

## ABSTRAK

**Rahmi Gobel. 2013.** Pengaruh Kebisingan Terhadap Peningkatan Tekanan Darah Pada Karyawan PT. PLN (Persero) Pembangkit Listrik Tenaga Diesel (PLTD) Telaga Kota Gorontalo. Skripsi, jurusan Kesehatan Masyarakat, Fakultas Ilmu-Ilmu Kesehatan dan Keolahragaan, Universitas Negeri Gorontalo. Pembimbing I Dr. Hj. Rama P Hiola, Dra., M.Kes dan Ramly Abudi S.Psi, M.Kes Pembimbing II.

Proses mekanis alat pembangkit listrik PLTD Telaga yang menggunakan mesin-mesin diesel dalam skala besar menghasilkan dampak negatif berupa kebisingan. Tingkat kebisingan di lingkungan ruang-ruang mesin PLTD melebihi nilai ambang batas. Rata-rata tingkat kebisingan terukur dari tahun ke tahun mengalami kenaikan dan berada di atas standar baku mutu kebisingan. Penelitian ini dilakukan untuk menganalisis pengaruh kebisingan terhadap peningkatan tekanan darah karyawan PLTD Telaga kota Gorontalo.

Jenis penelitian ini merupakan penelitian observasional analitik, dengan desain studi *Cross sectional*. Populasi berjumlah 40 karyawan. Teknik pengambilan sampel yang digunakan pada penelitian ini yaitu Purposive Sampling yaitu 35 Karyawan. Analisis statistik menggunakan *Fisher's Exact Test*.

Hasil analisis statistik di dapatkan ada pengaruh intensitas kebisingan terhadap peningkatan tekanan darah pada karyawan PLTD Telaga dengan dengan nilai  $p$   $0,003 < \alpha$  (0,05), ada pengaruh jarak dari sumber bising terhadap peningkatan tekanan darah pada karyawan PLTD Telaga dengan dengan nilai  $p$   $0,003 < \alpha$  (0,05), dan ada pengaruh lama paparan terhadap peningkatan tekanan darah pada karyawan PLTD Telaga dengan dengan nilai  $p$   $0,032 < \alpha$  (0,05)

Berdasarkan hasil dapat disimpulkan bahwa ada pengaruh kebisingan terhadap peningkatan tekanan darah pada karyawan PT. PLN (Persero) Pembangkit Listrik Tenaga Diesel (PLTD) Telaga Kota Gorontalo.

Disarankan dalam penelitian ini terutama bagi pihak PLTD agar mengendalikan intensitas kebisingan dengan cara meminimalisir dampak negatif yang ditimbulkan seperti melakukan perawatan, perbaikan mesin dan menambah jumlah alat peredam suara di setiap ruang kerja.

**Kata kunci :** Kebisingan, Tekanan darah, karyawan PLTD PT

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**Rahmi Gobel. 2013.** The Impact of Noisy towards the Increase of Blood Pressure on Employee of PT. PLN (Persero) PLTD Telaga, Gorontalo. Skripsi. Department of Public Health. Faculty of Health and Sport Sciences. Universitas Negeri Gorontalo. It was supervised by Dr. Hj. Rama P. Hiola, Dra., M.Kes as the Principal Supervisor and Ramly Abudi, S.Psi, M.Kes as the Co-Supervisor.

The mechanic process of electric generator PLTD Telaga which uses diesel machine in high scale produces the negative impact such as noisy. The level of noisy in PLTD environment is over the limit of average. The level average of noisy increases every year and head of quality standard of noisy. This research aimed to analyze the impact of noisy towards the increase of blood pressure on Employee of PLTD Telaga Gorontalo.

This research was an observational analytic by using *Cross sectional* study. The numbers of population in this research were 40 employees. The total numbers of sample in this research were 35 employees by applying purposive sampling as the technique of collecting sample. *Fisher's Exact Test* was applied as the statistical analysis.

Statistical analysis result showed that there was an impact of the intensity of noisy toward the increase of blood pressure of PLTD Telaga's employee with  $p$  value  $0,003 < \alpha (0,05)$ , there was the influence of distance and the source of noisy of PLTD Telaga's employee with  $p$  value  $0,003 < \alpha (0,05)$ , and there was an impact of the period of noisy to the increase of blood pressure of PLTD Telaga's Employee with  $p$  value  $0,032 < \alpha (0,05)$

The conclusion of this research is that there is an impact of of noisy towards the increase of blood pressure of PT. PLN (persero) PLTD Telaga Gorontalo's employee.

This research suggests, especially for PLTD party, to hold the noisy intensity by minimizing the negative impact which is produced by electric generator by treating, repairing the machine, and adding the numbers of noise attenuator in workroom.

**Key word:** Noisy, Blood pressure, PLTD PT's employee.

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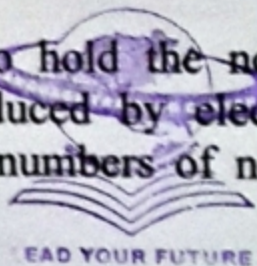
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