

The CEQA Guidelines (Section 15126) require that all phases of a project must be considered when evaluating its impact on the environment: planning, acquisition, development, and operation. As part of this analysis, the EIR must identify the following three components: (1) significant environmental effects which cannot be avoided if the proposed project is implemented; (2) significant irreversible environmental changes which would be involved in the proposed project should it be implemented; and (3) growth-inducing impacts of the proposed project. The following is a discussion of each of these components.

## 5.1 SIGNIFICANT AND UNAVOIDABLE ENVIRONMENTAL IMPACTS

This section identifies significant impacts that could not be eliminated or reduced to a less-than-significant level by mitigation measures imposed by the University. The final determination of significance of impacts and of the feasibility of mitigation measures will be made by The Regents of the University of California as part of their certification action.

The following significant and unavoidable impacts would result from development proposed under the Phase 1 Campus:

**Aesthetics.** Implementation of the Phase 1 Campus would create new sources of light or glare.

**Air Quality.** Development of the Phase 1 Campus would generate increased emissions levels of CO, O<sub>3</sub> precursors (ROG and NO<sub>x</sub>).

**Noise.** Implementation of the Phase 1 Campus would result in significant and unavoidable increased ambient noise levels due to increased traffic on the regional road network.

## 5.2 SIGNIFICANT IRREVERSIBLE CHANGES

This section identifies the use of nonrenewable resources during implementation of the Phase 1 Campus that would create an irreversible commitment of resources or irreversible damage to the environment. Significant irreversible changes to the environment resulting from development under the Phase 1 Campus would generally fall into three categories: (1) irretrievable commitment of materials and energy during construction and maintenance of the project; (2) loss of agricultural, biological and cultural resources due to the conversion of undeveloped lands to urban uses; and (3) increased use of natural resources due to increased population at and surrounding the Campus site. The following presents a discussion of each of these three types of changes.

### 5.2.1 Irretrievable Commitment of Construction Materials

Development under the Phase 1 Campus would irretrievably commit non-renewable energy resources, primarily in the form of fossil fuels, including fuel oil, natural gas, and gasoline for automobiles and construction equipment. The consumption or destruction of other non-renewable and slowly-renewable resources would also result during construction and operation of the proposed Phase 1 Campus development. These resources include, but are not limited to, lumber, sand and gravel, asphalt, metals, and water.

## 5.2.2 Loss of Agricultural and Biological Resources

### Agricultural Resources

Dedication of undeveloped lands currently used for agricultural uses would constitute an irretrievable use of these lands because once buildings or pavement are constructed underlying soils would no longer be available or viable for agricultural production. The proposed Phase 1 Campus site does not contain prime agricultural lands or any other type of land used for agricultural purposes within its boundaries. However, as described in Section 6 of Volume 1, to the extent that the Phase 1 Campus would trigger the need for the proposed University Community, the proposed project could result in the loss of nearby prime agricultural lands.

### Biological Resources

Development under the Phase 1 Campus would have no direct effects on wetlands or other sensitive biological habitats; therefore, there would be no irretrievable loss of these resources. However, as discussed in Section 4.4 of Volume 1, full development of the UC Merced campus would result in the loss of grassland and wetland habitat, but the University would implement mitigation measures to reduce impacts to these sensitive biological communities, as well as provide preservation and creation of appropriate habitat within the eastern Merced region.

## 5.2.3 Increased Use of Natural Resources Due to Increased Population

Development under the Phase 1 Campus would generate increased transportation and housing needs within the eastern Merced region. In addition, campus-related growth would require the provision of water and energy resources. By making these services available to the proposed campus, it would constitute an irreversible commitment of natural resources.

## 5.3 GROWTH INDUCING IMPACTS

As required by CEQA, an EIR must discuss the ways in which a proposed project could foster economic or population growth or the construction of additional housing in the vicinity of the project and how that growth will, in turn, affect the surrounding environment (CEQA guidelines, Section 15126(d)). Growth can be induced in a number of ways, including through the elimination of obstacles to growth, or through the stimulation of economic activity within the region. The discussion of the removal of obstacles to growth relates directly to the removal of infrastructure limitations or regulatory constraints that could result in growth unforeseen at the time of project approval.

Under CEQA, induced growth is not considered necessarily detrimental or beneficial (see CEQA Guidelines 15126(d)). Induced growth is considered a significant impact only if it directly (or indirectly) affects the ability of agencies to provide needed public services, or if it can be demonstrated that the potential growth, in some other way, could significantly affect the environment.

The near term growth impacts are discussed in Section 6 of Volume 1.