



Faculty of Agriculture, Kasetsart University

Department of Entomology, Bangkhen, Bangkok 10900 Thailand



Biological control & Insect-parasitic nematodes Laboratory

Under the direction of
Atirach Noosidum, Ph.D. (Entomology)
e-mail: fagrarn@ku.ac.th



SPECIFIC AREAS OF RESEARCH:

- Insect-parasitic nematodes
- Insect pathology
- Biological control of insects
- Insect pest management
- Acarology

CURRENT RESEARCHS:

Insect-parasitic nematodes

1. An improved method for entomopathogenic nematode application to control various insect pests in vegetable and fruit crops.
2. Behavioral study of insect-parasitic nematode and insect host relationships.
3. New entomopathogenic nematodes native to Thailand and their virulence.
4. Nematode-bacterial symbiont for controlling insect pests.



Current Students:

- Ms. Pattira Satwong, M.Sc.
- Ms. Sirirat Mangtab, M.Sc.



Insect parasitoid

Biology, ecology, mass rearing and releasing ratio of Braconid wasp to control insect pests.

Current Student

- Mr. Weerachai Somsri, M.Sc.



Insect management

1. Thrips outbreaks and control tactics in mangosteen orchard.
2. Integrated management for Teak beehole borer.
3. Analysis of genetic diversity of Teak beehole borer in northern Thailand's forest plantation.

Research Team:

- Dr. Prakai Thephan
- Dr. Benjakhun Sangtongpraow
- Dr. Atsalek Rattanawanee
- Dr. Watana Sakchoowong



SELECTED PUBLICATIONS & PRESENTATIONS :

1. **Noosidum, A., A.K. Hodson, E.E. Lewis* and A. Chandrapatya.** 2010. Characterization of new entomopathogenic nematodes from Thailand: foraging behavior and virulence to the Greater wax moth, *Galleria mellonella* L. (Lepidoptera: Pyralidae). *J. Nematol.* 42(4): 281-291.
2. **Noosidum, A., A. Prabaripai, T. Chareonviyaphap and A. Chandrapatya*.** 2008. Exdoto-repellency properties of essential oils from *Melaleuca leucadendron* L., *Litsea cuberba* (Lour.) Persoon and *Litsea salicifolia* (Nees). on *Aedes aegypti* (L.) mosquito. *J. Vector Ecol.* 33(2): 305-312.
3. **Noosidum A., Hodson A.K., Chandrapatya A. and Lewis E.E.** 2010. A new entomopathogenic nematode from Thailand and its virulence against *Spodoptera litura* (Fabricius) (Lepidoptera: Noctuidae) and *Plutella xylostella* (Linnaeus) (Lepidoptera: Plutellidae). KU-UT Student Symposium. Poster presentation. February 21, 2011. Faculty of Agriculture, Kasetsart University, Bangkok campus.
4. **Noosidum A., Hodson A.K., Chandrapatya A. and Lewis E.E.** 2012. A new entomopathogenic nematode from Thailand and its virulence against *Tenebrio molitor* L. (Coleoptera: Tenebrionidae) and *Oryctes rhinoceros* MacLeay (Coleoptera: Scarabaeidae). 2nd IS-BioPEN. Poster presentation. September 25, 2012. Maruay Garden Hotel. Bangkok.