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ABSTRACT

Title of Abstract : Women's Social Independence and Climatic Factors Affect Stunting among Indonesian Children
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Background : Social independence in women, climate change, and stunting are interconnected issues through a series of pathways that can create a cycle of vulnerability and adverse health impacts on children, especially in developing countries.

Objective : The aims of this study are to explore the impact of women's social independence and climate factors on stunting in children under 5 years of age in East Java Province, Indonesia.

Research Methods/ Implementation Methods : This study used secondary data from a nationally representative 2023 Indonesian Health Survey sample. Data from 3,928 children under five and their parents were analysed. Descriptive analysis and multivariable logistic regression adjusting for complex sampling design were used to examine the risks of contributing factors, controlling for potential confounders.

Results : Children of mothers who had medium and higher social independence showed a reduced risk of stunting incidence, compared to children of mothers who had lower social independence. Stunting decreased by 21.61% for 1°C increase in average temperature. Meanwhile, stunting increased by 12% for 1% increase in average humidity, 0.4% for 1 mm increase in average rainfall, and 1% for 1 hour increase in sunshine duration. Increased stunting risks were also associated with poor environmental sanitation, diarrheal diseases, and older age.

Conclusion/Lesson Learned : The study indicates that women's social independence can reduce stunting incidence among children under five in Indonesia. While decreased temperature and increased rainfall, humidity and duration of sunshine could bring more stunting incidence in the study population. These findings highlight the importance of developing integrative preventive strategies to reduce stunting among Indonesian children under-5.

Keyword : climatic factors; social independence; stunting