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Literature Survey of Isotopic Abundance Data for 1991-1993*

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Abstract

Data on isotopic abundance measurements and their variation in nature are compiled for the time from 1991 to the present.

Discussion

I have compiled all of the data on isotopic abundance measurements and their variation in nature for the time period since the Hamburg General Assembly. Most of the data deals with the variations in the abundances as given by per mil deviations from some standard. As such, there are not of major interest to the Atomic Weights Commission. However, there were some measurements which are of general interest in this list. I comment below on those papers which should be under discussion at this year's meeting.

A number of the papers deal with the abundance values and their variation in meteorites and other non-terrestrial sources. These should be of interest to the subcommittee dealing with non-terrestrial material. If the subcommittee does not have access to all of these papers, I do have copies of all of the items listed in the attachment.

Among the papers which deal with the full set of abundance ratios and from which atomic weight values can be determined are the cases of sulfur, titanium, iron, selenium, antimony, tellurium, europium, and iridium. In some cases, the data involved may have been reviewed after the Hamburg meeting.

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