

THE METHOD FOR ANNUAL DOSE RECORD KEEPING INTRODUCED IN CSOD FOR MONITORED WORK PLACES AND WORKERS AND RESULTS OF THE 1993 YEAR

J. Trousil*, J. Plichta*, Z. Prouza**, D. Nikodemová***)

*) National Personnel Dosimetry Service, Prague

**) National Institute of Public Health, Prague

***)Institute of Preventive and Clinical Medicine, Bratislava

In the implementation of dosimetric methods the National Personnel Dosimetry Service (CSOD) proceeded from recommendations of ICRP 26 and ICRU 39 and 43 and in collaboration with organs of public health supervision applied them in the practice of personal dosimetry. CSOD is intended on dosimetry of external irradiation which from the point of view of energy and type of radiation covers completely. Since 1991 CSOD evaluates the annual exposure of workers in quantities $H_{\rm g}$ (10) and $H_{\rm p}$ (0.07)/, CSOD registers with computer every monitored workplace and all workers under dosemeter number, name and personnel identification number. The evaluation of occupational annual exposure is realized for workers working in controlled and supervised area, which differs in type of dosemeter and control periods.

Using an example of annual dose record data for selected work place and workers the method for evaluation of following cases is discussed:

- a) the measured dose is in the range of annual limit
- b) the worker has two or more dosemeters (in one enterprise or in two or more enterprises)
- c) retrospective evaluation of dosemeters from preceding periods
- d) data for the period under study are lacking
- e) change in working relations or termination of work
- f) there are two or more data in one period

The lowest significant dose was determined for film badge thermoluminiscent and track detectors using the statistical analyses.

Using these results the lowest dose value which is included in the annual record is determined.

In conclusion the statistical distribution of dose equivalents received by persons under radiation risk in the year 1993 is discussed together with shortages of evaluation method with regard to the introduced occupational dose register in Czech Republic.

AIRCREW EXPOSURE TO COSMIC RADIATION-EXPOSURE LEVEL, EC RECOMMENDATIONS PREPARATION

 $\{ (x_1, \dots, x_n) \mid x_n = \{x_n\}^T : (x_n)^{t + \frac{1}{2}} \}$

F. Spurný, I. Votočková

Department of Radiation Dosimetry, Nuclear Physics Institute, AS CR, Prague

Recommendations ICRP 60 proposes to include aircrew members of subsonic aircraft between occupationally exposed persons. Since 1991, it has been again started to verify, what is the aircrews exposure level and what is its dependence on the flight parameters (altitude, geographical latitude and longitude, geomagnetic field actual situation, etc). European Communities also support such studies, they also formed a working group, which task is to recommend how ICRP 60 recommendations would be introduced to national regulations and air companies practice.

The contribution will present the results of measurements and analysis performed since 1991 by the collaborators of former Institute of Radiation Dosimetry of the AS CR. Both results obtained on the board of aircraft as well as behind the shielding of high energy particle accelerators will be included. Basic conclusions included in the prepared recommendations of the working group 11 of EURADOS will be also presented.