

## **Stress and cardiovascular reactions to temporary noise experiences in healthy males**

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### **ABSTRACT**

#### **BACKGROUND:**

Although earlier epidemiological surveys demonstrate difficult consequences of long-term noise experience on cardiovascular health, the devices responsible for these results are indistinct.

#### **METHODS:**

Healthy male (n=15) contributors were observed on visits through no noise, low- or high-frequency noise experience situation lasting 45 min. Contributors did an ambulatory electrocardiogram (ECG) and blood pressure assessment and saliva tests were made before, through and after noise experiences. ECGs were processed for evaluations of heart rate variability (HRV): high-frequency power (HF), low-frequency power (LF).

#### **RESULTS:**

It was investigated an overall of 672, 198, and 156, HRV, saliva, and blood pressure measurements over 50 days. Declines in HRV (LF and RMSSD) were detected during noise experience (a diminution of 17 % (-32,-3.1). After adjusting for noise occurrence, during low occurrence noise experience, HF, LF, and SDNN were diminished (a decline of 29% (-54,-6.7), 31% (-49,-17), and 13% (-22,-5.8), correspondingly.

#### **CONCLUSIONS:**

These outcomes recommend that revelation to noise, and to low-frequency noise, harmfully influences HRV. The occurrence of noise should be reflected on when appraising the cardiovascular health of revelation.