# 4. ENVIRONMENTAL SETTING, IMPACTS, AND MITIGATION MEASURES

# 4.1 OVERVIEW

This chapter provides a project-level analysis of the physical environmental effects of implementing the Chromium-6 Water Treatment Facilities Project (project or proposed project). This chapter describes the existing environmental setting and regulatory framework, and identifies potential impacts from project implementation and mitigation measures for significant impacts (where necessary). Residual and cumulative effects on resource areas are also described.

## 4.1.1 SCOPE OF ANALYSIS

This Draft Environmental Impact report (Draft EIR or EIR) analyzes the potential effects of the proposed project on the environment utilizing thresholds provided in State CEQA Guidelines Appendix G, and additional regulatory criteria where noted. The environmental resource topics identified below are discussed and analyzed within the DEIR:

- Aesthetics (Section 4.2)
- Agriculture and Forest Resources (Section 4.3)
- Air Quality (Section 4.4)
- Biological Resources (Section 4.5)
- Cultural Resources (Section 4.6)
- Geology and Soils (Section 4.7)
- Greenhouse Gas (Section 4.8)
- Hazards and Hazardous Materials (Section 4.9)
- Hydrology and Water Quality (Section 4.10)
- Land Use and Planning (Section 4.11)
- Mineral and Energy Resources (Section 4.12)
- Noise and Vibration (Section 4.13)
- Population and Housing (Section 4.14)
- Public Services (Section 4.15)
- Recreation (Section 4.16)
- Traffic and Transportation (Section 4.17)
- Utilities and Service Systems (Section 4.18)

Each section of Chapter 4 contains the following elements:

**Existing Environmental Setting.** This subsection presents a description of the existing physical environmental conditions in the vicinity of the project sites with respect to each resource area at an appropriate level of detail to understand the impact analysis.

**Regulatory Framework.** This subsection provides a brief discussion of federal, State, and local regulations and policies that are applicable to the resource topic and the project.

*Impacts and Mitigation Measures.* This subsection evaluates the potential for the project to affect the physical environment. Significance criteria for evaluation of environmental impacts are defined in the beginning of the impact analysis section, including an explanation of how the significance criteria are used in the evaluation of impacts for the proposed project. This subsection includes a discussion of the approach to the analysis, including identification of the significance criteria that are not applicable to the proposed project. Potential impacts are identified and characterized. Where feasible, mitigation measures are identified to avoid or reduce identified significant impacts to a less-than-significant level.

The Impacts and Mitigation Measures subsection in each resource chapter includes an impact statement followed by the evaluation of the impact for the relevant facility components, and a conclusion regarding the impact for the project as a whole. When applicable, mitigation is included in the evaluation and applied to the relevant components as indicated in the text of the mitigation. Because of the multiple components and facility sites associated with the proposed project, overlapping environmental impacts may occur due to, or may be exacerbated by, concurrent construction periods of more than one component (for example, where more than one of the project facility sites are located in the same geographic area and have concurrent construction periods). Where this would be the case, it is identified in the Approach to Analysis section in the resource chapter.

*Significance after Mitigation.* This subsection identifies the level of significance of impacts after mitigation measures are imposed.

*Cumulative Impacts and Mitigation Measures.* Cumulative impacts are discussed in each environmental resource section following the description of project-specific impacts and mitigation measures. See Section 4.1.3 below for information on the approach to cumulative impact assessment.

#### 4.1.2 SIGNIFICANCE DETERMINATIONS

The following categories are used to determine impact significance in this DEIR:

**No Impact.** This determination is made if a resource is absent or if a resource exists within the project area or area of potential effect, but there is no potential that the project could affect the resource.

*Less than Significant (LS).* This determination applies if there is a potential for some limited impact on a resource, but the impact is not significant under the significance criterion.

*Less than Significant with Mitigation (LSM).* This determination applies if it is certain that the project would result in an adverse effect that meets the significance criteria, but mitigation is available to reduce the impact to a less than significant level.

**Significant and Unavoidable with Mitigation (SUM).** This determination applies if the Proposed Project would result in a significant adverse effect in accordance with the significance criterion and there is some mitigation available to lessen the impact, but the residual effect after implementation of the mitigation would remain significant.

*Significant Unavoidable (SU).* This determination applies to impacts that are significant, but for which there appears to be no feasible mitigation available to substantially reduce the impact to a less than significant level.

Environmental impacts are numbered throughout this DEIR, using an abbreviation corresponding to the section name followed by sequentially numbered impacts. Mitigation measures are numbered to correspond to the impact numbers; for example, Mitigation Measure LU-1 addresses Land Use Impact LU-1. If a cumulative impact is identified for a resource topic, the Impact and Mitigation number is preceded by a "C" under the cumulative impacts subsection; for example a cumulative land use impact and mitigation measure would be labeled C-LU-1.

## 4.1.3 CUMULATIVE IMPACTS

#### 4.1.3.1 CEQA Requirement

CEQA requires that an EIR contain an assessment of the cumulative impacts of a project when the project's incremental effect is cumulatively considerable. As defined in State CEQA Guidelines \$15065(a)(3), "cumulatively considerable" means that the incremental effects of an individual project are significant when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects. Guidance for cumulative impact analysis is provided in State CEQA Guidelines \$15130:

- An EIR shall discuss cumulative impacts of a project when the project's incremental effect is "cumulatively considerable" (i.e., the incremental effects of an individual project are considerable when viewed in connection with the effects of past, current, and probable future projects, including those outside the control of the agency, if necessary).
- An EIR should not discuss impacts that do not result in part from the project evaluated in the EIR.
- A project's contribution is less than cumulatively considerable, and thus not significant, if the project is required to implement or fund its fair share of a mitigation measure or measures designed to alleviate the cumulative impact.
- The discussion of impact severity and likelihood of occurrence need not be as detailed as for effects attributable to the project alone.
- The focus of analysis should be on the cumulative impact to which the identified other projects contribute, rather than on attributes of the other projects that do not contribute to the cumulative impact.

#### 4.1.3.2 Approach to Cumulative Impact Analysis

For the evaluation of cumulative impacts, State CEQA Guidelines (§15130[b]) allows the use of either a list of past, present, or reasonably anticipated relevant projects, including projects outside the control of the lead agency; a summary of the projections in an adopted planning document; or a combined list-based and growth projections approach. The cumulative analysis for the project relies on a combined list-based and growth projections approach.

The project area covers a broad geographic extent, stretching from Desert Hot Springs in the north to unincorporated areas of Riverside County near Thermal in the south. The project facilities are located within five incorporated cities (Desert Hot Springs, Rancho Mirage, Palm Desert, La Quinta, and Indio) and in unincorporated areas of Riverside County; therefore, cumulative projects identified for project facilities in one jurisdiction may not apply to project facilities in other jurisdictions. For this reason, the specific approach to the cumulative analysis is discussed in each resource topic subsection of this

chapter, and identifies if the cumulative analysis is performed using a list-based, growth projections, or combination approach.

To identify relevant cumulative projects to be used in the analysis, planning departments in the relevant jurisdictions were contacted for their active projects lists. Planning documents from these jurisdictions and regional agency documents that contain growth and development projections were also referenced. CVWD, as CEQA lead agency, also provided a list of its relevant active and future project for use in the cumulative analysis.