# HUBUNGAN PAPARAN GETARAN MESIN DENGAN KELUHAN *MUSCULOSKELETAL DISORDERS* (MSDs) PADA PENGENDARA BUS DI PT. MAYASARI BAKTI TAHUN 2019

**Musdika Moralia**

## Abstrak

MSDs merupakan keluhan yang dapat dipengaruhi oleh faktor lingkungan, faktor individu, dan faktor pekerjaan. Tujuan penelitian untuk mengetahui hubungan antara paparan getaran dan faktor individu (usia, lama kerja, kebiasaan merokok, dan indeks masa tubuh) terhadap keluhan MSDs. Penelitian ini menggunakan desain *cross sectional*, dengan sampel sebanyak 40 orang dengan teknik *purposive sampling*. Pengumpulan data mengenai keluhan MSDs menggunakan lembar kerja *Nordic Body Map* dan getaran diukur dengan *vibration meter*. Hasil uji statisitik *chi-square* dengan tingkat kepercayaan 95% (α=5%) didapatkan bahwa ada 33 orang (82,5%) yang mengalami keluhan MSDs. Hasil analisis bivariat menunjukkan adanya hubungan antara getaran dengan MSDs (*p value* = 0,013), lama kerja (*p value* = 0,002), kebiasaan merokok (*p value* = 0,003), dan indeks masa tubuh (*p value* = 0,04). Sedangkan variabel yang tidak berhubungan adalah indeks usia (*p value* = 0,316). Pekerja disarankan melakukan istirahat disaat mulai merasakan kekakuan pada otot tubuh dan Perusahaan dapat melakukan rekayasa *engineering* untuk mengurangi paparan getaran yang diterima pengendara bus.

**Kata Kunci** : Getaran, MSDs, Pengendara Bus

# RELATION BETWEEN VIBRATION EXPOSURE WITH MUSCULOSKELETAL DISORDERS AMONG BUS DRIVER OF PT. MAYASATI BAKTI IN 2019

**Musdika Moralia**

## Abstract

MSDs is a complaint that can be determined by environmental factors, individual factors, and work factors. The purposed of the study was to determine the relation between vibtaion exposure and individual factors (age, duration of work, smoking habits, and body mass index) to MSDs complaints on bus drivers. This research is a quantitative with cross sectional design, with 40 people as a sample that we got from purposive sampling technique. Data collection on MSDs used the Nordic Body Map worksheet and vibrations are measured by vibration meter. The chi-square statistic test results with a confidence level of 95% (α = 5%) found that there were 33 people (82.5%) who experienced MSDs. The results of bivariate analysis showed an association between vibration with MSDs (*p value* = 0.013), duration of work (*p value* = 0,002), smoking habits (*p value* = 0.003), and body mass index (*p value* = 0.04). While unrelated variables are age index (*p value* = 0.316). Workers are advised to take breaks while starting to feel stiffness in the muscles of the body and the Company can intervene in engineering conrol to reduce the vibration exposure received by bus drivers.

**Keywords**: Bus Drivers, MSDs, Vibration