

ATTACHMENT D

Findings and Statement of Overriding Considerations

Introduction

The *Functional Equivalent Document for the California Cap on GHG Emissions and Market-Based Compliance Mechanisms* (FED) in Appendix O to the Staff Report: Initial Statement of Reasons (ISOR) for the *Proposed Regulation to Implement the California Cap-and-Trade Program* analyzed the potential environmental impacts associated with this proposed action. The FED analysis was based on the expected compliance responses of entities covered by the Regulation and expected compliance responses to the four proposed Offset Protocols. The FED concluded that the compliance responses to the proposed Regulation would result in beneficial impacts to air quality through reductions in emissions, including GHGs, criteria pollutants and toxics, in addition to beneficial impacts to energy demand. It further concluded that the Regulation would result in less than significant impacts, or no impacts, to aesthetics, agricultural and forest resources, hazards, land use, noise, employment, population and housing, public services, recreation, transportation and traffic, and utilities/service systems. The FED concluded there could be potentially significant adverse impacts to biological resources, cultural resources, geology/soils and minerals, and hydrology/water quality largely due to construction activities for projects to reduce GHG emissions. Although the potential for adverse localized air quality impacts were found to be unlikely, the FED conservatively considered them potentially significant.

The FED concluded that the compliance responses to four proposed Offset Protocols would also result in beneficial impacts to GHG emissions and no adverse impacts, or less than significant impacts, in all resource areas except in the following instances. The Livestock Protocol has the potential for significant adverse impacts to odors, cultural resources, noise, and transportation/ traffic. The Urban Forestry Protocol has the potential for significant adverse impacts to cultural resources. The Forest Offset Protocol has the potential for significant adverse impacts to biological resources and land use.

ARB's certified regulatory program requires that prior to adoption of an action for which significant adverse environmental impacts have been identified during the review process, that ARB consider all feasible mitigation measures and alternatives available which could substantially reduce such adverse impacts. (California Code of Regulations, title 17, section 60006.) CEQA places the burden on the approving agency to affirmatively show that it has considered feasible mitigation and/or alternatives that can lessen or avoid the impacts. A statement of findings for each identified significant impact is the means to show this consideration. (Public Resources Code section 21081.) CEQA Guidelines section 15091 provides direction on the

content of the statement of findings. That section states that one or more of the following findings should be identified for each impact:

- Changes or alterations have been required in, or incorporated into, such project which avoid or substantially lessen the significant environmental effect as identified in the final environmental impact report.
- Such changes or alterations are within the responsibility and jurisdiction of another public agency and not the agency making the finding. Such changes have been adopted by such other agency, or can and should be adopted by such other agency.
- Specific economic, legal, social, technological, or other considerations, including provision of employment opportunities for highly trained workers, make infeasible the mitigation measures or project alternatives identified in the environmental impact report.

Because all the adverse impacts identified in the programmatic level FED are potential indirect impacts associated with the compliance responses of covered entities, the authority to determine site- or project-specific mitigation is within the purview of jurisdictions with local permitting authority, such as city or county governments and local air districts. ARB does not have the ability to determine with any specificity the project level impacts, nor the authority to require project-level mitigation in approving the Regulation or Offset Protocols as discussed in the findings.

An agency may approve a project with unavoidable (unmitigated) adverse environmental impacts. When doing so, CEQA requires the agency to make a statement in the record of its views on the ultimate balancing of the merits of approving the project despite the environmental impacts in a "statement of overriding considerations." (Public Resources Code section 21081(b); CEQA Guidelines 15093.) The following presents the Board's statement of findings for each identified adverse impact, accompanied by a brief explanation, and its statement of overriding considerations.

Statement of Findings

The Board has considered the entire record, including the information contained in the FED, public testimony, written comments received, and the written responses to comments. Based on this information, the Board makes the following written findings for each significant adverse impact, accompanied by a brief explanation of the rationale for each finding. These findings are supported by substantial evidence in the record.

Air Quality

Finding and Explanation:

The covered entity compliance responses consist of upgrading equipment, switching to lower intensity carbon fuels, and implementing maintenance and process changes at existing facilities. The FED concluded that most compliance approaches for covered sources will result in reductions in co-pollutants through increased efficiency and decreased combustion of fossil fuels, except for the following potential adverse emission impacts:

Potential for short-term construction-related impacts:

The compliance responses of upgrading equipment and equipment modifications could entail short-term construction-related impacts including the use of construction equipment that emit GHG and criteria pollutants. Short-term grading and trenching have the potential to generate dust (PM). The FED identified recognized measures, including existing statutes and regulations, prohibitory rules, operating permit requirements and other programs, designed to limit emissions and mitigate these short-term construction-related impacts. The authority to determine site- or project-specific mitigation, however, is within the purview of jurisdictions with local permitting authority, such as city or county governments and local air districts; and ARB does not have the authority to require project-level mitigation. Further, the programmatic analysis in the FED does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce these potentially significant short-term construction-related impacts. Due to the uncertainty inherent in the program level analysis in the FED, the Board finds these short-term construction-related air quality impacts potentially significant and unavoidable.

Potential for localized adverse air quality impacts:

The FED concluded that the compliance response entailing implementing process changes would generally be expected to result in a beneficial effect on emissions by reducing criteria pollutant emissions through increased efficiency and reduced fuel combustion. During the rulemaking process, some stakeholders expressed concern that the trading allowed under cap-and-trade program might result in facilities in some areas increasing their operations while reducing operations elsewhere. Based on the Co-Pollutant Emissions Assessment (included as Appendix P to the Staff Report), the FED concluded that the potential for increases in localized air pollution, including toxic air contaminants and criteria air pollutants, attributable to the cap-and-trade program, are extremely unlikely. The combination of placing a price on carbon and setting a declining cap on emissions would incentivize investment in more efficient processes and equipment which reduce criteria pollutant emissions. Furthermore, any substantial new facility, or expansion of an existing facility, would be subject to local review and regulation by the appropriate agencies and

be subject to applicable state and local environmental review processes. The Co-Pollutant Emissions Assessment conservatively examined scenarios that included a potential increase in production at existing facilities and the siting of hypothetical new facilities in particular communities. Under these scenarios, the analysis concluded there could be some additional co-benefits from the reduction of combustion-related criteria pollutants. It concluded that even if potential emissions increases did occur, such increases would be small within the context of the larger cumulative emissions reductions that would occur as a result of California's extensive emissions control programs. However, the FED acknowledges that, because specific actions by covered entities cannot be determined in the program level environmental analysis, specific adverse localized emissions impacts cannot be ruled out. The authority to determine site- or project-specific mitigation, however, is within the purview of jurisdictions with local permitting authority, such as city or county governments and local air districts; and ARB does not have the authority to require project-level mitigation. Further, the programmatic analysis in the FED does not allow project-specific details of potential impacts and mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce these potentially significant impacts. Because the Board cannot determine that localized emission increases could never occur, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this potential for adverse localized air quality impacts potentially significant and unavoidable. The Board finds that implementation of the Adaptive Management Plan, as an integral part of implementation of the cap-and-trade program, will reduce the risk that the program will have such unanticipated, unintended and ongoing adverse localized air quality impacts.

Potential for odors from Livestock Offset Protocol:

The FED identified potentially significant impacts from exposure of sensitive receptors to objectionable odors due to implementation of the Livestock Offset Protocol. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the programmatic analysis in the FED does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Biological Resources

Finding and Explanation:

The covered entity compliance responses consist of upgrading equipment, switching to lower intensity carbon fuels, and implementing maintenance and process changes at existing facilities. Upgrading equipment involves construction, grading and trenching

that have the potential to adversely impact any protected biological resources that might exist at those locations. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the programmatic analysis in the FED does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

The FED analysis found that the Forest Offset Protocol would not increase total forest activities, but could shift activities to projects that increase carbon sequestration. Reforestation projects conducted under the Forest Offset Protocol could change existing habitat and disrupt wildlife. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the programmatic analysis in the FED does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable. The Board finds that implementation of the Adaptive Management Plan, as an integral part of implementation of the cap-and-trade program, will reduce the risk of unanticipated, unintended and ongoing adverse impacts to biological resources due to forestry projects under the Forest Offset Protocol.

Cultural Resources

Finding and Explanation:

The covered entity compliance responses consist of upgrading equipment, switching to lower intensity carbon fuels, and implementing maintenance and process changes at existing facilities. Upgrading equipment involves construction, grading and trenching that have the potential to adversely impact any cultural resources that might exist at those locations. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the FED programmatic analysis does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

The Livestock Offset Protocol would include the construction of digesters at or adjacent to existing livestock operations where cultural or historic features could exist. Similarly, the Urban Forest Offset Protocol includes projects in urban settings where cultural and historic resources could exist. Although the FED identified recognized mitigation measures exist to reduce these potential impacts, the authority to require project-

specific mitigation lies with local permitting agencies and not ARB. Further, the FED programmatic analysis does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Geology, Soils, and Mineral Resources

Finding and Explanation:

The covered entity compliance responses consist of upgrading equipment, switching to lower intensity carbon fuels, and implementing maintenance and process changes at existing facilities. Upgrading equipment involves construction, grading and trenching that have the potential to result in adverse soil erosion, dust generation, and sedimentation of local waterways. Although the FED identified recognized measures that exist to reduce this potentially significant impact, the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the FED programmatic analysis does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Hydrology and Water Quality

Finding and Explanation:

The covered entity compliance responses consist of upgrading equipment, switching to lower intensity carbon fuels, and implementing maintenance and process changes at existing facilities. Upgrading equipment involves construction, grading and trenching that have the potential to result in adverse soil erosion resulting in sedimentation and degradation of local waterways. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the FED programmatic analysis does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Land Use and Planning

Finding and Explanation:

The Forest Offset Protocol includes avoided conversion projects that could conflict with local land use plans that envision development or other uses of forested areas. The authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the FED programmatic analysis

does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact, described as possible conflicts between the "avoided conversion" element of the Forest Offset Protocol and land use plans, as potentially significant and unavoidable.

Noise

Finding and Explanation

The Livestock Offset Protocol would allow the construction of digesters in agricultural settings. Construction of digesters could adversely impact sensitive receptors and is considered a significant and unavoidable impact. The FED identified recognized measures that exist to reduce this potential impact; but the authority to require project-specific mitigation lies with local permitting agencies and not ARB. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Transportation and Traffic

Finding and Explanation

Construction of livestock digesters, under the Livestock Offset Protocol, could require the operation of heavy equipment on rural roads, potentially creating unsafe conditions. The FED identified recognized measures that exist to reduce this potentially significant impact; but the authority to determine project-level impacts and require project-level mitigation lies with the permitting agency for individual projects. Further, the FED programmatic analysis does not allow project-specific details of mitigation, resulting in an inherent uncertainty in the degree of mitigation ultimately implemented to reduce the potentially significant impacts. Consequently, the Board takes a conservative approach in its post-mitigation significance conclusion and finds this impact potentially significant and unavoidable.

Findings on Alternatives to the Project

In addition to the No-Project Alternative, the FED considered a reasonable range of action alternatives potentially capable of reducing the proposed Regulation's environmental effects while accomplishing most of the project objectives.

The Board finds the alternatives analysis is sufficient to inform the Board and the public regarding the tradeoffs between the degree to which the alternatives could reduce environmental impacts and the corresponding degree to which the alternatives could achieve the project objectives.

Based upon a full evaluation of the alternatives, the Board finds that adoption and implementation of the Cap-and-Trade Regulation is the most desirable, feasible, and appropriate action for achieving the objectives of the project, and the Board rejects the

other alternatives as either less desirable or infeasible based on consideration of the relevant factors identified in the FED and briefly described below:

A. No Project Alternative

The FED analyzed a No Project Alternative. This alternative would have ARB adopt no Cap-and-Trade Regulation, but other measures from the Scoping Plan would continue to be implemented. The Board finds that under this alternative, ARB would fall short of its objective to reduce GHG emissions to 1990 levels in 2020. This shortfall could be greater if adopted measures fail to achieve expected reductions. ARB would be required to develop other actions measures to make up the shortfall. Therefore, the No Project Alternative would not meet the most basic objective of the project. Furthermore, adoption of the No Project Alternative does not create an environmentally advantageous outcome because many potentially significant adverse environmental impacts associated with the other ongoing, approved or foreseeable measures identified in the Scoping Plan would still occur, but without the benefit of the additional GHG reductions gained from the Cap-and-Trade Regulation. For this reason, the Board rejects this alternative.

B. Cap-and-Trade Program with Alternative Design Features Alternatives (Alternatives 2 through 6)

The FED analyzed a Cap-and-Trade Program with alternative design features, including a border adjustment, 100 percent auction allowance, a different offset limit, facility-specific caps, restricting trading in impacted locations, disallowing banking of allowances, and not linking with other cap-and-trade programs. Each alternatively designed Cap-and-Trade Program analyzed had a lower ability to meet the primary project objectives than the proposed Regulation. Further, adoption of any of these alternatively designed programs does not create an environmentally advantageous outcome because none substantially reduces the potential adverse environmental impacts associated with the proposed Regulation and each have other environmental tradeoffs as described in the FED. For the foregoing reasons, the Board rejects these alternatives.

C. Additional Source-Specific Command-and-Control Regulations Alternative (Alternative 7)

The FED analyzed an alternative that would have ARB pursue additional source-specific emissions limits by regulation rather than the proposed Cap-and-Trade Regulation. The Board finds that, while this alternative may be technically feasible, it is less likely to meet the project objectives because it does not provide a hard cap on emissions. Until specific regulatory measures have been developed, anticipated reductions are estimates. If any of the adopted regulatory measures fails to achieve the estimated emission reductions, the ability to achieve the AB 32 requirement to reduce emissions to 1990 levels by 2020 would be seriously compromised. Direct regulations are also typically more costly than a market mechanism because the compliance options are

substantially limited. Without the inherent flexibility of a market mechanism, the direct regulation approach has the potential to be less cost-effective at reducing emissions for industry and the economy as a whole. Higher control costs lead to an increased risk of emissions leakage, which undermines the goals of AB 32 to reduce greenhouse gas emissions while minimizing leakage. This alternative also involves numerous rulemaking activities that would each need to identify the control technologies specific to each regulated sector achievable in a technically feasible and cost-effective manner. Due to the diverse nature of many industrial processes and a lack of data, it would take substantial time and resources for ARB to craft and implement such regulations, delaying emissions reductions. Therefore, this alternative is not likely to be feasibly accomplished in a successful manner within a reasonable period of time. Finally, this alternative does not substantially reduce the potential for adverse environmental impacts associated with the proposed Regulation. For the foregoing reasons, the Board rejects this alternative.

D. Carbon Fee Alternative (Alternative 8)

The FED analyzed an alternative where ARB would pursue a Carbon Fee rather than the proposed Cap-and-Trade Regulation. The Board finds that this alternative does not meet the project objectives as well as the proposed Regulation because the total amount of GHG emissions in a given time period is uncertain, whereas the proposed Regulation sets a total limit on emissions. It is more difficult to structure a fee to provide certainty that the GHG emission reduction goal will be met. Since the price on carbon is set administratively to encourage emissions reductions, rather than set by a cap and priced by market conditions, there is a risk of pricing too low, leading to falling short of the target, or pricing too high, leading to over-compliance and unnecessary additional costs. The greater uncertainty in meeting the emission reduction goals is an important policy reason to reject this alternative. Further, this alternative does not substantially reduce the potentially significant adverse environmental impacts because it has the potential for similar impacts as the Cap-and-Trade Regulation. For the foregoing reasons, the Board rejects this alternative.

STATEMENT OF OVERRIDING CONSIDERATIONS

The Board finds that despite the potential for adverse environmental impacts associated with the proposed Regulation to Implement the California Cap-and-Trade Program, including the Compliance Offset Protocols, other benefits of this regulatory action, which will flow to all residents of the State, are determined to be overriding considerations that warrant approval of the project and outweigh and override its unavoidable significant effects. These benefits include:

1. A reduction in greenhouse gas emissions, thereby benefitting the environment and current and future generations;

2. Related statewide health benefits from the reduction of other co-pollutants by complementing and support California's existing efforts to reduce criteria and toxic air pollutants;
3. Providing a program that complements other Scoping Plan measures, such as standards for cleaner vehicles, low-carbon fuels, renewable electricity and energy efficiency;
4. Providing a firm cap that will decline to a level in 2020 designed to ensure that emissions decline over time and California achieves the AB 32 GHG emissions target in 2020;
5. Providing a durable framework that has the potential to provide further GHG reductions beyond the 2020 target;
6. Achieving emission reductions in a cost-effective manner by affording covered entities flexibility to seek out and implement the most cost-effective options to reduce emissions;
7. Providing a price signal needed to drive long-term investment in cleaner fuels and more efficient buildings and technologies;
8. Helping to mitigate the economic consequences of continued reliance on fossil fuels; and
9. Helping to incentivize reforestation and avoided conversion forest projects that will provide for carbon sequestration while resulting in long-term beneficial effects on scenic resources, soil erosion, and loss of topsoil.