

# HUBUNGAN TINGKAT STRES DENGAN TINGKAT KOGNITIF PADA LANSIA DI POSBINDU PERUMAHAN BUKIT CENGKEH DEPOK

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## Abstrak

**Latar Belakang:** Stres kronis melalui aktivasi sumbu HPA mengakibatkan pelepasan kortisol neurotoksik yang merusak hipokampus dan prefrontal cortex, mempercepat penurunan kognitif pada lansia. Penelitian ini menguji hubungan tingkat stres dengan fungsi kognitif pada lansia di Posbindu Perumahan Bukit Cengkeh Depok. **Tujuan:** Untuk mengetahui hubungan tingkat stres dengan tingkat kognitif pada lansia di posbindu perumahan bukit cengkeh depok. **Metode:** Studi cross-sectional pada 88 lansia (usia  $\geq 60$  tahun) menggunakan kuesioner PSS-10 untuk tingkat stres (ringan/sedang/berat) dan MMSE untuk fungsi kognitif (normal/ringan/berat). Analisis bivariat Fisher Exact Test menguji hubungan kedua variabel ( $p < 0,05$ ), dengan karakteristik responden (usia, jenis kelamin, pendidikan) dianalisis deskriptif. **Hasil:** Prevalensi stres sedang dominan (60%), gangguan kognitif berat tertinggi pada usia 60-74 tahun (41%). Terdapat hubungan signifikan antara tingkat stres dengan tingkat kognitif ( $p < 0,05$ ); lansia stres sedang-berat berisiko 3,2 kali mengalami gangguan kognitif ringan-berat (MMSE < 24). Usia dan pendidikan berpengaruh signifikan ( $p < 0,05$ ), jenis kelamin tidak ( $p = 1,000$ ). **Kesimpulan:** Stres berperan sebagai faktor risiko utama gangguan fungsi kognitif pada lansia melalui mekanisme kerusakan neuronal akibat kortisol berlebihan. Intervensi manajemen stres di Posbindu direkomendasikan untuk pencegahan dini demensia.

Kata Kunci: Lansia, Stres Kronis, Fungsi Kognitif, Posbindu

# THE RELATIONSHIP BETWEEN STRESS LEVELS AND COGNITIVE LEVELS IN THE ELDERLY AT THE POSBINDU, BUKIT CENGKEH HOUSING CENTER, DEPOK

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## Abstract

**Background:** Chronic stress through HPA axis activation causes excessive cortisol release, which is neurotoxic to the hippocampus and prefrontal cortex, accelerating cognitive decline in older adults. This study examined the relationship between stress levels and cognitive function among older adults at Posbindu, Bukit Cengkeh Housing, Depok. **Objective:** To determine the relationship between stress levels and cognitive function among older adults at Posbindu, Bukit Cengkeh Housing, Depok. **Methods:** A cross-sectional study involving 88 older adults (age  $\geq 60$  years) used the PSS-10 questionnaire to measure stress levels (mild/moderate/severe) and MMSE to assess cognitive function (normal/mild/severe). Bivariate analysis using Fisher Exact Test examined the relationship between the two variables ( $p < 0.05$ ), while respondent characteristics (age, gender, education) were analyzed descriptively. **Results:** Moderate stress prevalence was dominant (60%), with severe cognitive impairment highest in the 60-74 age group (41%). A significant relationship was found between stress levels and cognitive function ( $p < 0.05$ ); older adults with moderate-severe stress had 3.2 times higher risk of mild-severe cognitive impairment ( $MMSE < 24$ ). Age and education showed significant effects ( $p < 0.05$ ), while gender did not ( $p = 1.000$ ). **Conclusion:** Stress serves as a major risk factor for cognitive impairment in older adults through neuronal damage mechanisms due to excess cortisol. Stress management interventions at Posbindu are recommended for early dementia prevention.

Keywords: Older Adults, Chronic Stress, Cognitive Function, Posbindu