Presence of Strongyle Infection in Thoroughbred Horses of Punjab Province, Pakistan

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ABSTRACT

Strongyle infection among horses is complex and produces an inflammatory enteropathy resulting in impaired intestinal motility and microcirculation. In this study, presence of strongylosis was determined by fecal examination for nematode eggs in thoroughbred horses of Punjab Province, Pakistan. A cross sectional study was conducted from January to December 2017 in four districts of Punjab province namely Sahiwal, Lahore, Sargodha and Mandi Baha-ud-Din. A total of 2,400 fecal samples were collected from horses and examined by direct smear and floatation method. Presence was calculated according to region, month, season, age and gender. In addition, the effect of meteorological factors such as temperature, humidity and rainfall were also analyzed. The findings revealed that out of 2,400 samples, 973 (40.54%) were found positive for strongylosis. There was a statistically significant difference between seasons and months with disease occurrence. The parasite and host form an association to form an epidemiological danger. The existence and localization of this association must be recognized well in time to control the problem.

Keywords: Strongylosis, Nematodes, Horses, Presence, Infestation

INTRODUCTION

Livestock, an indispensable part of agriculture sector, epitomizes a foremost national resource. It plays a vital role in attaining and improving living standards of both developing and developed nations (Smith et al., 2013). According to Pakistan Livestock Census, equine population is 4.76 million