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**BioConnect**



# **Herpetofauna of the studied Himas**

**Prepared  
by  
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**Disclaimer:**

Under the BioConnect project funded by the European Union, the Society for the Protection of Nature in Lebanon (SPNL) has conducted an extensive study documenting the herpetofauna of various Hima sites across Lebanon. Dr. Riad Sadek's study highlights the ecological importance of these protected areas and underscores the need for continued conservation efforts.

**Methods:**

The sites were visited during days and nights in all seasons where visual observations have been made and some specimens were collected for identification and photography of the species. Some specimens were captured by hand or using a noose for further confirmation of ID and for photographic documentation.

Amphibians were observed as adults, some at night but some were detected in the water as tadpoles or nymphs.

Local people have also given useful information on species observed but the information is also often unreliable and had to be verified. This information is used on occasion especially when it is given by experienced persons who normally spend time in the field and give plausible information.

The Hima sites could be listed as the following distinct sites:



- I. Ebel El Saqi
- II. Ain Zebdeh and Khirbet Qanafar
- III. Ras El Meten
- IV. Hammana-Dahr El Baydar
- V. Mansouri Beach
- VI. Qleileh Beach










## I. Ebel El Saji:

This site consists of a pine forest within which there are open ground and rocky areas. Given some previous knowledge of the site and the recent survey over two days it is possible to list the following confirmed records of reptiles and amphibians:




□. Observed species



No	Species	Common Name	Status	Notes	Picture
1	<i>Pelophylax bedriagae</i>	Mars h Frog	Common nationally but not in Hima	This is a very common species in Lebanon. In this Hima, its presence will depend on any aquatic habitats that may be created. This specimen was found in a concrete roofed water reservoir.	
2	<i>Bufotes sitibundus</i>	Green toad	Common nationally but not in Hima	Tadpoles were observed in a small pool in the artificial pond.	

3	<i>Testudo graeca</i>	Land tortoise سلحفاة	Common	quite evident and abundant in this site. The main danger is collection by people for keeping as pets.	
4	<i>Ptyodactylus puiouxii</i>	Fan-fingered gecko	Common	Very common in rocky habitats. Abundant locally but usually restricted to the southern part of Lebanon. It is found in Mount Hermon.	
5	<i>Mediodactylus orientalis</i>	Tree gecko	Common	This is very common in Lebanon in many locations and at various altitudes.	

6	<i>Laudakia (Stellagama) stellio</i>	common agama; Hardun	Very common	Very common in rocky areas, dry stone walls and could also be found on trees.	
7	<i>Phoenicolacerta laevis</i>	common Levant wall lizard شميسة	Common	Found especially in moist areas.	
8	<i>Ophisops elegans</i>	Snake-eyed Lizard شميسة	Very common	Found in open ground	
9	<i>Heremites vittatus</i>	Bridled skink	Very common	Found in a variety of habitats.	



10	<i>Chalcides guentheri</i>	Gunter's Cylindrical (legless) skink	Common?	Found in a variety of habitats	
11	<i>Ablepharus rueppellii</i>	Snake-eyed skink	Common	Especially in areas of leaf litter	
12	<i>Platyceps collaris</i>	Collared whip snake or collared race; Nashabiye h	Common	Found in a variety of habitats	

13	<i>Dolichophis jugularis</i>	Black large whip snake ; Hana sh Aswad	Common	This was observed in the areas near the river but we expect to find it throughout the site.	
	<i>Daboia palaestinae</i>	Palestinian Viper	Common	Observed in this Hima but this photograph is not from the site. This is a dangerous venomous snake to be approached or handled with great caution.	

□. Some other species might be present on the site.






<i>Eirenis decemlineatus</i>	<i>Malpolon insignitus</i>	<i>Hemidactylus turcicus</i>
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- . Recommendations: The rock fan-fingered gecko is known now to be present in Mount Hermon protected area but could be found in other ones, but that is still to be confirmed in an ongoing study. It might be worth taking measures to secure some protection.




There are only two amphibian species that are observed in this Hima but they are not abundant. Although are quite abundant nationally, local amphibian presence generally might be enhanced in the area if water bodies and surfaces are made available again and maintained. This could also attract water snakes which will be a good addition to the Hima.

## II. Ain Zebdeh and Khirbet Qanafar



The two sites are very similar and likely to have the same fauna. The species observed in these two sites are:


No	Species	Common Name	Status	Notes	Picture
1	<i>Pelophylax bedriagae</i>	Marsh frog	Abundant nationally	These frogs are very abundant nationally but might be affected now and in the future by the pollution of aquatic habitats. In this location, they seem to be restricted due to the availability of suitable aquatic habitats.	

2	<i>Salamnadr a infraimmac ulata</i>	Salamander	Common nationally	Nymphs were observed in water holes. This is affected also by the rarity of suitable aquatic habitats needed for its breeding.	
3	<i>Testudo graeca</i>	Common land tortoise	Common	This is found widely in Lebanon but the local population here should be protected from potential collection as pets. Could be affected also by diminishing areas of natural herbaceous plants in favor of cultivation.	
4	<i>Laudakia (Stellagama) stellio</i>	Hardun	Very common	Very abundant nationally and locally.	




5	<i>Ophisops elegans</i>	Snake-eyed Lizard; Shimmays eh	Very common	This species does not call for concern since it is very common nationally and locally	
6	<i>Phoenicocerta laevis</i>	Common wall lizard	Common	This species is abundant in Lebanon and locally. It is especially abundant in moist habitats.	
7	<i>Heremites vittatus</i>	Bridled skink (see picture above)	Common	Abundant nationally and locally	



8	<i>Phoenicola certa kulzeri</i>	Mountain rock lizard	Endangered	<p>This species is found in mountainous regions. It has been red-listed by IUCN as “Endangered” because of limited geographic distributions. It is found in Arz Al Shouf protected area. Its microhabitats include rocks and trees. <i>Ph. laevis</i> and <i>kulzeri</i> are mainly separated by altitude where <i>laevis</i> is found below around 1500m altitude while <i>kulzeri</i> is found above this altitude. So, it will be found in the higher reaches in this hima. However, these parts are not easily accessible which will be to the benefit of this species.</p>	
9	<i>Hemidactylus turcicus</i>	House gecko; Abu Brays; Wazgha	Common nationally	<p>Despite being common nationally, it was observed here in one location of concrete walls which is its preferred habitat</p>	

10	<i>Hemorrhois nummifer</i>	Asian racer; Coin-marked snake عقد الجوز	Common	Very common nationally even in urban areas. Often mistaken as the venomous Palestinian viper knowing that this is not venomous. This is the main threat.	
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b. Some other species that might be present in the site based on our knowledge of similar or surrounding areas



		
<i>Chamaeleo chamaeleon</i>	<i>Platyceps collaris</i>	<i>Dolichophis jugularis</i>




### III. Ras El Metn:

This site is a typical Lebanese Mediterranean site with high similarity to other similar sites such as Jabal Moussa Biosphere Reserve and Bentael.




□. The species observed are:





No	Species	Common Name	Status	Notes	Picture
1	<i>Salamandra infraimmaculata</i>	Salamander, سمندل ، عروسة العين	Common	Common especially near the river. Needs clean water holes for breeding	
2	<i>Bufo sitibundus</i>	Green toads (tadpoles and adults)	Common	Breeds in various sorts of aquatic habitats including temporary puddles. The main threat is the lifespan of the temporary pools or puddles that might dry up before tadpoles develop.	

3	<i>Pelophylax bedriagae</i>	Mars h Frog	Comm on	Common especially near permanent aquatic habitats. The main threats are pollution and shrinking aquatic habitats.	
4	<i>Laudakia (Stellagama) stellio</i>	comm on agam a; Hardu n	Very commo n		
5	<i>Phoenicolacerta laevis</i>	Com mon wall lizard	Comm on	Usually near moist habitats. Could be found on walls, rocks, and trees.	



6	<i>Blanus strauchi</i>	Worm lizard	Common	This is a subterranean worm lizard. No data to indicate any threats.		
7	<i>Ophisops elegans</i>	Snake eyed lizard				
8	<i>Heremites vittatus</i>					

9	<i>Ablepharus budaki</i> (?)	Buda ki's skink	Comm on	Some uncertainties need to be clarified about the distinction in geography between <i>K. ruepelli</i> and <i>budaki</i>	
10	<i>Platycephalus collaris</i> :	Collar ed whip snake or collar ed racer; Nash abiye	Comm on nationa lly	This is a slim very fast snake and is common nationally and locally.	

b. Some other species that might be present in the site based on our knowledge of similar or surrounding areas





*Chamaeleo chamaeleon*



*Lacerta media*: Green Lizard



*Pseudopus apodus* (juvenile)



*Pseudopus apodus*



*Hemorrhois nummifer*



*Eirenis coronella*



*Eirenis levantinus*



*Dolichophis jugularis*



		
<i>Macrovipera lebetina</i>	<i>Daboia palaestinae</i>	<i>Malpolon insignitus</i>





#### IV. Hammana Dahr ElBaydar





The habitats in this site vary from oak and pine woodlands to garrigue and riparian habitats. More time has to be spent on this site and especially from January into late spring to cover this variety of habitats. We have a good idea of what to expect in this site but confirmation by direct observation is required. At any rate, no one knows what surprises one might get there. Hammana-Dahr El Baydar

This site varies in altitude between 1200 and 1500 and also has some habitat variation below and above the tree line. We have surveyed the area at the lower elevation and that at the higher elevation. The differences between altitudes are not clear but the following species have been observed:





N o	Species	Com mon Name	Status	Notes	Picture



1	<i>Testudo graeca</i>	Tortoise	Common	Found at all altitudes	
2	<i>Blanus strauchi</i>	Worm lizard	Not enough data	No data to determine whether this species is rare or abundant. It is a subterranean animal and might not be encountered often.	
3	<i>Phoenicolacerta laevis</i>	Lebanon Wall Lizard	Very Common	A very common species in Lebanon and on this site in various habitats	
4	<i>Lacerta media</i>	Green lizard	Common	Juvenile	

5	<i>Lacerta media:</i>	Green lizard	Common	Adult male	
6	<i>Heremites vittatus</i>	Bridled skink	Very common at all altitudes	One of the most common species in Lebanon at all altitudes.	
7	<i>Ophisops elegans</i>	snake-eyed lizard	Very common	Very common in open ground.	
8	<i>Chalcides guentheri</i>	Gunther's cylindrical skink	Common	There is not enough data to assess but apparently, it is found in many areas of Lebanon	




9	<i>Elaphe druzei</i>		Endangered	This species has been recognized as <i>Elaphe sauromates</i> and has been recently assessed and recognized as a new species. This specimen is from Kfar Selwan but a specimen has been observed on this site by Mr. Shadi Saad which is realistic.	
10	Laudakia (Stellagama) stellio	Hardu n	Very common	One of the most common species in Lebanon	
11	<i>Mediodactylus orientalis</i>	Tree gecko	Common	Common nationally and locally	
12	<i>Platyceps collaris</i> :	Collared whip snake or collared		Common nationally and locally	


		race; Nasha biye			

There is no doubt that the flagship species for this Hima is the *Elaphe druzei* which has been yet red-listed by the IUCN but that might appear sometime in the future. But in our assessment, it should be considered endangered globally and nationally.




#### V. Mansouri Beach:

This consists basically of the sandy beach strip bordered by some sand vegetation slightly inland. It might also include some cultivated areas. This site contains reptile species found in Sour and Ras El Ain. It is very small in area and cannot on its support a viable population of any species unless it includes more area in the Mansouri beach northward. What might be of great significance on this beach is the potential breeding site for the sea turtles: Loggerhead (*Caretta caretta*) and green (*Chelonia mydas*) turtles.

N o	Species	Common Name	Status	Notes	Picture
1	<i>Acanthodactylus boskianus</i>	Fringe-toed lizard	Nationall y endange red	Regularly observed in the sandy habitats. The most common and evident reptile in this site is <i>Acanthodactylus boskianus asper</i> which is a recent re-classification of the Lebanese populations previously considered <i>Acanthodactylus schreiberi syriacus</i> . Under the latter	

				species name, this species was redlisted by IUCN. Under the new classification, this species is no longer red-listed on the global scale but we consider it to be endangered on the national scale as its distribution has retreated over several decades from as far north as Beirut to become restricted to the southern coastal strips. But especially in Sour and southwards.	
2	Chalcides ocellatus	Ocellated skink	Not enough data	Found throughout South Lebanon's beaches. Has been observed in the Sour and Ras El Ain Beaches.	



3	<i>Caretta caretta</i>	Loggerhead sea turtle	Endangered	Now has very limited Lebanese beaches where it could breed. One of these is the Mansouri. It starts to attempt coming to lay eggs in May.	
	<i>Caretta caretta</i>	Loggerhead sea turtle		Hatchlings emerge around the middle of August	
4	<i>Cehlonia mydas</i>	Green Turtle		Adult	No picture
	<i>Cehlonia mydas</i>	Green Turtle		Hatchlings emerge during August	

Another species that was observed in that site but inside the cultivated area is *Heremites vittatus* which is common all over Lebanon. *Dolichophis jugularis* could also be found since it is found further north.

Any of the sandy beaches in the south is a potential site for nesting sea turtles, especially in Mansouri. One of the problems of this Hima site in particular is the small area and breadth between the sea and beach inland border. At any rate, if there is any evidence of any sea turtle nest, it should be covered by a metal cage to protect it from disturbance by people or predators but could allow hatchlings to emerge and escape into the sea. Beach lights and night campers deter turtles from nesting.

#### VI. Qleileh

This site consists of a narrow strip of pebble beach which does not include any habitat that could be suitable for any reptiles or amphibians. Another visit during the winter might be necessary to observe whether an ephemeral freshwater habitat might exist there that could host some amphibians.

#### **General remarks:**

This report does not and could not provide an exhaustive list of the reptiles that could exist in the Hima sites. This effort has to be continued by the Himas' teams. I will continue to provide any help for these teams and they could contact me any time in the future for help in identifying any new specimens that might be encountered. I will continue to have an interest in visiting all the sites in my general studies on Lebanese herpetofauna and I will provide updates on any new species that I might encounter in the future.

Protection measures expected for all species whether common or endangered involves all environmentally friendly practices such as avoidance of pesticides, minimal changes to topography and landscape, no further deforestation, maintaining water surfaces and bodies, etc. Reforestation should be applied with great caution as this might affect various reptiles. Increasing aquatic habitats is recommended.

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