

Abstract:

Parasites were collected from 20 Burchell's zebra, *Equus burchelli antiquorum*, from Isiolo district, Kenya. 10 were ranched animals from the Lewa Downs Ranch and 10 free ranging from the areas adjacent to the ranch to the north. The animals were culled from 4th to 18th June 1995. The gastrointestinal tract was removed from the carcass and separated as stomach, small and large intestines and searched for parasites. The abdominal cavity was scrutinized for *Setaria* species. The parasites were identified to genus and in some cases species level. All animals were infected with at least three genera of parasites of which at least one genus was a nematode. A total of 10 genera representing eight families were recovered from the two groups. These included six nematode families, Strongylidae, Atractidae, Oxyuridae, Spiruridae, Setariidae, and Ascaridae, one cestode family, Anoplocephalidae and one family of the larvae of *Gasterophilus* bot flies, Gasterophilidae. The most prevalent families were Atractidae (100%) and Gasterophilidae (100%). The principle nematode genera was *Crossocephalus* whose total burden, plus or minus the standard deviation, was $3,471,129 \pm 1,352,922$. *Setaria* species were recovered from the abdominal cavity of 45% of all the animals examined. The overall total worm burden was higher in the free ranging zebra $2,743,410 \pm 849,604$ than the ranched zebra, $787,669 \pm 246,006$. The range of individual genera varied from 0 to 269,225 in the free ranging group, which was higher than 0 to 77,890 in the ranched animals. From statistical analysis, no significant difference could be found between males and females. However, the burdens of genera *Strongylus*, *Triodontophorus*, *Crossocephalus* and *Parascaris* were significantly higher in free ranging animals.