

Classification of Alpha-active Workplace Aerosols Based on Coefficient of Transportability as Measured by the Dialysis Method

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This report describe a method by which potentially inhaled workplace aerosols containing plutonium compounds are classified on the basis of measured transportability in Ringer's solution. It is suggested that the criterion "transportability" be used in the ICRP respiratory, deposited on a collecting filter that passes through a semi-permeable membrane in Ringer's physiological solution during two days of dialysis. First order kinetic equations are used for explanation of dialysis results. The dissolution characteristics of alpha-active aerosols are important in interpretation of their passage from the lungs after inhalation.

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