

Relationship between the development stages of the city and geo-pollution of Pb

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Geo-pollution investigation is very important in the case of land business in a city area. Even if the factory has not treated toxic materials, geo-pollution was found. The polluted soil may be carried from the polluted area or the toxic materials may be of natural origin. However, there is no scientific inspection to judge the origin of the polluted soil. In this report, we examine the cause of geo-pollution of Pb in the Osaka city area.

We examined sedimentation structure, an elution examination, inspection of quantity to be included, analysis of Isotope ratios of Pb, X-ray diffraction examination, and X-rays analysis, in different geological or social utility background.

It is clear that the isotope ratios of Pb (the $^{207}\text{Pb}/^{206}\text{Pb}$ ratio and the $^{208}\text{Pb}/^{206}\text{Pb}$ ratio) has a feature at the artificial stratum.

Comparison of the results and the history of city structure, suggests two causes of geo-pollution, an air raid and preventing ground subsidence.

Simple soil pollution investigation without scientific, ex. Geology, does not find a solution against the soil pollutions. A viewpoint of Human geology understanding a characteristic of geological feature environment is important for recovery and reproduction of future sustainable city environment.