In response to questions about the Oroville Dam, USGS scientists said that Survey data analyzed thus far do not prove that the reservoir triggered the earthquakes. They added, however, that neither does the evidence rule out some relationship, and that it may be difficult to find definitive evidence one way or the other.

The Oroville earthquake, like the Alaska earthquake of March 1964 and the San Fernando, Calif. earthquake of February 1971, have produced data of great value to engineers involved in the design and construction of buildings and dams to resist earthquake forces.

In the past, engineers have been hampered by inadequate data on the forces of strong shaking by earthquakes, particularly within a few miles of earthquake epicenters. At Oroville, excellent records are being obtained. One seismographic instrument, for example, at Oroville Dam, operated cooperatively by the California Department of Water Resources and the USGS, was only about ten miles from the epicenter, and recorded strong motion for two or three seconds. The strongest pulses of motion in a vertical direction were 13 percent of the force of gravity. At two other sites, Chico and Marysville, the peak motion was 8 and 7 percent of gravity, respectively.

Following the main earthquake, ten temporary instruments were installed, five by the California Division of Mines and Geology, and five by the California Institute of Technology in cooperation with the USGS. More than 30 aftershocks left their records on this network.

The USGS scientists said that they have many months of additional data analysis before them. Level lines will be run to see if any changes in elevation related to the fault movement can be detected; extremely sensitive instruments are being operated to test for quake-related deformation of the Earth's surface. Such changes can give good evidence of uplift or depression of mountain blocks, and add importantly to understanding the movements within the crust of the Earth that generate earthquakes.

The scientists emphasized that they cannot predict whether a magnitude 6 earthquake will occur near Oroville in the near future. Noting that earthquake prediction research is being carried out in the United States by the USGS and many universities and private groups as well as in Japan, the Soviet Union, and the People's Republic of China, they expressed confidence that earthquake prediction will eventually be possible. They said, however, that an operational earthquake prediction system, perhaps comparable to the tsunami warning service, will depend on further scientific observations and advances.
SECTION THROUGH EARTH'S CRUST NEAR OROVILLE, CALIF., SHOWING DISTRIBUTION OF AFTERSHOCKS ALONG WEST-DIPPING FAULT ZONE.

IS THE ZONE IDENTIFIED BY USGS SCIENTISTS AS THE SOURCE OF THE OROVILLE EARTHQUAKE SERIES THAT BEGAN ON AUG. 1, 1975.