Insects of Mwamba Field Study Centre, Plot 28, Dongakundu, Watamu **A Rocha Kenya**

In July 2008 three days of invertebrate trapping was carried out in the forest and bush of the A Rocha Kenya field study centre nature trail in Watamu as a preliminary attempt to identify what species of invertebrates occur here. A combination of pitfall traps and pan traps were used and the data has been sorted according to date and trap type. Laban Njoroge, an entomologist with the National Museums of Kenya kindly identified the specimens and drew up the following list which can be used as a basis for further work

Colin Jackson - A Rocha Kenya

A total of 50 genera of insects were collected during the three days of sampling. The importance of using different trapping methods is evident. As can be seen, some groups appeared in some traps in very low numbers or were absent at all but were quite abundant in other traps. The ground beetles were, for instance, many and more diverse in the pitfall traps than in the pan traps. Although it is not known how many pan traps (of each colour) there were, from this data the yellow ones seems more efficient than the blue ones.

Another noticeable thing is that some species were very common in almost all vials indicating that this small forest has some specialist invertebrate inhabitants. These are five wasps and ants (*Camponotus* sp., *Cathimeris* sp., *Platythyrea* sp., *Polyhachis* sp., *Tachysphex* sp., 1 fly (*Sarcophaga* sp.), 2 beetles (*Onthophagus* sp. and *Mylabris rorifera* and 1 cricket (*Gryllodes* sp.). These can indeed be monitored for some time with a view of establishing
whether they can be good indicator species of ecosystem health. Alternatively the four highly coastal endemic species can in my opinion be monitored for the same purpose. The four endemics are quite easy to recognise even for an amateur entomologist.

Laban Njoroge

Date	Collection method	Order	Family	Sub-Family	Genus	Species
15.July.2008	**pitall traps**	*Coleoptera*	*Chrysomelidae*	*Eumolpinae*	_	_
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	*Psammodes*	*castanopterus*
		Coleoptera	*Curculionidae*	*Otiorhychinae*	*Peribrotus*	*pustulosus*
		Coleoptera	*Carabidae*	*Harpalinae*	*Systolocranius*	*validus*
		Coleoptera	*Carabidae*	*Harpalinae*	*Xenodus*	*sudanicus*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
		Hymenoptera	*Scoliidae*	_	*Cathimeris*	*sp.*
		Hymenoptera	*Mutiliidae*	_	_	_
15.July.2008	**Pan traps BLUE**	*Orthoptera*	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Camponotus*	*sp.*
		Coleoptera	*Curculionidae*	*Otiorhychinae*	_	_
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*

15.July.2008	**Pan traps YELLOW**	*Coleoptera*	*Chrysomelidae*	*Crioceridae*	*Lema*	*chalcoptera var sanguinicollis*
		Coleoptera	*Chrysomelidae*	*Eumolpinae*	_	_
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	***Homalopis**	***lobulata**
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	*Cryptochile*	*elegans*
		Coleoptera	*Carabidae*	*Harpalinae*	*Axinotoma*	*punctulata*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Hymenoptera	*Braconidae*	_	_	_
		Hymenoptera	*Scoliidae*	_	_	_
		Hymenoptera	*Sphecidae*	*Larrinae*	*Tachysphex*	*sp.*
		Hymenoptera	*Anthophoridae*	*Xylocopinae*	*Braunsapis*	*sp.*
		Hymenoptera	*Pompilidae*	*Ctenocerinae*	*Pseudagenia*	*spp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Camponotus*	*sp.*
		Hymenoptera	*Formicidae*	_	*Crematogaster*	*sp.*
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
17.July.2008	**pitall traps**	*Blattodea*	*Blaberidae*	*Periphaeriinae*	*Gynopeltis*	*neivei*
		Coleoptera	*Carabidae*	*Harpalinae*	*Axinotoma*	*punctulata*
		Coleoptera	*Carabidae*	*Harpalinae*	*Oodes*	*submetallicus*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Hemiptera	*Cydinidae*	*Cydininae*	*Cydinus*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*spp.*
		Hymenoptera	*Formicidae*	*Dorylinae*	*Annoma*	*nigricans*
		Hymenoptera	*Pompilidae*	_	_	_
		Hymenoptera	*Scoliidae*	_	*Cathimeris*	*sp.*
		Orthoptera	*Gryllidae*	_	_	_
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
17.July.2008	**Pan traps BLUE**	*Coleoptera*	*Meloidae*	*Meloinae*	***Mylabris**	***rorifera**
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Hemiptera	*Reduviidae*	*Harpactorinae*	*Sphedanolestes*	*nanus*
		Hymenoptera	*Apidae*	*Apinae*	*Apis*	*mellifera*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
		Hymenoptera	*Scoliidae*	_	_	_
		Hymenoptera	*Pompilidae*	_	_	_
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*

17.July.2008	**Pan traps YELLOW**	*Coleoptera*	*Scarabaeidae*	*Coprinae*	*Onthophagus*	*sp.*
		Coleoptera	*Curculionidae*	*Otiorhychinae*	*Peribrotus*	*pustulosus*
		Coleoptera	*Meloidae*	*Meloinae*	*Mylabris*	*rorifera*
		Coleoptera	*Chrysomelidae*	*Eumolpinae*	_	_
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Diptera	*Lauxaniidae*	_	_	_
		Hymenoptera	*Anthophoridae*	*Xylocopinae*	*Braunsapis*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*spp.*
		Hymenoptera	*Mutiliidae*	_	_	_
		Hymenoptera	*Mutiliidae*	_	_	_
		Hymenoptera	*Pompilidae*	_	_	_
		Hymenoptera	*Pompilidae*	_	*Anoplius*	*sp.*
		Hymenoptera	*Pompilidae*	*Macromerinae*	*Pseudagenia*	*rubrirostris*
		Hymenoptera	*Scoliidae*	_	_	_
		Hymenoptera	*Scoliidae*	_	*Micromeriella*	*sp.*
		Hymenoptera	*Scoliidae*	_	*Cathimeris*	*sp.*
		Hymenoptera	*Sphecidae*	*Larrinae*	*Tachysphex*	*sp.*
		Hymenoptera	*Sphecidae*	*Ampulicinae*	*Chalybion*	*sp.*
		Hymenoptera	*Tiphiidae*	_	_	_
		Orthoptera	*Tetrigidae*	*Scelimeninae*	*Loxilobus*	*sp.*
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
17.July.2008	**???????????**	*Coleoptera*	*Tenebrionidae*	*Tentyriinae*	***Cryptochile***	***elegans***
		Coleoptera	*Scarabaeidae*	*Coprinae*	*Onthophagus*	*sp.*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Diptera	*Muscidae*	*Muscidae*	*Orthellia*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
18.July.2008	**pitall traps**	*Blattodea*	*Blaberidae*	_	*Epilampra*	*pardalina*
		Blattodea	*Blattidae*	*Ectobiinae*	*Ectobius*	*sp.*
		Coleoptera	*Chrysomelidae*	*Eumolpinae*	_	_
		Coleoptera	*Scarabaeidae*	*Coprinae*	*Onthophagus*	*sp.*
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	*Homalopis*	*lobulata*
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	*Cryptochile*	*elegans*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Hemiptera	*Cydinidae*	_	_	_
		Hemiptera	*Cydinidae*	*Cydininae*	*Cydinus*	*sp.*
		Hemiptera	*Cydinidae*	_	_	_
		Hemiptera	*Lygaeidae*	*Aphaninae*	*Aphanus*	*apicalis*
		Hemiptera	*Pyrrhocoridae*	_	*Dysdercus*	*sp.*

		Hymenoptera	*Apidae*	*Apinae*	*Hypotrigona*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Platythyrea*	*sp.*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
		Hymenoptera	*Formicidae*	*Myrmicinae*	*Catalaucus*	*sp.*
		Hymenoptera	*Formicidae*	*Dorylinae*	*Annoma*	*nigricans*
		Hymenoptera	*Formicidae*	*Formicinae*	*Camponotus*	*sp.*
		Hymenoptera	*Mutiliidae*	_	_	_
		Hymenoptera	*Scoliidae*	*Sphecinae*	*Liris*	*memnonia*
		Hymenoptera	*Scoliidae*	_	_	_
		Hymenoptera	*Sphecidae*	*Craboninae*	*Trypoxylon*	*sp.*
		Hymenoptera	*Sphecidae*	*Larrinae*	*Tachysphex*	*sp.*
		Neuroptera	_	_	_	_
		Orthoptera	*Acrididae*	*Eyprepocnemidinae*	*Taramassus*	*sp.*
		Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
18.July.2008	**Pan traps BLUE**	*Coleoptera*	*Curculionidae*	*mesysolobinae*	*Mesysolobys*	*sparsus*
		Coleoptera	*Meloidae*	*Meloinae*	*Mylabris*	*rorifera*
		Coleoptera	*Tenebrionidae*	*Tentyriinae*	*Homalopis*	*lobulata*
		Coleoptera	*Meloidae*	*Meloinae*	*Mylabris*	*rorifera*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Embioptera	_	_	_	_
		Hemiptera	*Coreidae*	_	*Acanthomia*	*horrida*
		Hymenoptera	*Apidae*	*Apinae*	*Apis*	*mellifera*
		Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*spp.*
		Hymenoptera	*Megachilidae*	_	_	_
		Hymenoptera	*Scoliidae*	_	*Cathimeris*	*sp.*
		Hymenoptera	*Sphecidae*	*Craboninae*	*Trypoxylon*	*sp.*
		Hymenoptera	*Sphecidae*	_	_	_
		Hymenoptera	*Tenthredinidae*	*Hylotominae*	*Arge*	*spp.*
		Orthoptera	*Acrididae*	*Catantopinae*	***Cryptocatantops**	***allesandricus***
18.July.2008	**Pan traps YELLOW**	*Coleoptera*	*Scarabaeidae*	*Coprinae*	*Onthophagus*	*sp.*
		Coleoptera	*Attelabidae*	_	*Rhamnapoderus*	
		Coleoptera	*Curculionidae*	*mesysolobinae*	*Mesysolobys*	*sparsus*
		Coleoptera	*Meloidae*	*Meloinae*	*Mylabris*	*rorifera*
		Coleoptera	*Meloidae*	*Meloinae*	*Ceroctis*	*vittata*
		Diptera	*Sarcophagidae*	*Sarcophaginae*	*Sarcophaga*	*sp.*
		Diptera	*Stratiomyidae*	*Hermetiinae*	*Hermetia*	*illucens*
		Hemiptera	*Cydinidae*	_	_	_
		Hemiptera	*Plataspidae*	_	*Coptosoma*	*sp.*
		Hymenoptera	*Anthophoridae*	*Xylocopinae*	*Braunsapis*	*sp.*

Hymenoptera	*Formicidae*	*Formicinae*	*Camponotus*	*sp.*
Hymenoptera	*Formicidae*	*Formicinae*	*Polyrhachis*	*sp.*
Hymenoptera	*Formicidae*	*Myrmicinae*	*Catalaucus*	*sp.*
Hymenoptera	*Ichneumonidae*	_	_	_
Hymenoptera	*Scoliidae*	_	*Cathimeris*	*sp.*
Hymenoptera	*Sphecidae*	*Larrinae*	*Tachysphex*	*sp.*
Hymenoptera	*Sphecidae*	*Nyssoninae*	*Bembix*	*sp.*
Orthoptera	*Acrididae*	*Catantopinae*	*Cryptocatantops*	*allesandricus*
Orthoptera	*Gryllidae*	*Gryllinae*	*Gryllodes*	*sp.*
Orthoptera	*Pyrgomophidae*	_	*Chrotogonus*	*sp.*

KEY

* Highly endemic to the Coastal region:Not recorded anywhere else in Kenya outside the coast.

Members of the insect Orders

Blattodea	Cockroaches
Coleoptera	Beetles
Diptera	Flies
Embioptera	Webspinners
Hemiptera	True bugs
Hymenoptera	Bees, Wasps and Ants
Neuroptera	Lacewings
Orthoptera	Grasshoppers

Common names of the Families

Acrididae	Short-horned grasshoppers	Lauxaniidae	None	Stratiomyidae	Soldier flies
Anthophoridae	Carpenter bees	Lygaeidae	Seed bugs	Tenebrionidae	Darkling beetles
Apidae	None	Megachilidae	Leaf cutter bees	Tenthredinidae	Saw flies
Attelabidae	Leaf-rolling beetles	Meloidae	Blister beetles	Tetrigidae	Pygmy grasshoppers
Blaberidae	Cockroaches	Muscidae	None	Tiphiidae	None
Blattidae	Cochroaches	Mutiliidae	Velvet ants		
Braconidae	Braconid wasps	Plataspidae	Pill bugs		
Carabidae	Ground beeltes	Pompilidae	Spider wasps		
Chrysomelidae	Leaf beetles	Pyrgomophidae	Pyrgomophid grasshoppers		
Coreidae	Twig wilters	Pyrrhocoridae	Cotton stainers		
Curculionidae	Weevils	Reduviidae	Assasin/pirate bugs		
Cydinidae	Negro bugs	Sarcophagidae	Flesh flies		
Formicidae	Ants	Scarabaeidae	Dung beetles		
Gryllidae	Crickets	Scoliidae	Scoliid wasps		
Ichneumonidae	Ichneumons	Sphecidae	Specid wasps		