should be minimized.

10. **Flexibility for Locating History Center Space:** The Legislative Administrator is charged with locating a Capitol History Center in the building to educate visitors on Oregon's history and government. The 2009 Master Plan placed the History Center in space currently occupied by the Treasurer. Instead, the Review Committee recommends giving the Administrator flexibility to determine an appropriate location for the Capitol History Center, and the Administrator should coordinate with related projects currently underway in the Capitol.

11. **Security:** As contemplated by the 2009 Master Plan, the location of the State Police in the basement level of the Capitol does not compliment the security needs of the building. Alternative locations should be considered that give the State Police a better opportunity to provide safety to the Capitol's employees and visitors.

12. **Provide Adequate Space for Tenants Paying Rent:** Space in the Capitol is rented to the media, the café, and the lobby. As contemplated, the 2009 Master Plan may not adequately address their role in serving the needs of the public, Capitol staff, visitors, and other constituencies throughout the state. Accordingly, the design team should provide adequate space to these rent-paying tenants.

13. **Combine the Senate and House Lounges:** The Review Committee recognizes the economic and governance benefits of a legislative lounge. A legislative lounge provides a place within the Capitol where members can interact with their colleagues free from the demands of others. Currently the Capitol has a separate Senate and House Lounge, and the Review Committee recommends combining these into a single lounge to promote operational efficiencies, and collegiality between the legislative chambers. The design team should also explore the possibility of any economic and operational benefits of locating the combined lounge in close proximity to the café, but the legislative lounge should remain a separate facility reserved for members.

14. **Other Reasonable Recommendations from the Design Team:** As the Master Plan design and construction gets under way, the design team may discover other reasonable ways to address operational concerns within the Capitol. The design team should be free to make those recommendations. Likewise, if there are any new

building methods or materials, the design team should feel free to make recommendations during the project to save costs and promote efficiencies.

Using these guidelines will help ensure that smart and cost-effective decisions are made to address the Legislature's operational concerns as opportunities arise.

Recommendation 3:

Gain the early benefit of a planning consultant and then use the CM/GC contracting method with clear legislative oversight and a streamlined historic design review process.

The Capitol Master Plan is a large, expensive project affecting an historic building occupied by several important and diffuse decision-makers. Accordingly, the Review Committee recommends a construction process that will:

- Promote early coordination between the owner, architect, and contractor.
- Provide a clear mechanism for legislative oversight of the project.
- Streamline the historic design review involved in the project.

For reference, Appendix B shows a recommended organizational structure for the Master Plan work.

Promoting Early Coordination

Early and continued coordination is critical on a project of this size and complexity. As a first step, the Review Committee recommends hiring a planning consultant[23] experienced with similar construction projects. The Review Committee recommends hiring the planning consultant as soon as the spring of 2013. This planning consultant would provide two early elements necessary to coordinate the project. First, the planning consultant will develop the information necessary to get bids from a qualified design team. This information will include the critical services required from the design team, the suggested qualifications of the design team, and the particular challenges the design team should be aware of before starting the project. Second, the planning consultant can work with the Legislative Administrator, the Legislative Administration Committee, and other stakeholders to flesh out and refine the guidelines that will steer the project. These guidelines might include those identified earlier by the Review Committee, but

[23] In the construction industry, a planning consultant is also referred to as a program manager.

the planning consultant should also feel free to recommend additions, deletions, or modifications to the guidelines based on the consultant's experience and professional judgment.

Building on the work of the planning consultant, the Legislature can then hire the design team in the summer of 2013. The design team will consist of the architect, construction manager/general contractor, and owner's representative, in addition to the Legislature's own Facility Services staff and experts from the Department of Administrative Services. Site testing and design work could begin in the fall of 2013, and schematic designs and construction cost estimates could be developed before the 2015 Session. Those designs and cost estimates could then be used to develop a bonding package for the 2015 Session to fund the construction.

The Review Committee recommends that the design team work together using the Construction Manager/General Contractor ("CM/GC") method to promote early coordination between the owner, architect, and contractor. Under the CM/GC method, the building's owner contracts with an architect to design the project. At the same time, the owner hires a construction manager to assist as a consultant during the design. The construction manager is a contractor who provides input during the design phase regarding timing, materials, and other practical aspects of construction. When the time for construction arrives, the construction manager then operates as the general contractor for the project. Under a CM/GC contract, the contractor is paid a fee for the work and provides the owner a Guaranteed Maximum Price ("GMP") early in the project. The owner can then use the GMP to help plan and finance the project. Any unused contingencies in the GMP are then returned to the owner at the end of the project.

Using the CM/GC method has four main advantages for the Master Plan. First, this contracting method is widely recognized as appropriate for large projects like the Capitol Master Plan. Second, the CM/GC method allows the contractor to work closely with the architect early in the process. This early coordination between the owner, architect, and contractor is critical in a large project. Third, the CM/GC method can help address unforeseen conditions by promoting coordination. Finally, having a GMP developed early in the project will assist the Legislature in planning and financing the project, and may save costs and reduce delays.

Under any contracting method used for the project it is imperative that the Legislature follow conventional procurement methods and act consistently with Oregon's wage and hour laws. This project will receive considerable attention, and it is critical that the contracting methods used comply with Oregon law. In addition, to the extent possible, local Oregon labor and suppliers should be used on this project affecting an important Oregon symbol.

Clear Legislative Oversight

Using the existing Legislative Administration Committee ("LAC") will provide a clear mechanism for legislative oversight of the project. Using LAC has several advantages. First, the committee already exists and is required by law to oversee any renovation or repair of the Capitol.[24] Second, the committee already is the appointing authority for the Legislative Administrator who is required by statute to direct the renovation and repair of the Capitol.[25] Third, the Legislative Administration Committee is composed of the President of the Senate, Speaker of the House, and caucus leaders from both Chambers. As a result, having LAC oversee the Master Plan will ensure that legislative leadership is closely aware of the project, regardless of changes in the make-up of that leadership.

In its discretion, the Legislative Administration Committee might consider two slight adjustments to its membership for purposes of the Master Plan only. First, LAC might add an *ad hoc* member to equalize the partisan composition of the committee at any given time. LAC has earned a reputation as a committee focused on the proper operation of the Capitol – without regard to politics – and the Review Committee anticipates that practice to continue regardless of the composition of the committee. Second, LAC might consider adding the Governor, or the Governor's appointee, as an *ex officio* non-voting member of the committee for purposes of the Master Plan only. This will ensure that the Governor is aware of developments with the Master Plan, both as the Chief Executive of the State and as a central occupant of the building.

Given the complexity of the Master Plan project, the Legislative Administrator may find it advisable to hire a single owner's representative for the Legislature. This owner's representative would be an employee of the Legislature devoted to the Master Plan work and would provide a single point of contact for the construction team and the owner's team. All work related to the Master Plan would go through this single point of contact.

Further, a project of this size will likely require quality assurance testing by independent contractors hired by the Legislature. This best practice will ensure that the construction executed by the builders meets the requirements for the project. Typical independent testing might include testing to ensure the site is properly prepared and that materials are sufficiently strong.

In addition to oversight, the Legislature must also clearly communicate the Master Plan's objectives and impacts to the public and interested agencies. For example, once the project is underway, there will be impacts on traffic around the Capitol, neighboring institutions like

[24] ORS 173.720(1)(h); ORS 276.002(5).

[25] ORS 173.720(1)(h).

Willamette University will be impacted, and citizens in Salem and throughout Oregon may be acutely interested in the progress of the work. The Review Committee emphasizes these critical communication needs and recommends that they be met internally within the Legislative Branch. The owner's representative would oversee the work of the communications personnel on the project.

Streamline Historic Design Review

Presently, several different entities have jurisdiction over historical aspects of the Capitol. Appendix C lists and describes these entities.

The Review Committee recognizes the challenge posed to the Master Plan by these various entities, each having a different say in the historic preservation of the building. To address this challenge, the Review Committee recommends making the Capitol Preservation Advisory Committee ("CPAC") the supreme advisory entity charged with providing input to the Master Plan project. CPAC is appointed by the Legislative Administrator and shares similar jurisdiction with other entities involved in historic design review for the Capitol. CPAC is focused on the Capitol building and is charged with providing advice to the Legislative Administrator about preserving historic areas of the building.

CPAC should be expanded to include members from the other entities involved in historic design review, including the State Historic Preservation Office ("SHPO"), the State Parks Department, and the City of Salem. CPAC, as expanded for the Master Plan, would advise the Legislative Administrator about historic preservation, and the Administrator would take that advice into account when directing the renovation of the Capitol.

Consistent with this recommendation by the Review Committee, SHPO and the City of Salem are already working together with Legislative Administration to coordinate and streamline the historic design review process for the Capitol. The unique nature of the Master Plan project requires a streamlined process, and the Review Committee is encouraged to see that coordination between the different entities has already begun. The success of this project depends in large part on their ability to successfully streamline and coordinate their activities.

Recommendation 4:

Following the 2015 Session, temporarily vacate the Capitol and coordinate the Master Plan with projects planned by DAS.

The Capitol is a working building. One of the most difficult issues confronted by the Review Committee was how to accommodate the construction schedule around the Legislature's work. After considerable study, the Review Committee reached three basic conclusions.

First, the Review Committee recommends beginning construction as soon as possible during the interim following the 2015 Session with an anticipated completion date for the work before the 2019 Session. That schedule should give enough time to do the pre-construction planning and design work before breaking ground following the 2015 Session, and there should be enough time to complete the project before the 2019 Session. Appendix D shows a recommended construction timeline for the Master Plan work.

Second, the Review Committee recommends that the Capitol be vacated for the duration of the construction beginning as soon as possible following the 2015 Session. Base isolation under the Capitol will require extensive excavation. It is the considered judgment of the Review Committee that the building should be unoccupied while the work is done. Based on the expected construction schedule, this will require the Legislative Branch to relocate for the 2016 Short Session, 2017 Long Session, 2018 Short Session, and the interim periods in between. In addition to safety concerns, the work can proceed more efficiently if the contractor does not have to work around tenants or alter construction methods to accommodate occupants. Staying out of the building for the duration of construction will reduce risks, save money, and limit construction problems.

Third, the Review Committee recommends coordinating with DAS to provide the temporary space needed to relocate the Legislature from 2015 to 2019. DAS currently has plans for construction projects in the Capitol Mall area, including the construction of a new Executive Branch office building. Currently, DAS is spending considerable state resources to rent space for state agencies on the private market. By constructing a new office building, DAS can save overall costs by bonding the construction at favorable rates while eliminating expensive leases

from the state's balance sheet. If it receives the necessary approvals and funding, DAS expects the new office building can be completed by the interim following the 2015 Session.

This timing presents an opportunity for the Legislature to coordinate with DAS. If the new office building is finished by the interim following the 2015 Session, the Legislature can relocate to the office building from 2015 until the start of the 2019 Session. The new office building will have flexible space and will be large enough to accommodate the Legislature for the 2016 Short Session, 2017 Long Session, 2018 Short Session, and the interim periods. Once the Master Plan project is complete in 2019, the Legislature can move back into the Capitol, and Executive Branch agencies can be located in the new building to eliminate costly private sector leases.

Relocating to a newly built Executive Branch building has four main benefits. First, finding adequate and appropriate space for the Legislature to meet for one Long Session and two Short Sessions in the Salem area is a challenge.[26] A new Executive Branch building with flexible space would meet the Legislature's needs. Second, the timing of DAS's project and the Master Plan construction makes coordination between the two projects an ideal fit. Third, to the extent the Legislature is required to pay rent for using the new Executive Branch building, the result would be one branch of government paying another branch of government. This helps mitigate the net effect on the overall state budget. Fourth, temporarily relocating to a place near the Capitol Mall keeps the Legislature close to the other agencies and infrastructure that support the Legislature during session.

There will still be costs associated with moving and relocating the Legislature, and those costs were not reflected in the 2009 Master Plan. DAS estimates that monthly rental space costs approximately $1.41/sq. ft., and the Review Committee believes the Legislature will require approximately 250,000 sq. ft. in temporary space. Further, DAS estimates that moving costs total approximately $15-24/sq. ft. for a one-way move of office space. Based on these estimates, accommodating a 42 month absence from the Capitol from July 2015 through December 2018 could cost approximately $24.8 million in rental and moving expenses.[27] These costs could be paid with bonds sold to finance the construction, and the rental expense would be paid to another state agency rather than an outside landlord.

---

[26] "The permanent seat of government for the state shall be Marion County." Oregon Constitution, Article XIV, Sec. 1.

[27] Rental expenses are estimated for 250,000 sq. ft. at $1.41/sq. ft. per month for 42 months totaling $14.8 million. Moving expenses are estimated at $20/sq. ft. for 250,000 sq. ft. for two moves (one out and one back into the Capitol) totaling $10 million. The period of July 2015 through December 2018 is used in the estimate because it encompasses the entire period from the end of the 2015 Session to the start of the 2019 Session.

Recommendation 5:

Fund the project in stages.

The total cost for the original Master Plan plus estimated relocation costs is approximately $252 million as of 2009. Given the economy since 2009, that figure still applies in 2012. However, over the next few years, that figure can be expected to rise approximately 3-4% per year.

The estimated project costs are as follows:

Concerns Addressed	Cost	Description
Seismic Concerns	$138,400,000[28]	This pays for the seismic renovation and rebuilding of the ground floor, including the enclosure of the two existing courtyards to create additional space in the Capitol on the Concourse Level.
Other Life-Safety Concerns Operational Concerns	$89,100,000[29]	This pays for the other life-safety concerns throughout the Capitol, and also addresses many of the operational concerns.
Estimated Relocation and Moving Expenses	$24,800,000[30]	This pays for a 42 month relocation and a move in and out of the Capitol.
Total:	$252,300,000	

[28] Oregon State Capitol Master Plan, p. 6-5 (2009) (cost for "Phase 1" that included primarily seismic repairs and rebuilding the Concourse Level).

[29] *Id.* (cost for "Phase 2" that included other interior renovations of the First through Fourth Floors).

[30] Estimate by Review Committee based on information from DAS.

The estimated cost for the Master Plan likely will change based on the Review Committee's recommended revisions to the Master Plan. Many of these recommended revisions will reduce overall costs, while some revisions will increase costs. As part of the initial expenditure recommended below, a better estimate of the revised Master Plan's costs will be developed. By retaining a contract manager/general contractor ("CM/GC") early in the process, the Legislature can secure a Guaranteed Maximum Price ("GMP") that can be used to plan the later bond financing of the project.

The Review Committee recommends funding the project in three steps as follows:

1. **Develop Pre-Construction Plan.** The first step requires a $250,000 appropriation from the rebalance of the 2011-13 budget. With these funds, the Legislature can hire a planning consultant to develop a pre-construction plan that identifies the design team requirements and begins to refine the project's guidelines. If the appropriation is made in March of 2013, the pre-construction plan should be developed by June of 2013.

2. **Execute Pre-Construction Plan.** The second step involves funding the execution of the pre-construction plan. This step requires a portion of the $20-30 million required for the design phase of the project. According to the Legislative Fiscal Office, these funds are best provided through a bonding package in the 2013 Session with the funds becoming available in the fall of 2013. These funds would buy:

    - Engineering studies, including geological surveys, to confirm the feasibility of base isolation for the seismic retrofit.

    - Project management services to develop a construction plan, including a plan for staging the work and relocating staff.

    - Architectural plans sufficient for the CM/GC to develop a Guaranteed Maximum Price to inform the bond financing plan.

3. **Execute Construction.** The final step involves further bond financing for the actual construction. Given the current favorable bond rates, the Review Committee recommends using Article XI-Q bonds (which replaced Certificates of Participation) to finance the remaining construction costs. The Review Committee was advised that there will be approximately $2.6 billion in bonding capacity in the 2013-15 biennium and about the same amount in the next two biennia. Any financing for the Master Plan must be sensitive to the state's debt limits and other proposed capital projects. Finally, any

General Fund appropriations for this project can ultimately be repaid to the General Fund from proceeds of the bond sales.

Since this project will span across biennia, multiple rounds of bond financing will be required. Bonding authority lasts for a single biennium, while the proceeds from a bond sale can be spent across biennia. To reduce total interest payments on the debt, however, bond sales should be arranged on a quarterly basis to meet the cash-flow requirements of the project while reducing overall debt service costs.

The Review Committee considered alternative possibilities like Lottery bonds and a sale-and-lease-back arrangement with the Common School Fund. However, these financing options proved unfeasible.

The Review Committee recommends that the Capitol Master Plan construction project be added immediately to the state's Six Year Capital Construction Plan so the impacts of the project can be considered together with other planned construction.

Appendix D shows a projected timeline of the project together with a proposed funding schedule.

CONCLUSION

The Capitol belongs to the people of Oregon, and the Legislature has an obligation to protect and preserve it. In our region, earthquakes are a serious threat. If a major earthquake strikes, the Capitol will likely be destroyed and lives lost.

Twenty years ago, the Legislature received a wake-up call when the Scotts Mills earthquake cracked the Rotunda, requiring extensive repairs. That wake-up call was echoed by the Public Commission on the Oregon Legislature in 2006 when it called for seismic improvements to the Capitol.

The Review Committee repeats that wake-up call today. The risks are real, and so are the safety and economic benefits of the Master Plan project as updated by the Review Committee. In the considered judgment of the Review Committee, the project is the right thing to do for the State of Oregon, its People, and their State Capitol. Given these warnings, the time to act is now.

Appendix A:

Seismic Retrofit Classifications

The following list describes the four classifications generally given to seismic rehabilitation projects. Basic Life Safety is the least expensive, while Immediate Occupancy is the most expensive. The categories and discussion below come directly from David W. Look, AIA, Terry Wong, PE, and Sylvia Rose Augustus, "Planning for Seismic Retrofit: How Much and Where," THE SEISMIC RETROFIT OF HISTORIC BUILDINGS: KEEPING PRESERVATION IN THE FOREFRONT, Preservation Briefs 41, Technical Preservation Services, National Park Service:

1) Basic Life Safety. This addresses the most serious life-safety concerns by correcting those deficiencies that could lead to serious human injury or total building collapse. Upgrades may include bracing and tying the most vulnerable elements of the building, such as parapets, chimneys, and projecting ornamentation or reinforcing routes of exit. It is expected that if an earthquake were to occur, the building would not collapse but would be seriously damaged requiring major repairs.

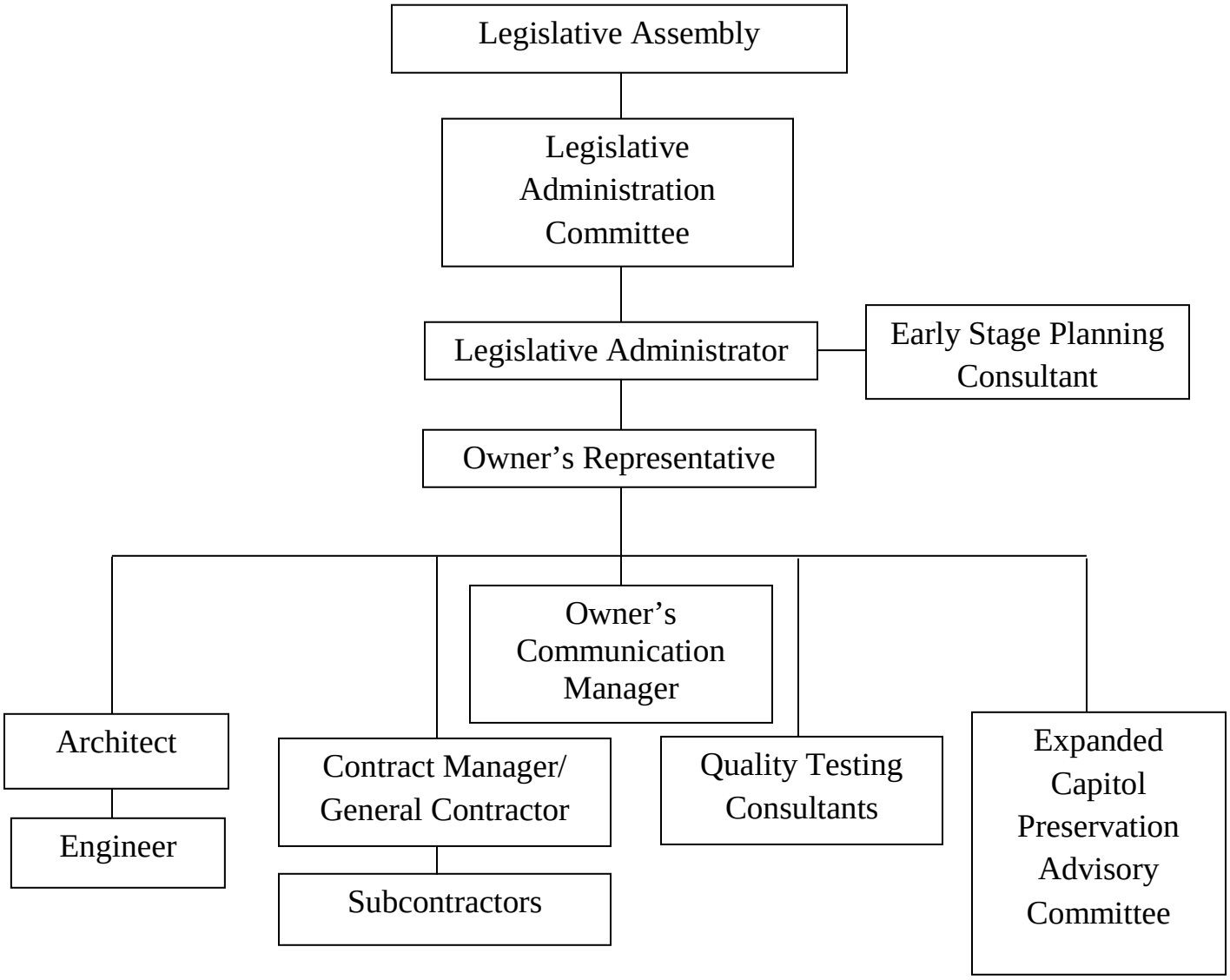
2) Enhanced Life Safety. In this approach, the building is upgraded using a flexible approach to the building codes for moderate earthquakes. Inherent deficiencies found in older buildings, such as poor floor to wall framing connections and unbraced masonry walls would be corrected. After a design level earthquake, some structural damage is anticipated, such as masonry cracking, and the building would be temporarily unusable.

3) Enhanced Damage Control. Historic buildings are substantially rehabilitated to meet, to the extent possible, the proscribed building code provision. Some minor repairable damage would be expected after a major earthquake.

4) Immediate Occupancy. This approach is intended for designated hospitals and emergency preparedness centers remaining open and operational after a major earthquake. Even most modern buildings do not meet this level of construction, and so for a historic building to meet this requirement, it would have to be almost totally reconstructed of new materials which, philosophically, does not reflect preservation criteria.

Appendix B:

Recommended Project Organizational Chart



Appendix C:

Historic Design Review Entities

The following list describes some of the entities having jurisdiction over aspects of historic design review for projects affecting the Capitol:

- **State Historic Preservation Office ("SHPO").** SHPO has jurisdiction over the interior fixtures and historic fabric in the Capitol. By way of example, if you turned the Capitol over and shook it out, SHPO would have jurisdiction over everything that did not fall out of the Capitol.

- **Capitol Preservation Advisory Committee ("CPAC").** CPAC is appointed by the Legislative Administrator and shares similar jurisdiction with SHPO. Specifically, however, CPAC is focused on the Capitol building and is charged with providing advice to the Legislative Administrator about preserving historic areas of the Capitol.

- **Oregon State Parks Department.** The State Parks Department has jurisdiction over the historic furnishings in the Capitol. When historic furnishings are altered or replaced, State Parks must be consulted to determine whether the furnishings should be saved for their historic value.

- **City of Salem Historic Landmarks Commission ("City of Salem").** The City of Salem has jurisdiction over external improvements to the Capitol. By way of example, anything that affects the external appearance of the Capitol as an historic landmark must be reviewed and approved by the City of Salem.

- **Capitol Planning Commission ("CPC").** The CPC studies and analyzes the building needs of all state agencies located in Salem and Keizer. The CPC is tasked with adopting and implementing a development plan for state agencies in the area.

Appendix D:

Projected Master Plan Timeline

Funding Milestone

Construction Milestone

March 2013: $250,000 appropriation; 2011-13 budget rebalance.

April 2013: Contract with Planning Consultant.

Summer 2013: Hire design team, including CM/GC, Architect, and Owner's Representative.

May 2013: Bond a portion of the $20-30 million for design phase.

Fall 2014: Schematic architectural plans and Guaranteed Maximum Price (GMP) completed.

Summer 2013 – Summer 2014: Site testing and design.

2013 Session	Interim	2014 Session	Interim

2015 Session: Obtain bonding authority (Approx. $110M) to fund construction through June 2017. Bonds sold on quarterly basis in 2015-17 biennium.

Interim 2015-16: New Executive Branch office building completed by DAS.

Interim 2015-16 – December 2018: Vacate Capitol and occupy new office building constructed by DAS.

2015 Session	Interim	2016 Session	Interim

2017 Session: Obtain bonding authority (Approx. $110M) to fund remainder of construction. Bonds sold on quarterly basis in 2017-19 biennium.

Interim 2015-16 – December 2018: Vacate Capitol and occupy new office building constructed by DAS.

December 2018: Return to completed Capitol for 2019 Session.

2017 Session	Interim	2018 Session	Interim

Appendix E:

Specific Recommended Changes to the 2009 Master Plan

Item #	Recommended Change	Reason
1	Change seismic retrofit level from Immediate Occupancy to at least Enhanced Life Safety, with an analysis done comparing an Enhanced Life Safety retrofit to an Enhanced Damage Control retrofit.	Provides a more realistic goal based on the building's age and requirement to preserve the historic structure itself.
2	Eliminate planned skylights in Senate and House Chambers.	Achieve $700,000 in savings, and large windows are already available to achieve natural lighting.
3	The servers will be relocated, but the servers should not be relocated to the third floor near windows. Legislative Administration and Information Services should determine where to relocate the servers based on their technical expertise.	Areas near windows should be used for offices, not computer equipment.
4	The History Center will not be located in the Treasurer's Office.	The Legislative Administrator should have flexibility to locate the History Center in coordination with other projects in the Capitol.
5	When infilling the courtyard as part of the Concourse Level, the foundation should be built strong enough to accommodate future upward expansion. The Review Committee is not recommending upward expansion at this time, but the foundation should accommodate growth if needed.	While the work is being done it would be most efficient to build a strong foundation to accommodate future growth rather than have to revisit the foundation in the future.

6	Leave the three front revolving doors as is.	The Master Plan contemplates turning two of the three revolving doors into swinging brass doors. The revolving doors are a defining feature and should be left intact.
7	Instead of locating an ADA ramp on the north side of the Capitol, provide other ADA access points on the west or south side of the Capitol.	The north facing front of the Capitol is a defining feature, and ramps could be more discreetly added on the west and south sides of the Capitol.
8	Handrails should be added to the front steps.	Handrails on the front steps would promote comfort and convenience for visitors.

Capitol Master Plan Review Committee

February 2013