

## RESEARCH NOTE

# GENETIC DIFFERENTIATION OF *STRONGYLOIDES STERCORALIS* FROM TWO DIFFERENT CLIMATE ZONES REVEALED BY 18S RIBOSOMAL DNA SEQUENCE COMPARISON

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**Abstract.** Over 70 countries in tropical and subtropical zones are endemic areas for *Strongyloides stercoralis*, with a higher prevalence of the parasite often occurring in tropical regions compared to subtropical ones. In order to explore genetic variations of *S. stercoralis* from different climate zones, 18S ribosomal DNA of parasite specimens obtained from Thailand were sequenced and compared with those from Japan. The maximum likelihood indicates that *S. stercoralis* populations from these two different climate zones have genetically diverged. The genetic relationship between *S. stercoralis* populations is not related to the host species, but rather to moisture and temperature. These factors may directly drive genetic differentiation among isolated populations of *S. stercoralis*.

**Keywords:** *Strongyloides stercoralis*, 18S ribosomal DNA, Thailand, Japan

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