Short Communication

Ecological characters of leishmaniasis vectors in Kalaleh district, Golestan province, Iran, (2006-07)

Aioub Sofizadeh (MSc)*[1], Yavar Rassi (PhD)[2], Mohammad Reza Abbasi (MSc)[3]
Mohammad Ali Oshaghi (PhD)[4], Rasool Salahi (MD)[5]
Sina Rafizadeh (MSc)[6], Mehdi Mohebali (PhD)[7]

[1]MSc in Medical Entomology and Vector Control, Health Center of Kalaleh District, Gorgan University of Medical Sciences, Kalaleh, Iran. [2]Professor, Department of Medical Entomology and Vector Control, School of Public Health, Tehran University of Medical Sciences, Tehran, Iran. [3]Academic Instructor, Department of Medical Entomology and Vector Control, School of Public Health, Tehran University of Medical Sciences, Tehran, Iran. [4]Assistant Professor, Department of Medical Entomology and Vector Control, School of Public Health, Tehran University of Medical Sciences, Tehran, Iran. [5]General Physician, Health Center of Kalaleh, Gorgan University of Medical Sciences, Kalaleh, Iran. [6]MSc in Human Ginitic, Department of Emergency, Ministry of Health and Medical Education, Tehran, Iran. [7]Assistant Professor, Department of Parasitology and Mycology, School of Public Health, Tehran University of Medical Sciences, Tehran, Iran.

Abstract

Background and Objective:leishmaniasis is a Zoonotic disease that is transmited by sandfly to human. This study were carried out in order to demonstrate some ecological characters of leishmaniasis vectors in Kalaleh district, Golestan province ,Iran, during 2006-07.

Materials and Methods: In present study 6 villages were selected. Sandfly were collected by sticky traps. 3 places were sampled in each village and in each places 20 traps were installed. After sampling collection, we used diagnostic criteria to identify the Sandflies, also confirmed human cases were recorded according to the months of identification.

Results: 4900 sandflies were detected in 6 villages and 12 species of sandflies were identified, which including *P.papatasi, P.mongolensis, P.caucasicus, P.caucasicus group, P.sergenti, P.alexandri, P.kazeroni, P.brevis, P.(adlerius) sp, S.sintoni, S.clydei, S.sogdiana). P.papatasi* was predominant species in indoor places (46.1%) and *S.sintoni* was in outdoor places (36.7%). Sandflies activities extended from early May through mid October with two peaks in mid June and September. Human infection had a important peak in January. During the collection of sandflies, the species of *P.alexandri, P.kazeroni, P.brevis, P.(Adlerius sp.), S.clydei and S.sogdiana* were collected for the first time from this area.

Conclusion: In this study, *P.papatasi* was the predominant species in this area. Sandflies second activity peak occured in September that is crucial for transmission of disease. The incubation period for this disease was four months.

Keywords: Leishmaniasis, Ecology, Sandfly, Iran

*** Corresponding Author***: Aioub Sofizadeh (MSc), E-mail: a_sofizadeh@yahoo.com*

Received 9 Jun 2008 **Revised** 4 Mar 2009 **Accepted** 2 May 2009