INSECTS: INVENTORY AND IDENTIFICATION

6th - 24th of August 2018

Teachers: DK = Dave Karlsson (Station Linné)

MF = Mattias Forshage (NRM)

JT = Jon Tinnert (Linnéuniversitetet)

FR = Fredrik Ronquist (NRM)

TR = Tomas Roslin (SLU)

MP = Moa Pettersson (Station Linné, lab. assistant)

Days: AM = 09:00 to 12:00 (coffee break 10:15 - 10:45)

Lunch break 12:00 - 13:00

PM = 13:00 - 16:00 (coffee break 14:15 - 14:45)



FIRST WEEK

Monday, August, 6

AM Introduction and welcome to Öland, Station Linné and SMTP // DK and other

PM Introduction entomology (all insects) // MF

Evening social hour/welcome party (optional...)

Tuesday, August, 7

 $\textbf{AM} \ \ \text{Preparation techniques. Construction and use of keys. Students' project planning \textit{//} DK, MF$

PM Setting out traps (field session)// DK, MF

Wednesday, August, 8

AM Comparative insect morphology and terminology //DK

PM Lab session; insect morphology and terminology //DK

Evening Night excursion // DK, MF



Thursday, August, 9

AM Diversity, phylogeny and evolution of insects: Hymenoptera // MF

PM Diversity, phylogeny and evolution of insects: Ichneumonoidea and Chalcidoidea // DK, MF

Friday, August, 10

AM Diversity, phylogeny and evolution of insects: Coleoptera // MF

PM Diversity, phylogeny and evolution of insects: Diptera // JT

Evening Night excursion (yet uncertain, optional...)



SECOND WEEK

Monday, August, 13

AM Inventory methodology //MF

PM Phylogenetic methods //FR

Tuesday, August, 14

 $\boldsymbol{\mathsf{AM}}\ \ \mathsf{Field}\ \mathsf{session},\ \mathsf{collecting}\ \mathsf{insects}\ \mathsf{/\!MF}\ \mathsf{and}\ \mathsf{other}$

PM Lab session; determination and preparation //MF and other

Wednesday, August, 15

AM Field session, collecting insects //MF and other

PM Lab session; determination and preparation //MF and other

Thursday, August, 16

AM Field session, collecting insects //MF and other

PM Lab session; determination and preparation //MF and other

Friday, August, 17

AM Own project/field/lab

PM Own project/field/lab







THIRD WEEK

Monday, August, 20

AM Taxon quiz //DK, MP, JT

PM Molecular methods for dissecting insect diversity – a very first primer //TR

Tuesday, August, 21

AM Going full out: All taxon biodiversity inventories //TR

PM Own project/field/lab

Wednesday, August, 22

AM Own project/field/lab

PM Own project/field/lab

Thursday, August, 23

AM Oral presentations and course closing (alternative 1)

PM Own project/field/lab (optional)

Friday, August, 24

AM Oral presentations and course closing (alternative 2)

PM -

Course literature:

Gullan, PJ & Cranston, P S: Insects: An outline of Entomology, Chapman & Hall (appr. 600 SEK) (Academic standard textbook) OR <u>as a free pdf!</u>

Or:

Grimaldi, D & Engel, M S: Evolution of the Insects, Cambridge University Press (big, beautiful and up-to-date book, contains far more than the present course is able to cover, but strongly recommended for anyone with an interest in insects. Out of print, but might be available as used for appr. 1600 SEK.)

And:

Various on-line identification keys and handouts.

