

**PREDICTIVE SPECIES DISTRIBUTION MODELLING AS TOOL FOR STUDYING  
GEOGRAPHIC DISTRIBUTION OF THE RATTLESNAKE *Crotalus durissus* IN  
BRAZIL**

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Predictive species distribution modelling (SDM) is a widely used tool for conservation strategies planning of species in different contexts (rare, invasive or threatened species for example). Herein, we employed SDM in order to assess the current and potential distribution of the rattlesnake *Crotalus durissus* in Brazil. We generated distribution maps based on records available in the Specieslink database as well as from field data collected in areas of the herpetological monitoring program of the Integration Project of the São Francisco River (PISF, in Portuguese). We used Maxent to generate the environmental model. In total, 143 distribution records were recovered in Brazil, presenting a critical gap of records in the Caatinga Biome, with more than 75% of records related to the south and southeastern regions of Brazil. The resulting model showed an AUC = 0.962. This index evaluates the efficiency of the generated model and ranges from 0 (unreliable) to 1 (very reliable). We found that *C. durissus* presents a high potential of distribution in the Caatinga and transitional areas between Atlantic Forest and Cerrado Biomes in their central and southeastern portions.