

## INTISARI

**Paramitha Ayu Ninditya. Nim 3181022.** *Hubungan Kadar Timbal (Pb) Dalam Rambut Terhadap Kejadian Hipertensi Pada Petugas Pengecatan PT.ATMI Surakarta.*

Pb digunakan sebagai pigmen pewarna dalam cat pada skala industri. Pb dalam tubuh manusia dapat terakumulasi dalam rambut. Kadar Pb dalam rambut berkorelasi dengan jumlah logam berat yang diserap oleh tubuh. Kadar Pb yang terakumulasi dalam tubuh dapat meningkatkan tekanan darah yang kemudian menjadi hipertensi. Tujuan penelitian ini untuk mengetahui ada tidaknya hubungan antara kadar Pb dalam rambut terhadap kejadian hipertensi pada pekerja bagian pengecatan di PT. ATMI Surakarta. Penelitian merupakan observasional analitik, untuk mengetahui bagaimana dan mengapa fenomena kesehatan terjadi melalui analisis statistik korelasi. Subyek penelitian ini sebanyak 20 petugas pengecatan PT.ATMI. Sampel diambil dengan cara *puprosive sampling*, setiap sampel dipilih sesuai pertimbangan karakteristik responden dengan kriteria inklusi serta kriteria eklusi. Hasil pengukuran kadar timbal pada 20 responden masih memenuhi syarat menurut Keputusan Menteri Kesehatan Republik Indonesia Nomor 1406/MENKES/SK/IX/2002 tentang standart pemeriksaan kadar timah hitam pada spesimen biomarker manusia yaitu sebesar  $< 10 \mu\text{g/g}$ . Pada pengukuran tekanan darah 5 responden mengalami hipertensi dan 15 memiliki tekanan darah normal. Pengujian hipotesis *MC-Nemar* diperoleh nilai signifikansi (p) sebesar 0,063 lebih besar 0,05. Penelitian ini menunjukkan tidak ada hubungan antara kadar timbal dalam rambut terhadap hipertensi pada petugas pengecatan PT. ATMI Surakarta.

Kata Kunci : Pb, Rambut, Hipertensi

## ABSTRACT

Paramitha Ayu Ninditya. Nim 3181022. *The Correlation of Lead (Pb) Concentration in Hair to The Incidence Of Hypertension in Painting Officers PT.ATMI Surakarta.*

Pb is used as a dye pigment in paints on an industrial scale. Pb in the human body can accumulate in the hair. Concentration Pb in hair correlate with the amount of heavy metals absorbed by the body. Concentration Pb accumulated in the body can increase blood pressure which then becomes hypertension. Purpose of this research to find out a correlation of the Pb concentration in hair to the incidence of hypertension in painting workers at PT. ATMI Surakarta. The research is an analytic observational, to find out how and why health phenomena occur through statistical correlation analysis. The subjects of this research were 20 painters PT.ATMI. Samples were taken by purposive sampling, each sample was selected according to the characteristics of the respondents with inclusion criteria and exclusion criteria. The results of the measurement lead concentration in 20 respondents still met the requirements according to the KEMENKES RI Number 1406/MENKES/SK/IX/2002 to the Ministry of health regarding the standart for examining lead levels in human biomarker specimens, which is  $< 10 \mu\text{g/g}$ . In measuring blood pressure, 5 respondents had hypertension and 15 had normal blood pressure. Testing the MC-Nemar hypothesis obtained a significance value ( $p$ ) of 0.063, greater than 0.05. Results of this study that there was no correlation between lead (Pb) concentration in hair and hypertension in PT. ATMI Surakarta.

Keywords: Pb, Hair, Hypertension