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CHECKLIST AND KEY TO THE LIZARDS OF PAKISTAN

MUHAMMAD SHARIF KHAN



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Checklist and Key to the Lizards of Pakistan

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Abstract.- Checklist of the lizards of Pakistan is provided with notes on the distribution of each species in and outside Pakistan. Lizards in Pakistan belong to 8 families, 32 genera and 103 species and subspecies.

Key words: Checklist, key, lizards, Pakistan.

INTRODUCTION

Lizards are the most diversified and widely distributed group of reptiles in Pakistan and are richly represented in various herpetological assemblages (Khan, 1999b). They show different bizarre morphological modifications enabling them to survive in extreme arid hot situations (Khan, 1999a).

Lizards were dealt along with amphibians and snakes by Boulenger in his "Fauna of British India" series (1890). Later, Smith (1935) revised lizard section in an independent volume. After partition of the subcontinent, Minton (1962, 1966) and Mertens (1969, 1970, 1971, 1972, 1974) published results of their collections from throughout Pakistan. Since then several reports have been published on herpetological collections from different parts of Pakistan adding much to our knowledge about the composition of herpetological assemblages in different parts of Pakistan (Khan, 1972, 1980a, 1985, 1986, 1987, 1988, 1989, 1991c, 1992, 1993a,c 1997f, 1999a,b, 2001; Khan and Ahmed, 1987,

Khan and Baig, 1988, 1992; Khan and Z. Khan, 1997; Khan and Tasnim, 1990; W. Khan, 1997 unpublished; Baig, 1988, 1989, 1990, 1998; Baig and Bohme, 1996; Börner, 1974, 1976, 1981).

Some important publications relating to the lizards of the neighbouring countries are included in the references.

CHECKLIST

Lizards are the dominant group of reptiles in Pakistan. They belong to 8 families: Agamidae, Chamaeleonidae, Eublepharidae, Gekkonidae, Lacertidae, Scincidae, Uromastycidae and Varanidae. The number of lizards recorded from Pakistan has steadily arisen from Minton's (1966) 65 species, Mertens (1969) 82, Khan (1980b) 88, to Khan (in press) 103 species and subspecies, which are from 32 genera.

Key to families of lizards in Pakistan

1. Head with small, irregularly arranged scales 2
 Head with large, regularly arranged scales 6
2. Head compressed, with an elevated median casque;
 digits fused in two bundles Chamaeleonidae
 Head depressed, no casque; digits free 3

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3. Head with granular scales; eye pupil vertical with pinholes 4
 Head with flat scales; round pupil 5
4. Eyelid movable..... Eublepharidae
 Eyelid immovable..... Gekkonidae
5. Head rectangular; nostrils very close to the tip of snout.. 6
 Head elongated, nostrils close to eye or midway between eye and snout Varanidae
6. Tail round elongated, with flat keeled scales..... Agmidae
 Tail flat with dorsal transversal rows of long spinose scales Uromastycidae
7. Scale surface rough with a keel; tail much longer than body; digits long..... Lacertidae
 Scales keeled or keelless, smooth; if keeled with multiple low keels; tail as long or a little longer than body; digits short..... Scincidae

Family AGAMIDAE

This family is represented by 6 genera and 22 species in Pakistan.

Key to species of family of Agamidae in Pakistan

1. Body laterally compressed 2
 Body dorsoventrally depressed 3
2. A distinct median dorsal row of pointed elevated scales, extending to tail *Calotes versicolor*
 A median dorsal row of indistinct elevated scale to midbody *Japalura kumaonensis*
3. Tympanum distinct 4
 Tympanum concealed 17
4. Tympanum large, superficial; fifth toe extends beyond second; caudals in distinct annuli 5
5. Middorsum of body with several rows of homogeneous enlarged scales 6
 Middorsum of body with several rows of heterogeneous enlarged scales *Laudakia nuristanica*
6. Scales of dorsal rows smooth 7
 Scales of dorsal rows keeled 8
7. A patch of strongly enlarged scales on flanks; male with a patch of callous abdominal scales *Laudakia badkshana*
 No patch of enlarged scales on flanks; male without callous abdominal scales *Laudakia himalayana*
8. No patch of enlarged scales on flanks; male without callous abdominal scales 9
 Caudal scales large, >30 round the tail base 10
9. Head with smooth scales; 8 rows of median dorsal large scales *Laudakia pakistanica*
- Head with keeled scales; 10 or more rows of median dorsal scales 11
10. Large dorsal scale, larger than ventral; flanks with numerous enlarged scales *Laudakia agrorensis*
 Largest dorsal scales, smaller than ventrals, flanks with few enlarged scales *Laudakia tuberculata*
11. Caudal segments distinct, with two whorls of scales; tail short, thick, not exceeding 1.5 times the body *Laudakia caucasica*
 Tail whorls one or three in a segment, tail long, slender, longer than 1.5 times the body 12
12. Enlarged dorsal in 12 or more rows; tail segment with three annuli; adult with spiny excrescences round ear opening *Laudakia nupta*
 Enlarged dorsals in 10 or fewer rows; tail segments with single whorl; spiny excrescences around ear opening small or absent *Laudakia melanura*
13. Dorsal scales subequal in size, disposed in irregular rows 14
 Larger dorsal scales about twice the size of smaller and are irregular in arrangement 15
14. Tail exceeds body in length; males with callous preanal scales *Trapelus agilis*
 Tail equals or is slightly less than body length; males without callous preanal scales *Brachysaura minor*
15. Enlarged dorsal scales rounded; about 100 scales round the midbody *trapelus rubrigularis*
 Enlarged dorsal scales pointed; fewer than 100 scales round the body 16
16. Largest dorsals about twice the size of smallest; dorsum with reddish or orange ocelli, with dark borders *Trapelus megalonyx*
 Largest dorsal scales more than twice the size of smallest; dorsal ocelli absent or without dark borders *Trapelus ruderata*
17. Dorsal scales markedly unequal in size 18
 Dorsal scales subequal 19
18. Enlarged dorsal scales broad, nail-like, with free posterior borders; sides of head and neck without long spinose scales *Phrynocephalus scutellatus*
 Enlarged dorsal scales without posterior free border; sides of head and neck with long spinose scales *Phrynocephalus luteoguttatus*
19. No spinose scales on head and neck 20
 Spinose scales on head and neck present *Phrynocephalus euphilopus*
20. Nasal scales in contact with with other 21
 Nasal scales not in contact withh each other *Phrynocephalus maculatus*
21. A single elongated suborbital scale *Phrynocephalus clarkorum*
 Two to three suborbital scales *Phrynocephalus ornatus*

Genus *Brachysaura* Blyth, 1856
(Single species represented in Pakistan)

Brachysaura minor (Hardwicke and Gray)

1827. *Agama minor* Hardwicke and Gray, *Zool. J.*,
3: 28.

Type locality
Chittagong, Bangladesh.

Distribution in Pakistan

The short tail ground agama is rare and spotty in distribution in Pakistan. Its definite records are from Sindh and Punjab, District Jhang.

Distribution outside Pakistan

It is wide ranging in the Indo-Gangetic plains. It ranges from Bangladesh through the Central and United Provinces of India.

Genus *Calotes* Cuvier, 1817
(A single species represented in Pakistan)

Calotes versicolor (Daudin)

1802. *Agama versicolor* Daudin, *Hist. nat. Rep.*, 3:
395.

Type locality
India.

Distribution in Pakistan

Widely distributed in Pakistan especially in forested areas in Indus Valley. In deserticole habitat, confined to the oases and vegetation growing along the water courses.

Distribution outside Pakistan

In south-east Asia, it extends from Sumatra to southern China, throughout India, Sri Lanka, and extends into Iran and southern Afghanistan.

Calotes versicolor farooqi Auffenberg and Rehman

1995. *Calotes versicolor farooqi* Auffenberg and
Rehman, *Asiat. herpetol. Res.*, 6: 27.

Type locality
Alpine Punjab, Pakistan

Distribution in Pakistan
Alpine Punjab, Pakistan.

Genus *Japalura* Gray, 1853
(Single species represented in Pakistan)

Japalura kumaonensis (Annandale)

1907. *Acanthosaura kumaonensis* Annandale, *Rec. Indian Mus.*, 1: 152.

Type locality
Naini Tal, western Himalayas, India.

Distribution in Pakistan

In the forests of hilly tracts of north-eastern North-Western Frontier Province (NWFP).

Genus *Laudakia* Gray, 1845
(Thirteen species of *Laudakia* are known from
Pakistan)

Laudakia agrorensis (Stoliczka)

1872. *Stellio agrorensis* Stoliczka, *Proc. Asiatic Soc. Bengal, Calcutta*, July 1872: 128.

Type locality
Sussel Pass, Agrore Valley, Hazara District,
NWFP, Pakistan.

Distribution in Pakistan

Widely distributed in Ooghi Valley, around Manshera and Abbottabad, extending down into the Jhelum Valley, and northward into Chitral.

Distribution outside Pakistan

Widely distributed in the sub Himalayan hills in northern India.

Laudakia badakhshana (Anderson and Leviton)

1969. *Agama badakhshana* Anderson and Leviton,
Proc. Calif. Acad. Sci., 4th Ser. 37: 33.

Type locality

Mazar-i-Sharif, northern Afghanistan.

Distribution in Pakistan

Recorded from Sost and Gulmit, near Khunjrab Pass, in north-western Pakistan.

Distribution outside Pakistan

Northern Afghanistan.

Laudakia caucasia (Eichwald)

1831. *Stellio caucasia* Eichwald, *Zool. Spec.*, 3: 20.

Type locality

Tiflis and Baku, Caucasus.

Distribution in Pakistan

Waziristan and northern Baluchistan, between 1800 and 3000 m.

Distribution outside Pakistan

This agama has been recorded from Caucasus extending eastward to Baluchistan.

Laudakia fusca (Blanford)

1876. *Stellio nupta fusca* Blanford, *East Persia Boundry Commission*, 1870-1872. London, Vol. 2, p. 19.

Type locality

Kalagan and Jalk, Baluchistan, Iran.

Distribution in Pakistan

From Baluchistan and southwestern Sindh, Pakistan, up to an elevation of 1800 m. The author has seen it in the Kalabagh area in north-western Punjab, Pakistan.

Distribution outside Pakistan

The yellow-head agama is widely distributed in southern Iran,

Laudakia himalayana (Steindachner)

1869. *Stellio himalayanus* Steindachner, *Reise Novara, Rep.*, 1867, p. 22.

Type locality

Lei (Leh) and Kargil, Ladakh Province, Kashmir.

Distribution in Pakistan

Recorded from remote areas of northern Pakistan, between 3000 and 3200 m of elevation, from Gilgit and Chitral.

Distribution outside Pakistan

From the western Himalayas to Tajikistan.

Laudakia melanura Blyth

1854. *Laudakia melanura* Blyth, *J. Asiat. Soc. Bengal, Calcutta*, 23: 738.

Type locality

Salt Range, Punjab, Pakistan.

Distribution in Pakistan

Salt Range, Punjab, western hilly tracts of Sindh and Baluchistan.

Distribution outside Pakistan

Moderate elevations in eastern Iranian Baluchistan,

Laudakia nupta (Filippi)

1843. *Agama nupta* Filippi, *J. Ist. Lomb. Bib. Ital.*, 6: 407.

Type locality

Persepolis, Iran.

Distribution in Pakistan

Baluchistan to southwestern Sindh extending on to the Waziristan Hills in NWFP, and the Kalabagh area in north-western Punjab, along the western bank of the Indus.

Distribution outside Pakistan

Its range extends from eastern Iraq, Afghanistan, and Iran.

Laudakia nuristanica Anderson and Leviton

1969. *Agama nuristanica* Anderson and Leviton, *Proc. Calif. Acad. Sci. 4th Ser.*, **37**: 39.

Type locality

Kamdesh, eastern Afghanistan.

Distribution in Pakistan

Recorded from Ziarat and NWFP at 500-600 m of elevation.

Distribution outside Pakistan

Eastern Afghanistan.

Laudakia pakistanica pakistanica (Baig)

1989. *Agama pakistanica* Baig, *Bull. Kitakyushu Mus. nat. Hist.*, **9**: 117-122.

Type locality

Ganglotgah, Gilgit, northern Pakistan.

Distribution in Pakistan

Widely distributed around Gilgit to Manshera, north-eastern Pakistan, along the River Indus.

Laudakia pakistanica auffenbergi Baig and Bohme

1996. *Laudakia pakistanica auffenbergi* Baig and Bohme, *Russian J. Herpet.*, **3**: 1-10.

Type locality

Besham, District Swat, NWFP, Pakistan, elevation 700 mm.

Distribution in Pakistan

Known from its type locality.

Laudakia pakistanica khani Baig and Bohme

1996 *Laudakia pakistanica khani* Baig and Böhme, *Ibid.*, **3**: 1-10.

Type locality

Hadar, Chilas, NWFP, Pakistan.

Distribution in Pakistan

Known from its type locality.

Laudakia tuberculata (Hardwicke and Gray)

1827. *Agama tuberculata* Gray, *Zool. J.*, **3**: 218.

Type locality

Bengal.

Distribution in Pakistan

Reported from northern Pakistan at elevations of 1500-2500 m.

Distribution outside Pakistan

Eastern Afghanistan, and Kashmir up to Nepal.

Genus ***Phrynocephalus*** Kaup, 1825
(Six species represented in Pakistan)

Phrynocephalus clarkorum Anderson and Leviton

1967. *Phrynocephalus clarkorum* Anderson and Leviton, *Proc. Calif. Acad. Sci. 4th series*, **35**: 228.

Type locality

20 miles south of Kandahar, Afghanistan.

Distribution in Pakistan

Western Baluchistan.

Distribution outside Pakistan

Southern Afghanistan.

Phrynocephalus euphilopus Alcock and Finn

1896. *Phrynocephalus euphilopus* Alcock and Finn, *J. Asiat. Soc. Bengal, Calcutta*, **65**: 556.

Type locality

Darband, 900 m northern Baluchistan.

Distribution in Pakistan

Darband, Baluchistan, at an elevation of 900 m.

Phrynocephalus luteoguttatus Boulenger

1887. *Phrynocephalus luteoguttatus* Boulenger, *Cat. Liz. Br. Mus.*, **3**: 497.

Type locality

Between Nushki and Helmand, and along the Afghanistan-Pakistan border.

Distribution in Pakistan

Known from western Baluchistan around Nushki, southward to Las Bela.

Distribution outside Pakistan

Southern Afghanistan and western Iran.

***Phrynocephalus maculatus* Anderson**

1872. *Phrynocephalus maculatus* Anderson, *Proc. zool. Soc. Lond.*, 1872: 389.

Type locality

Awada, Shiraz, Iran.

Distribution in Pakistan

Western Baluchistan, Pakistan.

Distribution outside Pakistan

Arabia, Iraq, Afghanistan and Iran.

***Phrynocephalus ornatus* Boulenger**

1887. *Phrynocephalus ornatus* Boulenger, *Cat. Liz. Br. Mus.*, 3: 496.

Type locality

Between Nushki and Helmand, at the Baluchistan and Afghanistan border.

Distribution in Pakistan

The striped agama known from the Chagai Desert, extends to Las Bela.

Distribution outside Pakistan

North-western Afghanistan to south-eastern Iran.

***Phrynocephalus scutellatus* Olivier**

1807. *Phrynocephalus scutellatus* Olivier, *Voy. Emp. Othom.*, 3: 110.

Type locality

Ispahan, Iran.

Distribution in Pakistan

Baluchistan desert.

Distribution outside Pakistan

Desert basins of Iran and Afghanistan.

Genus *Trapelus* Cuvier, 1816

(Five species represented in Pakistan)

***Trapelus agilis* (Boulenger)**

1885. *Agama isolepis* Boulenger, *Cat. Liz. Br. Mus.*, 1: 342.

Type locality

Kutch, Quetta Division, Baluchistan, Pakistan.

Distribution in Pakistan

Occurs below 1800 m in the plains of Punjab and Sindh, from Baluchistan and southern NWFP are confined to plain areas, avoids hilly tracts.

Distribution outside Pakistan

The field agama extends from western Iran through Afghanistan and Central Asia (to southern Kazakhstan) and Rajasthan.

***Trapelus agilis pakistanensis* Rastegar-Pouyani**

1999. *Trapelus agilis pakistanensis* Rastegar-Pouyani, *Asiatic herpet. Res.*, 8: 90-101.

Type locality

Kirthar Range, south-eastern Baluchistan, Pakistan.

Distribution in Pakistan

Known from type locality.

***Trapelus megalonyx* Günther**

1864. *Trapelus megalonyx* Günther, *Rep. Br. India*, 159.

Type locality
Afghanistan.

Distribution in Pakistan
Baluchistan, Sindh and Cholistan Desert in Punjab, Pakistan, collected up to an elevation of 1800 m.

Distribution outside Pakistan
Extends from to southern Afghanistan to Iran.

***Trapelus rubrigularis* Blanford**

1876. *Trapelus rubrigularis* Blanford, *Proc. Asiatic Soc. Bengal, Calcutta*, 1875: 233.

Type locality
Kirthar Range, western Sindh, Pakistan.

Distribution in Pakistan
Recorded from lower Sindh and coastal Baluchistan.

***Trapelus ruderata* (Smith)**

1935. *Agama ruderata baluchiana* Smith, *Faun. Brit. Ind.*, 2: 223.

Type locality
Quetta District, Baluchistan, Pakistan.

Distribution in Pakistan
Recorded from Quetta and Sibi Districts in Baluchistan.

Family CHAMAELEONIDAE

(Represented by a single genus and a species in Pakistan)

Genus ***Chamaeleo***

***Chamaeleo zeylanicus* Laurenti**

1768. *Chamaeleo zeylanicus* Laurenti, 1768:46.

Type locality
By inference, Sri Lanka.

Distribution in Pakistan

Extends into south-eastern Sindh in Pakistan, where it is rare and local. Daniel's (1983) statement about extension of this species up to Peshawar is highly exaggerated.

Distribution outside Pakistan

Found in the wooded parts of peninsular India and Sri Lanka.

Family EUBLEPHARIDAE

(This family is represented by a single species of genus *Eublepharus* in Pakistan)

Genus ***Eublepharis*** Gray, 1827

***Eublepharis macularius* (Blyth)**

1854. *Cyrtodactylus macularius* Blyth, *J. Asiatic Soc. Bengal, Calcutta*, 23: 737-738.

Type locality
Salt Range, Punjab, Pakistan.

Distribution in Pakistan

In Pakistan it has been recorded from Azad Kashmir, NWFP, northern Punjab, Baluchistan and lower Sindh.

Distribution outside Pakistan

The range of this gecko extends from Rajputana and Khandesh District of India.

Family GEKKONIDAE

(Geckos are represented by 11 genera in Pakistan)

Key to the species of Family Gekkonidae in Pakistan

1. Digits dilated..... 2
 Digits not dilated..... 10
2. Dilated part of the digit confined to the terminal phalanx *Ptyodactylus homolepis*
 Dilated part of the digit extends along the whole digit 3 sub digital lamellae divided..... *Teratolepis fasciata*
3. Tail swollen, covered with large flat imbricate scales; sub digital lamellae undivided..... *Teratolepis fasciata*
 Sub digital lamellae divided..... 4

4. Dorsum with keeled enlarged tubercles, arranged in regular rows 5
Dorsum with hemispherical keelless tubercles irregularly arranged or absent 8
5. Dorsal pattern of clearly defined broad dark saddles
..... *Hemidactylus triedrus*
Dorsal pattern of spots, or uniformly colored 6
6. Six to 10 lamellae under 4th toe, males with preanal and femoral pores *Hemidactylus brooki*
Nine to 15 lamellae under 4th toe; males with preanal pores only 7
7. Eleven of 15 lamellae under 4th toe; 6 to 9 preanal pores ..
..... *Hemidactylus persicus*
Nine to 12 lamellae under 4th toe; 4 to 6 preanal pores
..... *Hemidactylus turcicus*
8. Inner toe less than half the length of second toe; a continuous series of 23 to 33 preano-femoral pores
..... *Hemidactylus frenatus*
Inner toe more than half the length of second; preanal and femoral pores separated by at least six scales 9
9. Dorsum with tubercles; 20 or more femoral pores; 12 or fewer lamellae under 4th toe *Hemadctylus leschenaultii*
No dorsal tubercles; femoral pores 15 or few; 12 to 15 lamellae under 4th toe *Hemidactylus flaviviridis*
10. Digits straight 11
Digits angularly bent 16
11. Toes fringed on sides with pointed flexible long scales
..... 12
Toes not fringed so *Bunopus tuberculatus*
12. Several series of large, thin scales on tail dorsum; habitus robust 13
Tail dorsum with small scales; habitus slender 14
13. Body with large cycloid scales, 30 to 35 round the midbody *Teratoscincus scincus*
Body scales small, 100 or more round midbody
..... *Teratoscincus, microlepis*
14. Unregenerated tail shorter than body; in male fewer than five preanal pores *Crossobamon orientalis*
Tail longer than body; preanal pores six or more 15
15. Dorsum with numerous tubercles; dorsal pattern of transverse bands *Crossobamon lumsdenii*
Few or no dorsal tubercles; dorsal pattern of longitudinal stripes *Crossobamon maynardi*
16. Body and tail depressed; tail longer than body 19
Body and tail cylindrical, equal or subequal in length. 17
17. Three nasal scales; dorsal pattern of transverse bands which are much narrower than interspace, tending to break in spots on sides *Cyrtodactylus mintoni*
Two nasal scales; dorsal pattern of transverse bands, band as broad or broader than interspaces 18
18. Dorsal bands broader than interspaces; mid-ventrals 85 to 205 *Cyrtodactylus battalensis*
19. Tail with even taper; limbs small, heel not reaching axilla 22
Tail tapering abruptly; limbs long and slender; heels reaching axilla or beyond 20
20. Nasal scales strongly projecting vertically carrying naris at higher level; *Rhinogecko misonnei*
Nasal scales not as above 21
21. A row of enlarged scales under the thigh; tail longer than snout-vent length *Agamura femoralis*
No enlarged scales under thighs; tail shorter than snout-vent length *Agamura persicus*
22. Body non tuberculated 23
Body tuberculated 25
23. Internasals not differentiated from surrounding scales; four scales border naris *Tropiocolotes depressus*
Internasals well differentiated, followed by a second pair of large scales; 5 scales border naris
..... *Tropiocolotes persicus*
24. Trihedral tubercles on body and tail; body moderately depressed 25
Trihedral tubercles on tail only; body much depressed . 30
25. Interspaces tubercles on body and tail; body moderately depressed 26
Interspaces as large or larger than size of the tubercles. 27
26. Interorbital scales more than 14; dorsal tubercles often in contact with each other; mid-ventrals more than 120; snout-vent length less than 48 mm
..... *Tenuidactylus montiumsalsorum*
Interorbital scales less than 14; dorsal tubercles always separated by 1 to 3 granular imbricate scales; midventral scales less than 120; snout-vent length more than 50 mm.
..... *Tenuidactylus kohsulaimanai*
27. Two whorls or subcaudals to a caudal segment 28
Three whorls of subcaudals to a caudal segment
..... *Cyrtopodion agamuroides*
28. Subcaudals small, as broad as long, in two rows
..... *Cyrtopodion kachhense*
Subcaudals broader than long, in a single row 29
29. Scales across mid-abdomen less than 25
..... *Cyrtopodion scabrum*
Scales across mid-abdomen more than 25
..... *Cyrtopodion watsoni*
30. Caudal tubercles trihedral, arising from last annulus of caudal segment 33
Caudal tubercles non-trihedral, arising from center of caudal segment 33
31. Only preanal pore present in male 32
Preanal and femoral pores in a series
..... *Tenuidactylus rohtasfortai*

32. Flat dorsal tubercles keeled *Tenuidactylus indusoani*
 Dorsal tubercles feebly keeled to Keelless
 *Tenuidactylus fortunroi*
33. Dorsal tubercles round with raised center
 *Tenuidactylus walli*
 Dorsal tubercles falt, with r without a Keel
 *Cyrtodactylus baturensis*

Genus **Agamura** Blanford, 1874
 (Two species in Pakistan)

Agamura femoralis Smith

1933. *Agamura femoralis* Smith, *Rec. Indian Mus.*,
 35: 17.

Type locality
 Kharan, Baluchistan.

Distribution
 It has been reported from Kharan and Chagai
 Deserts, close to the rocky outcrops.

Agamura persica (Dumeril)

1856. *Gymnodactylus persicus* Dumeril, *Arohs Mus.*
Hist. nat. Paris, 8: 481.

Type locality
 Persia.

Distribution in Pakistan
 From Karachi northward to the Waziristan
 Hills, between 25 and 100 m of elevation.

Distribution outside Pakistan
 The blunt-tailed spider gecko is reported from
 Iran.

Genus **Bunopus** Blanford, 1874
 (A single species represented in Pakistan)

Bunopus tuberculatus Blanford

1874. *Bunopus tuberculatus* Blanford, *Ann. Mag.*
nat. Hist., 13: 454.

Type locality
 Persian Baluchistan.

Distribution in Pakistan
 Common in Baluchistan, to southern Sindh,
 Las Bela, and around Hyderabad, below 2000 m.

Distribution outside Pakistans
 It ranges from Syria, Iraq, eastern Arabia,
 southern Iran, southern Afghanistan. .

Genus **Crossobamon** Boettger, 1888
 (Three species represented in Pakistan)

Crossobamon lumsdenii (Boulenger)

1887. *Stenodactylus lumsdenii* Boulenger, *Cat. Liz.*
Br. Mus., 3: 479.

Type locality
 Between Nushki and Helmand, northern
 Baluchistan, Pakistan.

Distribution in Pakistan
 Recorded in Pakistan between Nushki and
 Helmand in northern Baluchistan.

Crossobamon maynardi (Smith)

1933. *Stenodactylus maynardi* Smith, *Rec. Indian*
Mus., 35: 18.

Type locality
 Baluchistan, near the Afghanistan border.

Distribution in Pakistan
 The striped sand gecko has been collected from
 north-western Baluchistan.

Crossobamon orientalis (Blanford)

1876. *Stenodactylus orientalis* Blanford, *J. Asiatic*
Soc. Bengal, Calcutta, 45: 21.

Type locality
 Rohri and Shikarpur Districts, upper Sindh,
 Pakistan.

Distribution in Pakistan

Widely distributed throughout the Thar, Cholistan, and Thal Deserts; also recorded from Sindh Delta and Las Bela, southern Baluchistan.

Distribution outside Pakistan

South-eastern Iran and Afghanistan.

Genus *Cyrtodactylus* Gray, 1827
(There are seven species in Pakistan)

Cyrtodactylus battalensis Khan

1993. *Cyrtodactylus battalensis* Khan, *Pakistan J. Zool.*, **25**: 67-73.

Type locality

Batgram, Manshera, NWFP, Pakistan.

Distribution in Pakistan

Known only from its type locality, Batgram, District Manshera, NWFP, Pakistan.

Cyrtodactylus baturensis Khan and Baig

1993. *Tenuidactylus baturensis* Khan and Baig, *Pakistan J. Zool.*, **24**: 273-277.

Type locality

Passu and Khyber, Gilgit Agency, northern Pakistan.

Distribution in Pakistan

Known from its type locality in Gilgit Agency, northeastern Pakistan.

Cyrtodactylus dattanensis (Khan)

1980. *Gymnodactylus dattanensis* Khan, *Pakistan J. Zool.*, **12**: 11-16.

Type locality

Datta, Manshera, NWFP, Pakistan.

Distribution in Pakistan

Widely distributed in alpine Punjab and eastern North-western Frontier Province, Pakistan.

Cyrtodactylus mintoni (Golubev and Szczerbak)

1981. *Gymnodactylus mintoni* Golubev and Szczerbak, *Faun. Syst.*, **1981**: 40-50.

Type locality

Udigram, Swat, NWFP, Pakistan.

Distribution in Pakistan

This gecko is known by its type specimen, which was collected from Udigram, Swat, NWFP, Pakistan.

Genus *Cyrtopodion* Fitzinger, 1843
(Seven species known from Pakistan)

Cyrtopodion agamuroides (Nikolsky)

1900. *Gymnodactylus agamuroides* Nikolsky, *Ann. Mus. Zool. St. Petersburg*, **4**: 384.

Type locality

Pensarch (Penzhsara), eastern Kirman, Iran.

Distribution in Pakistan

Makran coast and Las Bela.

Distribution outside Pakistan

From Kirman, Sistan, and Baluchistan Province of Iran.

Cyrtopodion kachhense kachhense (Stoliczka)

1872. *Gymnodactylus kachhense* Stoliczka, *Proc. Asiatic Soc. Bengal, Calcutta*, **1**: 79.

Type locality

Kutch, southwestern Sindh, Pakistan.

Distribution in Pakistan

The spotted ground gecko has been collected from most of Kutch, coastal Sindh, and Las Bela, Pakistan.

Cyrtopodion kachhense ingoldbyi Khan

1923. *Gymnodactylus ingoldbyi* Proctor, *J. Bombay nat. Hist. Soc.*, **29**: 121.

1997. *Cyrtopodion kachhense ingoldbyi* Khan, *Russian J. Herpet.*, **4**: 83-88.

Type locality

Ladha, Dera Ismael Khan, southern NWFP, Pakistan.

Distribution in Pakistan

Widely distributed in the hills along Khar-Rakhni-Quetta road, about 10 km west of Fort Munro.

Cyrtopodion kohsulaimanai (Khan)

1991. *Tenuidactylus kohsulaimanai* Khan, *J. Herpet.*, **25**: 199-204.

Type locality

Sakhisarwar village, Dera Ghazi Khan District, north-western Punjab, Pakistan.

Distribution in Pakistan

This gecko is known from two localities, Sakhisarwar and Rakhni Gorge, along Dera Ghazi Khan-Fort Munro road, in District Dera Ghazi Khan, northwestern Punjab, Pakistan.

Cyrtopodion montiumsalsorum (Annandale)

1913. *Gymnodactylus montiumsalsorum* Annandale, *Rec. Indian Mus.*, **9**: 309-326.

Type locality

Salt Range, Punjab, Pakistan.

Distribution in Pakistan

Salt Range, Punjab, Pakistan.

Cyrtopodion potoharensis Khan

2001. *Cyrtopodion potoharensis* Khan, *Pakistan J. Zool.*, **33**: 15-16.

Type locality

Lawrencepur, District Rawalpindi, northern Punjab, Pakistan.

Distribution in Pakistan

The Potwar gecko was collected from different localities in central Potwar Plateau, Salt Range, Punjab.

Cyrtopodion scabrum (Heyden)

1827. *Stenodactylus scaber* Heyden, in: Ruppell, *Atlas N. Afr. Rep.*: 15.

Type locality

Arabia.

Distribution in Pakistan

In Pakistan, it has been reported from the upper and lower Indus Valleys, and along the eastern edge of the Thar Desert. It is widely distributed in Baluchistan and Waziristan.

Distribution outside Pakistan

This gecko is wide-ranging, from northern Africa, Arabia, Egypt to Sindh, Pakistan.

Cyrtopodion watsoni (Murray)

1892. *Gymnodactylus watsoni* Murray, *Zool. Belooch*, 68.

Type locality

Quetta, Baluchistan, Pakistan.

Distribution in Pakistan

Reported from Salt Range, Punjab; Manshera, NWFP; and Quetta, Baluchistan, Pakistan.

Genus *Hemidactylus* Oken, 1817
(Seven species known from Pakistan)

Hemidactylus brookii Gray

1845. *Hemidactylus brookii* Gray, *Cat. Liz. Br. Mus.*, 153.

Type locality

Borneo, south-east Asia.

Distribution in Pakistan

Common gecko in the plains, avoiding higher northern mountains, and extends into the peripheral humid areas around deserts and oases.

Distribution outside Pakistan

Wide range in South-east Asia, from Borneo, China, through tropical and subtropical Asia, extending through India, Pakistan and the Middle East to northern Africa. There are reports of it from the West Indies.

Hemidactylus flaviviridis Ruppell

1835. *Hemidactylus flaviviridis* Ruppell, *Neue Wirb. Faun. Abyss.*: 18.

Type locality

Massaua Islands, Eritrea.

Distribution in Pakistan

Reported from throughout the plains below 1000 m, always in association with man.

Distribution outside Pakistan

Wide ranging in the Palaearctic Region, from the Red Sea to the coasts of Arabia and Iran, Pakistan, and India to Bangladesh. Human agency has played an important role in its wide distribution.

Hemidactylus frenatus Schlegel

1836. *Hemidactylus frenatus* Schlegel, In: *Dumeril and Bibron., Erpet. Gen.*, 3:366.

Type locality:

Java, South-east Asia.

Distribution in Pakistan

Frequent along sea coast, has been collected from the lower Indus Delta.

Distribution outside Pakistan

Pantropic species, coastal in distribution throughout subcontinent.

Hemidactylus leschenaultii Dumeril and Bibron

1836. *Hemidactylus leschenaultii* Dumeril and Bibron, *Erpet. Gen.*, 3: 364.

Type locality

Sri Lanka.

Distribution in Pakistan

Where it is recorded from various localities in the lower Indus Delta and Las Bela in southern Baluchistan.

Distribution outside Pakistan

Extends from Assam, Bangladesh, eastern and southern India, along the western coast, reaching the lower Sindh in Pakistan.

Hemidactylus persicus Anderson

1872. *Hemidactylus persicus* Anderson, *Proc. zool. Soc. Lond.*, 378.

Type locality

Shiraz, Persia.

Distribution in Pakistan

Reported from the southern Potwar Plateau, in central Punjab, Pakistan. Common in lower Indus Valley and Baluchistan coastal strip, extending up to Waziristan.

Distribution outside Pakistan

From eastern Arabia, through southern Iran to Rajasthan coast.

Hemidactylus triedrus (Daudin)

1802. *Gecko triedrus* Daudin, *Hist. nat. Rep.*: 155.

Type locality

Unknown.

Distribution in Pakistan

Karachi and localities in lower Indus Delta.

Distribution outside Pakistan

From Sri Lanka and peninsular India.

Hemidactylus turcicus (Linnaeus)

1758. *Lacerta turcica* Linnaeus, *Syst. Nat. Ed. 1*: 202.

Type locality

Asiatic Turkey.

Distribution in Pakistan

Along the seacoast Karachi.

Distribution outside Pakistan

From Morocco to Egypt To Somalia, Kenya,
Coastal Mediterranean and Red Sea.

Genus *Ptyodactylus* Goldfuss, 1820
(Single species in Pakistan)

Ptyodactylus homolepis Blanford

1876. *Ptyodactylus homolepis* Blanford, *J. Asiatic Soc. Bengal, Calcutta*, **45**: 19.

Type locality

Mahar Division, Shikarpur District,
northwestern Sindh, Pakistan.

Distribution in Pakistan

There is no subsequent report of this gecko from Pakistan. It is yet known only from its type locality.

Genus *Rhinogecko* de Witte, 1973
(Single genus and species in Pakistan)

Rhinogecko misonnei de Witte

1973 *Rhinogecko misonnei* de Witte, *Bull. Inst. R. Sci. nat. Belg.*, **49**:1.

Type locality

Dast-i-Lut Desert, Iran.

Distribution in Pakistan

Known from Dasht-i-Lut along the Iran-Pakistan border.

Distribution outside Pakistan

Western Iran.

Genus *Tenuidactylus* Szczerbak and Golubev, 1884

Tenuidactylus fortmunroi Khan

1993. *Tenuidactylus fortmunroi* Khan, *Pakistan J. Zool.*, **25**: 217-221.

Type locality

Khar Gardens, Fort Munro, District Dera Ghazi Khan, western Punjab, Pakistan.

Distribution in Pakistan

Known from Fort Munro and Khar village, in the northwestern Dera Ghazi Khan District, Punjab.

Tenuidactylus indusoani (Khan)

1988. *Cyrtodactylus indusoani* Khan, *J. Herpet.*, **22**: 241-243.

Type locality

Pirpeahai, Iskinderabad, District Mianwali, north-western Punjab, Pakistan.

Distribution in Pakistan

Known from the north-western border of the Salt Range, Punjab, Pakistan.

Tenuidactylus rhodocaudus Baig

1998. *Tenuidactylus rhodocaudus* Baig, *Hamadryad*, **23**: 127-132.

Type locality

Tanishpa, District Kila Saifullah, Baluchistan.

Distribution in Pakistan

The gecko is known from its type locality.

Tenuidactylus rohtasfortai Khan and Tasnim

1990, *Tenuidactylus rohtasfortai* Khan and Tasnim, *Herpetologica*, **46**: 142-148.

Type locality

Goi Madan, Kotli, Azad Kashmir.

Distribution in Pakistan

Tenuidactylus rohtasfortai is a widely distributed species in alpine Punjab and south-eastern Azad Kashmir. It extends into the hilly terrain of the Potwar Plateau, especially from Jhelum to Islamabad.

Tenuidactylus walli (Ingoldby)

1922. *Gymnodactylus walli* Ingoldby, *J. Bombay nat. Hist. Soc.*, **28**: 1051.

Type locality

Drosh Fort, Chitral, NWFP, Pakistan.

Distribution in Pakistan

The gecko has been collected from Drosh Fort, Karakal village in Bumhoet Valley, and Ghariet village, Chitral, all in NWFP.

Genus *Teratolepis* Günther, 1870
(Single species occurs in Pakistan)

Teratolepis fasciata (Blyth)

1853. *Homonotad fasciata* Blyth, in: Jerdon, *J. Asiatic Soc. Bengal, Calcutta*, **22**: 468.

Type locality

Jaulna, Hyderabad southern India.

Distribution in Pakistan

The gecko is recorded from different localities in the lower Indus Delta in Pakistan.

Genus *Teratoscincus* Strauch, 1863
(Two species occur in Pakistan)

Teratoscincus microlepis Nikolsky

1899. *Teratoscincus microlepis* Nikolsky, *Ann. Mus. Zool. Acad. Sci. St. Petersburg*, **4**: 145.

Type locality

Duz Abad, Eastern Kirman, Iran.

Distribution in Pakistan

The gecko has been collected from Nushki and Kharan in Baluchistan;

Distribution outside Pakistan

Collected westward to Dasht-i-Lut, near Kirman, Iran.

Teratoscincus scincus (Schlegel)

1858. *Stenodactylus scincus* Schlegel, *Handl. Beoefening Dierkunde*, **2**: 16.

Type locality

Ili River, eastern Turkestan.

Distribution in Pakistan

Western Baluchistan.

Distribution outside Pakistan

This gecko has a wide range in the west from the Caspian Sea to Tadjikistan.

Genus *Tropicolotes* Peters, 1880
(Szczerebak and Golubev (1996) for this genus)

Tropicolotes depressus Minton and Anderson

1965. *Tropicolotes depressus* Minton and Anderson, *Herpetologica*, **21**: 59.

Type locality

Kach, Quetta Division, Baluchistan, Pakistan.

Distribution in Pakistan

The gecko is recorded from hilly tracts north of Quetta, Baluchistan.

Tropicolotes persicus (Nikolsky)

1903. *Alsophylax persicus* Nikolsky, *Ann. zool. Mus. Imp. Acad. Sci. St. Petersburg*, **8**: 95.

Type locality

Vikus Dehak, Iranian Baluchistan.

Distribution in Pakistan

South-eastern Sindh.

Distribution outside Pakistan

South-western Iran.

Tropicolotes persicus euphorbiacola Minton

1970. *Microgecko helenae* Nikolsky, *Ann. Mus. Zool. Acad. Sci. St. Petersburg*, **10**: 265.

1970. *Tropicolotes persicus euphorbiacola*,
Minton, S. Anderson, and J. A. Anderson,
Proc. Calif. Acad. Sci. ser. 4, 37:354.

Type locality
Las Bela, Pakistan.

Distribution in Pakistan

This gecko has been reported from Las Bela,
Baluchistan and lower Sindh, Pakistan.

Family LACERTIDAE

(Four genera and 12 species are reported from
Pakistan)

Key to species of Family Lacertidae in Pakistan

1. Naris in contact with first supralabial 2
Naris not in contact with first supralabial 4
2. Dorsals scarcely larger than laterals; usually seven light
stripes on body; tail tip yellow.....
.....*Acanthodactylus micropholis*
Dorsals much larger than laterals; usually six stripes on
dorsum; tail tip blue, gray or pink..... 3
3. Median dorsals and laterals are of almost equal size; mid-
dorsals 40 to 46 across mid-body; gulars 18 to 20.....
.....*Acanthodactylus blanfordii*
Median dorsals distinctly larger than laterals, 26 to 36;
gulars 26 to 36.....*Acanthodactylus cantoris*
4. Eyelids immovable, forming spectacle; dorsals pointed,
imbricate and keeled; no collar..... 5
Eyelids movable, lower with transparent disc; dorsals
granulars subimbricate or juxtaposed; collar present..... 6
5. Head with rugose scales; 25 to 35 scales round midbody
.....*Ophisops jerdonii*
Head scales smooth; 31 to 38 scales round the midbody...
.....*Ophisops elegans*
6. Ventrals in straight longitudinal rows, an occipital scale
present 7
Ventrals in oblique longitudinal rows; occipital scale
absent..... 8
7. Occipital scale in contact with interparietals; transparent
scale in lower eyelid, edged with black
.....*Mesaina watsonana*
Occipital scale not in contact with interparietals;
transparent scale in lower eyelid not edged with black
.....*Mesalina brevirostris*
8. A distinct fringe of pointed scales on the fourth toe 9
No fringe on the fourth toe 11
9. The fringe is only on the outer side of fourth toe.....

.....*Eremias scripta*

The fringe on the both sides of fourth toe 10

10. Femoral pores present*Eremias acutirostris*

Femoral pores absent.....*Eremias aporosceles*

11. Dorsals 55 or more at midbody*Eremias velox*

Dorsals 50 or fewer at midbody*Eremias fasciata*

Genus *Acanthodactylus* Wiegmann, 1834
(Three species reported from Pakistan)

Acanthodactylus blanfordii Bolenger

1918. *Acanthodactylus cantoris* var. *blanfordi*, *Bull.*
Soc. zool. Fr., 43:154.

Type locality

Bam, Persia; Mand, Baluchistan, Pakistan.

Distribution in Pakistan

Recorded from the western Baluchistan and
along the Makran coast.

Distribution outside Pakistan

Extending into southern Afghanistan.

Acanthodactylus cantoris Günther

1864. *Acanthodactylus cantoris* Günther, *Rep. Br.*
India.: 73.

Type locality:

Ramnagar, India

Acanthodactylus micropholis Blanford

1874. *Acanthodactylus micropholis* Blanford, *Ann.*
Mag. nat. Hist., 13: 33.

Type locality

Magas, Baluchistan.

Distribution in Pakistan

Along coastal Makran, Las Bela; northward it
extends to central Baluchistan.

Distribution outside Pakistan

South-eastern Iran.

Genus *Eremias* Wiegmann, 1834
(Five species of eremiad lizards reported from
Pakistan)

Eremias acutirostris (Boulenger)

1887. *Scapteira acutirostris* Boulenger, *Cat. Liz. Br. Mus.*, **3**: 114.

Type locality

Between Nushki and Helmand, Baluchistan, Pakistan.

Distribution in Pakistan

Ranges from desert basins of northwestern Baluchistan, Pakistan.

Distribution outside Pakistan

Eastern Iran and southern Afghanistan.

Eremias aporosceles (Alcock and Finn)

1896. *Scapteira aporosceles* Alcock and Finn, *J. Asiatic Soc. Bengal, Calcutta*, **65**: 559.

Type locality

Near Nushki, northern Baluchistan, Pakistan.

Distribution

It has been recorded from around Koh Malik-do-Khand, at the Afghanistan-Pakistan border.

Eremias fasciata Blanford

1874. *Eremias fasciata* Blanford, *Ann. Mag. nat. Hist.*, **14**: 32.

Type locality

Saidabad, southwest of Kirman, Iran (restricted by Smith 1935).

Distribution in Pakistan

Baluchistan upto Waziristan and Dera Ismael Khan.

Distribution outside Pakistan

Ranges from Iran to Afghanistan.

Eremias scripta (Strauch)

1867. *Podarcis scripta* Strauch, *Mel. biol. Bull. Acad. St. Petersburg*, **4**: 424.

Type locality

Aralo-Caspian desert.

Distribution in Pakistan

Northern Baluchistan to east of Nushki.

Distribution outside Pakistan

From Transcaspia to eastern Khazakistan, Iran, Afghanistan and northern Baluchistan.

Eremias persica (Blanford)

1874. *Eremias persica* Blanford, *Ann. Mag. nat. Hist.*, **13**: 31.

Type locality

Ispahan, Iran.

Distribution in Pakistan

Northern Waziristan, Quetta and Nushki, from elevation upto 1000 m.

Distribution outside Pakistan

Northern Iran.

Genus *Mesalina* Gray, 1838

(Two species recorded from Pakistan)

Mesalina brevirostris (Blanford)

1874. *Mesalina brevirostris* Blanford, *Ann. Mag. nat. Hist.*, **13**: 32.

Type locality

Kalabagh, northwestern Punjab, Pakistan., and Tumb-Insel, Persian Gulf, Iran.

Distribution in Pakistan

From District Mianwali, in north-western Punjab, to coastal Las Bela.

Distribution outside Pakistan

It has extensive distribution in the west to Syria.

Mesalina watsonana (Stoliczka)

1872. *Eremias watsonana* Stoliczka, *Proc. Asiatic Soc. Bengal, Calcutta*, 1872: 86.

Type locality

Sindh, between Karachi and Sukkhor, Pakistan.

Distribution in Pakistan

Occurs throughout the plains, excluding the deserts. It extends from sea level to 2000 m of elevation.

Distribution outside Pakistan

From Rajputana to southern Afghanistan, and Iran.

Genus **Ophisops** Ménétriés, 1832
(Two species reported from Pakistan)

Ophisops elegans Ménétriés

1832. *Ophisops elegans* Ménétriés, *Cat. Rais. Obj. Zool. Caucas.* : 63.

Type locality

Near Baku, Caspian Sea.

Distribution in Pakistan

Mianwali District and Waziristan hilly tracts.

Distribution outside Pakistan

Widely distributed in the west, extending to the Caspian region and west to Turkey and the Levant.

Ophisops jerdonii Blyth

1853. *Ophisops jerdonii* Blyth, *J. Asiatic Soc. Bengal*, 22: 653.

Type locality

Alpine Punjab, Pakistan.

Distribution in Pakistan

Widely distributed in plains and semihilly regions in the Punjab and Sindh plains, from alpine Punjab, Salt Range, Waziristan, Quetta, and Khuzdar in Baluchistan.

Distribution outside Pakistan

India.

Family SCINCIDAE

(Seven genera and 17 species of family Scincidae occur in Pakistan)

Key to species of family Scincidae in Pakistan

1. Body serpentine; limbs short and vestigial..... 2
Body not markedly serpentine; limbs well developed..... 5
2. Fingers four; toes three..... 3
Both fingers and toes three..... 4
3. Scales rows at midbody 20..... *Ophiomorus blanfordi*
Scales row at midbody 22 *Ophiomorus brevipes*
4. Parietals in contact with anterior temporal
..... *Ophiomorus tridactylus*
Parietal and anterior temporal separated by posterior temporal *Ophiomorus raithmai*
5. Eyelids fused to form spectacles 6
Eyelids movable 7
6. Ear hidden beneath scales..... *Ablepharus grayanus*
Ear opening small but distinct *Ophiomorus pannonicus*
7. Supranasal scale present..... 8
Supranasal scale absent 9
8. Scales of middorsal rows much wider than laterals..... 10
Dorsals of equal size throughout 12
9. Scales at midbody 24-30 *Scincella himalayana*
Scales at midbody 32-36 *Scincella ladacensis*
10. A single row of broad dorsals..... *Eumeces taeniolatus*
Double row of broad dorsals 11
11. Middorsals 26-30; dorsum uniform brown or with more or less distinct three dark stripes..... *Eumeces schneiderii*
Middorsals 52-56; 5-7 dark brown dorsal stripes
..... *Eumeces indothalensis*
12. Naris piercing nasals 13
Naris between nasals and rostral *Chalcides ocellatus*
13. Limbs well developed, pentadactyle 14
Limbs short and vestigial *Lygosoma punctata*
14. Dorsals with three keels *Mabua dissimilis*
Dorsals with 3-7 keels *Mabuya macularia*

Genus **Ablepharus** Fitzinger, 1823
(Fühn 1969; Eremchenko and Szczerbak 1986).

(Two species known from Pakistan)

Ablepharus grayanus (Stoliczka)

1872. *Blepharosteres grayanus* Stoliczka, *Proc. Asiatic Soc. Bengal, Calcutta*, 1872: 74.

Type locality

Waggur District, northeast Kutch, India.

Distribution in Pakistan

This lizard is recorded from throughout Pakistan at low elevations, especially grass fields in the Indus riparian system. It has also been recorded from hills around Fort Munro, Dera Ghazi Khan at an elevation of 1800 m.

Ablepharus pannonicus (Fitzinger)

1823. *Scincus pannonicus* Fitzinger In: Liechtenstein in Eversmann, *Reise von Orenburg nach Buchara*,: 103.

Type locality

Bukhara.

Distribution in Pakistan

Reported from around Quetta, Waziristan hills, Chitral and the Salt Range.

Distribution outside Pakistan

From the Arabian Peninsula and North Arabian Desert, through Iran to circum-Mediterranean region, Tadzhikistan and Afghanistan.

Genus *Chalcides* Laurenti, 1768
(Single species known from Pakistan)

Chalcides ocellatus (Forskål)

1775. *Lacerta ocellatus* Forskål, *Descript. Anim.*: 13.

Type locality

Egypt.

Distribution in Pakistan

In Pakistan it has been recorded from along the coastal strip, around Karachi and Astola Island.

Distribution in Pakistan

Widely distributed in the west, from the Mediterranean through northern Saudi Arabia, the Persian Gulf to the Makran coast

Genus *Eumeces* Wiegmann, 1834
(Three species are recorded from Pakistan)

Eumeces blythianus (Anderson)

1871. *Mabouia blythiana* John Anderson, *Proc. Asiatic Soc. Bengal, Calcutta*, 1871: 186.

Type locality

Purchased in Amritsar, Punjab, India.

Distribution in Pakistan

The orange tail skink has been collected from coastal areas of Pakistan. It has also been reported from near the Khyber Pass in northwestern Pakistan, close to the Afghan border.

Eumeces indothalensis M. S. Khan and M.R.Z. Khan

1997. *Eumeces indothalensis* M.S. Khan and M.R.Z. Khan, *Asiatic herpetol. Res.*, 7: 61-67.

Type locality

Bar Ginga Village, 9 km south-west of Bakkar western Punjab, Pakistan.

Distribution in Pakistan

The skink is known from the southwestern Thal Desert, close to the left bank of the River Indus, south-western Punjab.

Eumeces taeniolatus Blyth

1854. *Eurylepis taeniolatus* Blyth, *J. Asiatic Soc. Bengal, Calcutta*, 23: 739.

Type locality

Salt Range, Punjab, Pakistan.

Distribution in Pakistan

Collected from throughout the plains of Punjab and Sindh to an elevation of 2000 m.

Distribution outside Pakistan

From Arabia to the Transcaspiya, Kutch, and Sindh to Kashmir.

Eumeces zarudnyi Nikolsky

1900. *Eumeces zarudnyi* Nikolsky, *Ann. Mus. Zool. Acad. Sci. St. Petersburg*, **1899**: 399.

Type locality

Bazman and Schur-Ad in Kirman; Labe-Ab in Seistan, Iran.

Distribution in Pakistan

Recorded from Astola Island, 10 km off the coast of Karachi.

Distribution outside Pakistan

Reported from central to southeastern Iran.

Genus *Lygosoma* Hardwick and Gray, 1827

(A single species represented in Pakistan)

Lygosoma punctata (Linnaeus)

1766. *Lacerta punctata* Linnaeus, *Syst. Nat.*, **1**:369.

Type locality

Asia.

Distribution in Pakistan

Restricted to the eastern strip of Punjab plain, northward it extends into Hazara Division.

Distribution outside Pakistan

Wide range in the Indo-Gangetic plains, from Bangladesh through India and Sri Lanka.

Genus *Mabuya* Fitzinger, 1826

(Two species reported from Pakistan)

Mabuya dissimilis (Hallowell)

1860. *Euprepes dissimilis* Hallowell, *Trans. Am. phil. Soc.*, **11**: 78.

Type locality

Bengal.

Distribution in Pakistan

Rawalpindi, upper Indus Valley to Waziristan, and extends into the Indus Delta.

Distribution in Pakistan

Widely distributed from western Bengal, Bihar, across the Gangetic plain.

Mabuya macularia (Blyth)

1853. *Euprepes macularius* Blyth, *J. Asiatic Soc. Bengal, Calcutta*, **22**: 652.

Type locality

Rangpur, Bengal.

Distribution in Pakistan

Reported from the plains and highland of the Salt Range, in Punjab, around Karachi and Las Bela.

Distribution outside Pakistan

Range of this skink extends from Laos and Cambodia to northern Malaya, Burma, western Bengal and Bihar, across the Indo-Gangetic Plain, to the Iranian Plateau.

Genus *Ophiomorus* Dumeril and Bibron, 1839

(Four species recorded from Pakistan)

Ophiomorus blanfordi Boulenger

1887. *Ophiomorus blanfordi* Boulenger, *Cat. Liz. Br. Mus.*, **3**: 395.

Type locality

Chah Bahar, Baluchistan, Pakistan.

Distribution in Pakistan

Known from coastal Makran.

Distribution outside Pakistan

Extends into the adjoining coastal Iran.

Ophiomorus brevipes (Blanford)

1874. *Zygnopsis brevipes* Blanford, *Ann. Mag. nat. Hist.*, **14**: 33.

Type locality

Saadatabad, southwest of Kirman, Iran.

Distribution outside Pakistan

Recorded from along the Iran and Pakistan border.

Ophiomorus raithmai S. Anderson and Leviton

1966. *Ophiomorus raithmai* S. Anderson and Leviton, *Proc. Calif. Acad. Sci.*, **33**: 519.

Type locality

Ghizri, Karachi District, Pakistan.

Distribution in Pakistan

From various localities in Sindh and Las Bela.

Distribution outside Pakistan

India: Kathiwar.

Ophiomorus tridactylus (Blyth)

1853. *Sphenocephalus tridactylus* Blyth, *J. Asiatic Soc. Bengal, Calcutta*, **22**: 654.

Type locality

Afghanistan.

Distribution in Pakistan

Western Baluchistan.

Distribution outside Pakistan

Reported from along the borders between Afghanistan, Iran, and Pakistan.

Genus *Scincella* Mittleman, 1950
(Two species known from Pakistan)

Scincella himalayanus (Günther)

1864. *Eumeces himalayanus* Günther, *Rep. Br. India*, 86.

Type locality

Kashmir; Garhval, Simla, India.

Distribution in Pakistan

In Pakistan it abounds in marginal vegetation along water courses in alpine Punjab, Salt Range, Chitral, Waziristan, and Kalabag, District Mianwali.

Distribution outside Pakistan

A mountain lizard, recorded from Nepal to Turkmenistan

Scincella ladacensis (Günther)

1864. *Eumeces ladacensis* Günther, *Rep. Br. India*, 88.

Type locality

Ladak, Baltistan, Kashmir.

Distribution in Pakistan

Reported from Baltistan.

Distribution outside Pakistan

Kahajeng Khola, in Nepal, the highest altitude (6000 m) so far reported for any cold-blooded vertebrate.

Family UROMASTYCIDAE

(Single genus represented by two species in Pakistan)

Genus *Uromastyx* Merrem, 1820

(Two species are recorded from Pakistan)

Key to the species of genus *Uromastyx* in Pakistan

1. Body dorsum with uniform granular scales, caudal spines smaller, 20-24 in a row at the base of the tail
..... *Uromastyx hardwickii*
Dorsal body scales granular interspersed with transverse rows of spiny scales; caudal spines larger, 8-10 in a row at the base *Uromastyx asmussi*

Uromastyx asmussi (Strauch)

1863. *Centrotrachelus asmusse* Strauch, *Bull. Acad. Sci. St. Petersburg*, **6**: 479.

Type locality

Sar-i-tschah, Persia.

Distribution in Pakistan

Reported from the Chagai, Baluchistan.

Distribution outside Pakistan

Collected from the southern Iran and along the Afghan-Iran border.

Uromastyx hardwickii Gray

1827. *Uromastyx hardwickii* Gray, *Zool. J. London*, 3: 219.

Type locality

Kanauj District, United Provinces, India.

Distribution in Pakistan

Recorded from throughout the Indus Valley and extends into Las Bela, southern Baluchistan.

Family VARANIDAE

(Four species and subspecies of genus *Varanus* recorded from Pakistan)

Genus *Varanus* Merrem, 1820

(Four species and subspecies of genus *Varanus* recorded from Pakistan)

Key to the species of genus *Varanus*

1. Tail compressed with a median dorsal ridge; scales on side of neck keeled 2
Tail round, ridge slightly indicated in the middle of tail; scales on the sides of neck conical..... *Varanus griseus*
2. Naris nearer to the tip of snout than eye *Varanus flavescens*
Naris nearer to eye than the tip of snout *Varanus bengalensis*

Varanus bengalensis (Daudin)

1802. *Tupinambis bengalensis* Daudin, *Hist. nat. Rep.*, 3: 67.

Type locality

Bengal.

Distribution in Pakistan

Throughout the plains of Punjab and Sindh, sub-Himalayan tracts, and Waziristan.

Distribution outside Pakistan

Assam, Burma, Nepal, Sikkim, throughout India, and Sri Lanka. and extends westward into Pakistan, south-eastern Iran and eastern Afghanistan.

Varanus flavescens (Hardwicke and Gray)

1827. *Monitor flavescens* Hardwicke and Gray, *Zool. J. London*, 3: 226.

Type locality

India.

Distribution in Pakistan

This varanid has a restricted distribution range. It has been reported from Salt Range and District Sialkot in northern Punjab, and the Sindh Delta in Pakistan.

Distribution outside Pakistan

It is known to extend to the western Bengal.

Varanus griseus (Daudin)

1803. *Tupinambis griseus* Daudin, *Hist. nat. Rep.*, 8: 352.

Type locality

Egypt.

Distribution in and outside Pakistan

The varanid has a wide range in the arid desert areas of India, Pakistan, and the Middle East. It ranges from Rajasthan to the Caspian Sea and North Africa. Distinguished in two races:

Varanus griseus caspius (Eichwald)

1831. *Psammosaurus caspius* Eichwald, *Zool. Spec.*, 3: 190.

Type locality

Eastern coast of the Caspian Sea.

Distribution in Pakistan

Northern and western Baluchistan.

Distribution outside Pakistan

From the Transcasian Desert to southern Khazakistan and Afghanistan, extending into Pakistan.

Varanus griseus koniecznyi Mertens

1954. *Varanus griseus koniecznyi* Mertens, *Senckenb. Biol. Frank.*, **35**: 355.

Type locality

Korangi, Karachi, Pakistan.

Distribution in Pakistan

Cholistan, Sindh, and the Kharan Desert.

Distribution outside Pakistan

Central India.

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