

## عنوان مقاله:

Assessment of Pb, Cd, and Zn in Isfahan's air dust during 2015-2017 (A case study: North, West, and East Stations  
(of Isfahan

## محل انتشار:

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## خلاصه مقاله:

The present study aimed to measure the heavy metals existing in Isfahan's dust at three stations during 2015-2017. This study was carried out in three stations located at north and northwest, west and southwest, and east and southeast parts of Isfahan. In each station, 12 sediment traps were placed and the concentrations of lead (Pb), cadmium (Cd) and zinc (Zn) in these sediment traps were determined using atomic absorption spectroscopy (AAS). The highest and the lowest concentrations of Pb in air dust were observed to be 490.1 and 70 mg/kg in western and eastern stations of Isfahan province, respectively. The highest and the lowest concentrations of Zn were 860.4 and 150 mg/kg in 2015, respectively. The highest Cd concentration (8.1 mg/kg) in air dust was found in the northern part of Isfahan province, while the lowest concentration of this metal (0.7 mg/kg) was observed in the eastern region of Isfahan. Similar results were obtained for the heavy metals enrichment factor with a maximum and minimum of 3.8 and 0.8 in 2015, respectively. The results of this study confirmed that the effect of human activities is significant in increasing the concentration of heavy metals such as Pb, Cd and Zn in dust. The assessment results for the enrichment factor of heavy metals revealed the contamination of dust by heavy metals. Accordingly, further attention is required to identify and control the pollutants sources such as heavy metals in dust in order to prevent the resulting pollution.

## کلمات کلیدی:

Dust, Cd, Pb, Zn, Isfahan's Air dust

## لینک ثابت مقاله در پایگاه سیویلیکا:

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