

Dietary Niche Overlap Between the Javan Deer (*Rusa timorensis*) and Cattle (*Bos indicus*) in Labuhan Merak Savanna, Baluran National Park

Abstract

Livestock grazing in savannas had been proven to cause several negative effects for wildlife, including the Javan deer (*Rusa timorensis* Balinville 1822). This research aims to determine whether the free-roaming cow grazing in Savannas of Labuhan Merak, Baluran National Park could potentially be competitor for the Javan deer. The next goals were to identify whether the existence of settlements in these area also affect distribution and population of Javan deer. To answer these questions, field observations and interviews with the local people has been performed during the dry season in 2015. Distance sampling method was employed to estimate the javan deer population density. Javan deer population density in the Labuhan Merak Savana was 0.1103 individuals/Ha. The deer population density this area were lower when compared to other regions without livestock grazing activity. At makrohabitat level, deer in the Savannas Merak tend to occupy the habitat near settlement areas, while on the mikrohabitat level the presence of deer was more influenced by the availability of herbaceous plants. Results of fecal analysis indicate the level of diet overlap between deer and cattle was at 75,08%. These value could not illustrate the existence of competition between the two animals. However, if considering the potential of overgrazing, fire and the condition of the savannas in the region then the chance of feed competition become quite high.

Keywords : *Niche overlap*, Sapi (*Bos indicus*), Rusa Jawa (*Rusa timorensis*), Savana

Tumpang Tindih Relung Pakan Antara (*Rusa timorensis*) dengan Sapi (*Bos indicus*) di Savanna Merak, Taman Nasional Baluran

Intisari

Taman Nasional Baluran adalah salah satu taman nasional di Indonesia yang terkenal karena ekosistemnya yang eksotis. Saat ini TNB menghadapi permasalahan sosial yang diakibatkan karena adanya pemukiman di bagian utara taman nasional. Salah satu masalah yang timbul akibat adanya pemukiman tersebut adalah penggembalaan hewan ternak di dalam kawasan taman nasional. Penggembalaan tersebut menimbulkan tekanan bagi satwa liar yang ada, terutama rusa (*Rusa timorensis*). Penelitian ini telah dilaksanakan mulai bulan November - Desember 2015. Perkiraan kepadatan populasi rusa dilakukan dengan metode *distance sampling* dan menghasilkan nilai kepadatan populasi rusa di Savana Merak sebesar 0.1103 individu/Ha. Kepadatan rusa di wilayah ini lebih rendah apabila dibandingkan dengan wilayah lain yang tidak ada aktivitas penggembalaannya. Pada level makrohabitat, rusa di Savana Merak cenderung menempati habitat di dekat wilayah pemukiman, sementara itu pada level mikrohabitat kehadiran rusa lebih dipengaruhi oleh ketersediaan tumbuhan herba. Hasil *fecal analysis* dapat menunjukkan bahwa tingkat tumpang tindih relung pakan antara rusa dan sapi sebesar 75,08%. Angka tersebut belum dapat menggambarkan adanya kompetisi antara kedua satwa tersebut. Meskipun demikian, telah terlihat adanya fenomena *overgrazing* di wilayah tersebut sehingga kompetisi pakan antara kedua satwa tersebut cukup tinggi.

Kata Kunci : Tumpang tindih relung, Sapi (*Bos indicus*), Rusa Jawa (*Rusa timorensis*), Savana