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# Highlights

Highlights of [GAO-05-823](#), a report to congressional requesters

## Why GAO Did This Study

Power plants emit pollutants that have been linked to various negative health effects. In 2003, two new power plants, owned by Sempra Energy and Intergen, began operations 3 miles south of the U.S.-Mexico border near Imperial County, California. The county does not meet some federal and state air quality standards and may be further impacted by the emissions from these plants. Although these plants export most of the electricity they produce to the United States, they are not currently required to meet any U.S. or California emissions standards.

GAO was asked to determine (1) how emissions from the two plants compare with emissions from recently permitted plants in California and emissions from sources in Imperial County, and what emissions standards they would be subject to if they were located in Imperial County; (2) the health impacts of emissions from the plants on Imperial County residents; and (3) options available to U.S. policymakers to ensure that emissions from these plants do not adversely affect the health of Imperial County residents.

In commenting on a draft of this report, DOE disagreed with our characterization of the limitations of their assessment of the health impact of pollution from the Sempra and Intergen power plants. We believe we have portrayed the limitations of this assessment accurately.

[www.gao.gov/cgi-bin/getrpt?GAO-05-823](http://www.gao.gov/cgi-bin/getrpt?GAO-05-823).

To view the full product, including the scope and methodology, click on the link above. For more information, contact John B. Stephenson at (202) 512-3841 or [stephensonj@gao.gov](mailto:stephensonj@gao.gov).

## AIR POLLUTION

# Estimated Emissions from Two New Mexicali Power Plants Are Low, but Health Impacts Are Unknown

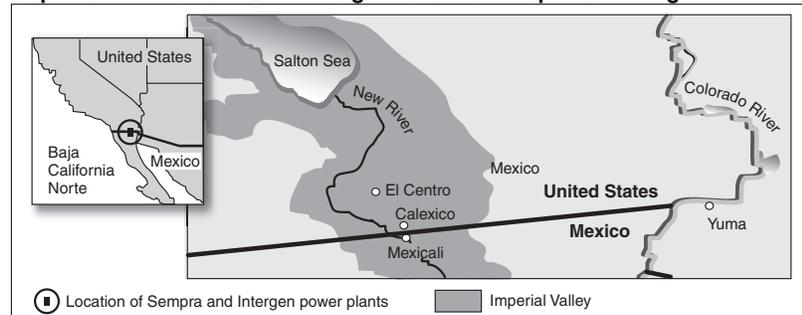
## What GAO Found

The estimated emissions from the Sempra and Intergen power plants near Mexicali are comparable with similar plants recently permitted in California and are low relative to emissions from the primary sources of pollution in Imperial County, California, which are dust and vehicles. However, if the plants were located in Imperial County, they would be required to take steps to improve air quality by reducing emissions from other pollution sources in the region, such as paving dirt roads, because the county is not meeting certain U.S. air quality standards.

Although emissions generated from the Sempra and Intergen plants may contribute to various adverse health impacts in Imperial County, the extent of such impacts is unknown. The Department of Energy (DOE) estimated that emissions from these plants may increase asthma hospitalizations by less than one per year. However, DOE did not quantify any other asthma-related impacts, such as emergency room visits or increased use of medications, which, although less severe, are likely to occur more often. In addition, DOE did not determine whether increased emissions would cause other respiratory or cardiovascular problems and the impact of particulate matter on particularly susceptible populations. Finally, the potential health impacts associated with ozone could be greater than DOE estimated because some important data needed for modeling were not available.

Existing laws and international agreements may not provide adequate mechanisms to address adverse health impacts resulting from power plant emissions. Policymakers could take some actions, such as requiring plants that seek to export electricity to the United States to use specified emission controls. While this action would have benefits, it would also have costs, such as possibly reducing energy supplies available to Southern California. Long-term policy options include the development of a binational pollution reduction program or a trust fund to provide grants and loans to support air quality improvement projects. However, substantial efforts on both sides of the U.S.-Mexico border would be required to establish the legal and management framework necessary for such programs to be effective.

Map of the U.S.-Mexico Border Region Near the Sempra and Intergen Power Plants



Source: GAO presentation of DOE data.