Supplemental Tables

Sup. Table 1. Morphological and meristic characters used in this study along with the observed values of *Ophisops beddomei* (*indicates incomplete/missing tail tips/digits).

	NHMUK 1946.9.4.6	NHMUK 1946.9.4.7	NHMUK 1946.9.4.8	NHMUK 1946.9.4.9	NHMUK 1946.9.4.10	NHMUK 1946.9.4.11	NHMUK 1946.9.4.12	NHMUK 1946.9.4.13	NHMUK 1946.9.4.14	NHMUK 1946.9.4.15	CESL 534
Sex	M	M	M	M	M	F	F	F	F	F	M
SCS R/L	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3
SCG R/L	-	11/11	9/9	10/9	11/10	8/9	11/11	-	9/9	-	
SOS R/L	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4
SL R/L	8/8	8/8	8/8	8/8	8/8	8/8	9/8	8/-	8/8	8/8	8/8
IL R/L	7/7	7/7	7/7	7/7	7/7	7/7	7/7	7/-	7/7	6/7	7/7
LO R/L	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2
STS R/L	2/2	2/2	2/2	1/1	2/3	2/2	3/2	2/2	2/2	2/3	2/2
CS R/L	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	5#/6	6/6
DS	-	-	42	42	45	44	44	45/46	47	-	45
RBS	-	-	-	30	31	32	30	30	30	-	-
VS	24	24	25	22	25	25	27	27	26	-	25
GS	16	16	17	16	18	17	18	17	17	17	17
NCS	5	5	5	5	5	5	5	5	5	6	5
NVS	26	26	27	24	27	27	29	29	28	-	27
NFP	11/10	11/-*	10/10	10/11	11/11	10/12	9/9	11/10	9/11	9/8	12/11
SBFP	1	1	1	1	1	3	4	3	4	3	1

Sup. Table 2. Mensural and meristic characters used in this study along with the observed values of type series of *Ophisops venustus* sp. nov. (All measurements are in mm; *indicates incomplete/missing tail tip/digits).

	BHNS 3133 Holotype	BHNS 3134 Paratype	BNHS 3135 Paratype	BNHS 3136 Paratype	BNHS 3137 Paratype	BNHS 3138 Paratype	BNHS 3139 Paratype	BNHS 3140 Paratype	BNHS 3141 Paratype	BNHS 3142 Paratype	BNHS 3143 Paratype	BNHS 3144 Paratype	BNHS 3145 Paratype
Locality	Dhulda, Dang	Dhulda, Dang	Piprol, Valsad	Saputara, Dang	Saputara, Dang	Nr Ahwa, Dang	Kelda, Narmada	Salher	Salher	Don, Dang	Don, Dang	Datar, Junagadh	Datar, Junagadh
Sex	M	M	F	M	M	F	M	F	M	M	M	F	F
SVL	31.5	33.6	34.5	34.3	31.3	35.1	30.7	36	30.7	32	27.9	30.7	28.4
TL	65.4	48.2	67.4	12.8*	18.8*	63.7	48.5*	55*	33.7*	76	59.7	67.5	13.4*
TRL	13.4	14.7	16.8	14.9	13.5	18.6	12.8	17.4	13.4	13.9	11.8	12.9	12.2
HL	9.4	9.1	9.2	10	8.9	8.9	8.7	9.5	8.6	9.5	8.3	8.8	8.5
HH	3.6	3.7	3.7	3.9	3.6	3.7	3.7	3.8	3.9	3.8	3.3	3.1	3.1
HW	4.2	4.2	4.5	4.6	4.1	4.6	4.2	4.6	4.5	4.5	3.9	4.1	4
LFL	12.7	12.8	11.7	13	11.4*	11.7	12.7	11.8	12.8	12.8	10.3	11.8	9.6
LHL	19.8	19.4	18.9	20.2	18.3	19.4	19.2	18.9	18.8	19.8	17.1	18.3	16.4
FL	4.1	4.3	3.8	4.5	4	3.7	4.2	3.8	4.3	4.4	3.4	4	3.2
LFO	5	5	4.7	5.2	5.1	4.7	4.7	4.9	4.8	5.1	4.3	4.8	4.5
CL	5.9	5.8	5.1	6.2	5.5	6.1	5.5	5.5	5.4	6	5.2	5.1	4.7
ED	1.7	1.5	1.6	2	1.7	1.5	1.8	2	1.6	2	1.2	1.4	1.2
SE	4.1	4	3.8	4.1	4.1	4	3.5	4	3.6	4.1	3.4	3.6	3.4
NE	3.6	3.5	3.5	3.6	3.6	3.6	3.1	3.7	3.2	3.6	3.1	3.3	3.1
EE	3.1	2.9	2.6	3	3.1	2.9	2.8	3	2.7	3.1	2.5	2.4	2.1
NL	4.4	4.9	4.6	4.9	4.1	4.4	4.1	5.1	4	4.1	3.4	4.1	4
TD	1.3	1.3	1.7	1.7	1.3	1.4	1.2	1.8	1.2	1.4	1	1.3	1.1
IN	1.3	1.3	1.6	1.7	1.3	1.3	1.2	1.7	1.2	1.4	1	1.3	1.1
IO	3.9	3.9	3.8	4.2	3.9	3.8	3.8	3.8	3.9	4.3	3.4	3.6	3.5
LV	2.6	2.7	2.5	2.9	2.5	2.5	2.6	3.4	2.5	3.5	2.4	2.5	2.5
LBT	3.3	3.5	2.8	3.5	2.9	3.1	3.2	3.8	3.2	3.8	3.3	3.2	3.1
BW	6.1	6.6	5.7	7.4	5.1	6.3	6	6.8	7	7.3	6.1	5.4	5.4
SCS R/L	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3	3/3
SCG R/L	8/8	7/7	8/8	8/8	7/7	7/6	9/10	4/5	8/8	7/9	6/8	7/8	7/8
SOS R/L	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4	4/4
SL R/L	8/8	8/8	8/8	8/8	8/8	8/7	8/8	8/8	8/8	8/8	8/8	8/8	8/8
IL R/L	7/7	7/7	6/6	7/6	7/7	7/7	7/7	6/8	7/6	7/7	7/7	7/7	7/7
LO R/L	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2	2/2
STS R/L	2/2	2/2	3/3	2/2	2/3	3/3	2/2	3/3	1/1	2/2	2/2	2/3	3/2
CS R/L	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6	6/6
DS	47	47	52	47	49	53	48	51	47	49	46	51	50
RBS	28	31	28	28	30	30	30	30	28	30	28	31	30

VS	22	23	24	22	23	27	22	25	22	23	22	25	24
GS	15	16	18	16	17	18	16	19	17	17	17	16	16
NCS	4	4	4	4	4	4	4	5	4	4	4	5	4
NVS	24	26	26	24	26	29	24	27	24	25	24	27	26
NFP	10/11	9/9	8/8	9/10	10/10	8/8	10/11	8/8	10/9	10/10	9/10	11/9	9/8
SBFP	0	0	4	1	0	4	1	4	1	1	1	3	3
Lamellae R/L (sub-digital lamellae, the one touching the claw included)													
LAM1F	6/6	7/6	6/6	7/6	7/6	6/6	7/7	6/6	7/7	7/6	6/6	7/6	6/7
LAM2F	9/10	10/10	9/10	9/9	9/9	9/10	10/10	10/10	10/10	10/10	9/10	9/9	9/10
LAM3F	13/13	13/14	13/12	13/14	13/13	12/13	14/14	13/14	14/14	13/14	13/12	13/13	12/13
LAM4F	16/15	15/16	15/16	15/16	9*/16	15/16	16/16	15/15	16/16	16/15	15/15	16/15	16/16
LAM5F	10/9	9/10	9/9	9/10	9/9	9/9	9/10	9/9	9/9	9/9	9/9	9/10	9/9
LAM1T	8/8	5*/9	8/8	9/8	8/9	9/8	9/9	8/8	8/9	8/8	8/8	8/8	8/8
LAM2T	11/11	12/12	12/12	12/11	12/11	11/11	12/11	11/11	12/12	11/11	11/11	12/12	12/12
LAM3T	15/14	15/16	15/16	15/15	-*/14	14/15	15/15	14/15	15/16	14/14	15/14	16/15	16/15
LAM4T	19/20	21/20	19/19	20/20	-*/19	19/19	21/21	19/19	19/8*	20/19	20/19	20/19	19/19
LAM5T	12/12	11/12	11/11	11/11	-*/11	11/11	12/13	11/-*	12/12	13/12	11/11	11/12	13/12

Sup. Table 3. Sequence evolution model used for the ML analysis

No.	Model	Partition
1	TPM2u+F+I+G4	codon1
2	TPM3u+F+I+G4	codon2
3	TIM2+F+G4	codon3

Sup. Table 4. Uncorrected pairwise sequence divergence for *Ophisops* spp. for the mitochondrial cytochrome b gene.

		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
1	*KX753429 O. venustus* sp. nov.																								
2	*KX753430 O. venustus* sp. nov.	0.00																							
3	*KX753431 O. venustus* sp. nov.	0.00	0.00																						
4	*KX753432 O. cf. beddomei*	0.03	0.03	0.03																					
5	*KX753433 O. cf. beddomei*	0.03	0.03	0.03	0.02																				
6	*KX753434 O. cf. beddomei*	0.04	0.03	0.03	0.02	0.02																			
7	*KX753435 O. cf. beddomei*	0.03	0.03	0.03	0.01	0.02	0.00																		
8	*KX753436 O. cf. beddomei*	0.03	0.03	0.03	0.01	0.02	0.01	0.00																	
9	*KX753437 O. cf. beddomei*	0.03	0.03	0.03	0.01	0.02	0.01	0.01	0.01																
10	*KX753438 O. cf. beddomei*	0.03	0.03	0.03	0.01	0.02	0.01	0.01	0.01	0.01															
11	*KX753440 O. cf. beddomei*	0.04	0.04	0.04	0.05	0.06	0.06	0.05	0.05	0.05	0.05														
12	*KX753441 O. cf. beddomei*	0.04	0.04	0.04	0.04	0.05	0.05	0.04	0.04	0.05	0.04	0.05													
13	*KX753442 O. cf. beddomei*	0.04	0.04	0.04	0.04	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.01												
14	*KX753443 O. cf. beddomei*	0.04	0.04	0.04	0.04	0.05	0.05	0.05	0.04	0.05	0.04	0.05	0.00	0.01											
15	*KX753448 O. cf. beddomei*	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.09	0.08	0.09	0.09										
16	*KX753444 O. cf. beddomei*	0.04	0.04	0.04	0.04	0.05	0.05	0.05	0.04	0.05	0.04	0.05	0.01	0.00	0.01	0.09									
17	*KX753445 O. cf. beddomei*	0.08	0.08	0.08	0.09	0.09	0.08	0.09	0.08	0.09	0.09	0.09	0.08	0.09	0.08	0.03	0.08								
18	*KX753446 O. cf. beddomei*	0.08	0.08	0.08	0.09	0.09	0.08	0.09	0.08	0.09	0.09	0.09	0.09	0.09	0.09	0.04	0.08	0.00							
19	*KX753447 O. beddomei*	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.08	0.03	0.08	0.03	0.03						
20	*KX753449 O. jerdonii*	0.16	0.16	0.16	0.16	0.17	0.17	0.17	0.17	0.17	0.16	0.17	0.16	0.17	0.16	0.17	0.16	0.17	0.17	0.16					
21	*KX753450 O. jerdonii*	0.16	0.16	0.16	0.16	0.17	0.17	0.17	0.17	0.17	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.17	0.16	0.02				
22	*KX753452 O. jerdonii*	0.16	0.16	0.16	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.17	0.16	0.02	0.01			
23	*KX753453 O. jerdonii*	0.17	0.18	0.17	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.17	0.17	0.17	0.17	0.18	0.17	0.17	0.18	0.17	0.03	0.02	0.01		
24	*KX753472 O. jerdonii*	0.14	0.14	0.13	0.14	0.15	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.13	0.14	0.14	0.15	0.13	0.02	0.01	0.01	0.03	
25	*KX753479 O. jerdonii*	0.16	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.02	0.02	0.02	0.03	0.03
26	*EU081681 O. jerdonii*	0.14	0.14	0.14	0.14	0.15	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.15	0.13	0.02	0.02	0.01	0.04	0.00
27	*KX753507 O. leschenaultii*	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.21	0.23	0.23	0.23	0.24	0.20
28	*KX753508 O. leschenaultii*	0.23	0.23	0.23	0.24	0.23	0.23	0.23	0.23	0.23	0.24	0.23	0.23	0.23	0.23	0.22	0.22	0.21	0.22	0.22	0.24	0.24	0.24	0.24	0.22
29	*KX753529 O. kutchensis*	0.24	0.24	0.24	0.24	0.23	0.24	0.24	0.24	0.25	0.24	0.24	0.24	0.24	0.24	0.25	0.24	0.25	0.25	0.25	0.24	0.24	0.24	0.24	0.24
30	*KX753530 O. pushkarensis*	0.23	0.23	0.23	0.24	0.23	0.24	0.24	0.24	0.24	0.24	0.24	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.24	0.24	0.22
31	*KX753531 O. pushkarensis*	0.24	0.23	0.23	0.24	0.23	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.23	0.23	0.23	0.23	0.23	0.24	0.24	0.24	0.24	0.24
32	*KX753532 O. microlepis*	0.23	0.23	0.23	0.23	0.23	0.24	0.23	0.23	0.23	0.23	0.24	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.20
33	*KX753533 O. microlepis*	0.22	0.22	0.22	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.24	0.23	0.23	0.23	0.22	0.23	0.22	0.23	0.23	0.22	0.23	0.23	0.24	0.20
34	*KX753534 O. microlepis*	0.23	0.23	0.23	0.23	0.23	0.24	0.23	0.24	0.24	0.23	0.24	0.23	0.23	0.24	0.23	0.23	0.23	0.23	0.23	0.22	0.23	0.23	0.23	0.20

Sup. Table 4 continued. Uncorrected pairwise sequence divergence for *Ophisops* spp. for the mitochondrial cytochrome b gene.

		25	26	27	28	29	30	31	32	33
1	*KX753429 O. venustus* sp. nov.									
2	*KX753430 O. venustus* sp. nov.									
3	*KX753431 O. venustus* sp. nov.									
4	*KX753432 O. cf. beddomei*									
5	*KX753433 O. cf. beddomei*									
6	*KX753434 O. cf. beddomei*									
7	*KX753435 O. cf. beddomei*									
8	*KX753436 O. cf. beddomei*									
9	*KX753437 O. cf. beddomei*									
10	*KX753438 O. cf. beddomei*									
11	*KX753440 O. cf. beddomei*									
12	*KX753441 O. cf. beddomei*									
13	*KX753442 O. cf. beddomei*									
14	*KX753443 O. cf. beddomei*									
15	*KX753448 O. cf. beddomei*									
16	*KX753444 O. cf. beddomei*									
17	*KX753445 O. cf. beddomei*									
18	*KX753446 O. cf. beddomei*									
19	*KX753447 O. beddomei*									
20	*KX753449 O. jerdonii*									
21	*KX753450 O. jerdonii*									
22	*KX753452 O. jerdonii*									
23	*KX753453 O. jerdonii*									
24	*KX753472 O. jerdonii*									
25	*KX753479 O. jerdonii*									
26	*EU081681 O. jerdonii*	0.03								
27	*KX753507 O. leschenaultii*	0.23	0.19							
28	*KX753508 O. leschenaultii*	0.23	0.20	0.04						
29	*KX753529 O. kutchensis*	0.24	0.24	0.24	0.24					
30	*KX753530 O. pushkarensis*	0.23	0.22	0.22	0.22	0.09				
31	*KX753531 O. pushkarensis*	0.24	0.23	0.22	0.22	0.09	0.00			
32	*KX753532 O. microlepis*	0.23	0.21	0.22	0.22	0.09	0.06	0.06		
33	*KX753533 O. microlepis*	0.23	0.21	0.22	0.22	0.09	0.06	0.06	0.01	
34	*KX753534 O. microlepis*	0.23	0.21	0.23	0.22	0.09	0.06	0.06	0.00	0.01

Sup. Table 5. List of localities for *Ophisops beddomei* species complex based on new collections or observations and literature.

No	Species	Type status	Locality	Coordinates	Reference
1	*O. venustus* sp. nov.	Holotype	Dhulda, Dang, Gujarat	20.94941°N 73.66281°E	Present study
2	*O. venustus* sp. nov.	Paratype	Governer Hill, Saputara, Dang, Gujarat	20.56794°N 73.74650°E	Present study
3	*O. venustus* sp. nov.	Paratype	Ahwa, Dang, Gujarat	20.74886°N 73.69060°E	Present study
4	*O. venustus* sp. nov.	Paratype	Fort Salher, Satana, Nashik, Maharashtra	20.72476°N 73.93879°E	Present study
5	*O. venustus* sp. nov.	Paratype	Don hill, Dang, Gujarat	20.72816°N 73.86117°E	Present study
6	*O. venustus* sp. nov.	Paratype	Piprol, Dharampur, Valsad, Gujarat	20.50513°N 73.32426°E	Present study
7	*O. venustus* sp. nov.	Paratype	Datar hill, Junagadh, Gujarat	21.49075°N 70.50704°E	Present study
8	*O. venustus* sp. nov.	Paratype	Kelda, Dediapada, Narmada, Gujarat	21.65941°N 73.81047°E	Present study
9	*O. venustus* sp. nov.	-	Bhuvero, Ratanmahal, Dahod, Gujarat	22.52824°N 74.13162°E	Vyas 2003
10	*O. venustus* sp. nov.	-	SGNP, Mumbai, Maharashtra	19.21777°N 72.90842°E	Present study
11	*O. venustus* sp. nov.	-	Chikhaldhara, Amravati, Maharashtra	21.40801°N 77.32871°E	Agarwal & Ramakrishnan 2017
12	*O.* cf. *venustus*	-	Dudhaniya, Balaghat, Madhya Pradesh	22.14315°N, 80.00365°E	Mohapatra *et al.* 2023
13	*O.* cf. *venustus*	-	Mulshi, Pune, Maharashtra	18.50323°N 73.51799°E	Agarwal & Ramakrishnan 2017
14	*O.* cf. *venustus*	-	Mahabaleshwar, Satara, Maharshtra	17.92298°N 73.67305°E	Agarwal & Ramakrishnan 2017
15	*O.* cf. *venustus*	-	Kaas, Satara, Maharashtra	17.72112°N 73.82191°E	Agarwal & Ramakrishnan 2017
16	*O.* cf. *venustus*	-	Chalkewadi, Satara, Maharashtra	17.59229°N 73.82775°E	Agarwal & Ramakrishnan 2017
17	*O.* cf. *venustus*	-	Dhuilwadi, Satara, Maharashtra	17.45917°N 73.81722°E	Agarwal & Ramakrishnan 2017
18	*O.* cf. *venustus*	-	Walmiki, Ratnagiri, Maharashtra	17.25417°N 73.80685°E	Agarwal & Ramakrishnan 2017
19	*O.* cf. *venustus*	-	Nr. Chandoli, Sangli, Maharashtra	17.12701°N 73.86233°E	Agarwal & Ramakrishnan 2017
20	*O.* cf. *venustus*	-	Barki, Kolhapur, Maharashtra	16.74482°N 73.83842°E	Agarwal & Ramakrishnan 2017
21	*O.* cf. *venustus*	-	Nr. Dajipur, Kolhapur, Maharashtra	16.35424°N 73.85718°E	Agarwal & Ramakrishnan 2017
22	*O.* cf. *venustus*	-	Ugwai temple, Kolhapur, Maharashtra	16.37514°N 73.86260°E	Agarwal & Ramakrishnan 2017
23	*O.* cf. *venustus*	-	Nr. Amboli, Sindhudurg, Maharashtra	15.97829°N 74.00815°E	Agarwal & Ramakrishnan 2017
24	*O.* cf. *beddomei*	-	Verlem, South Goa, Goa	15.04198°N 74.25404°E	Agarwal & Ramakrishnan 2017
25	*O. beddomei*	Type locality	Brahmagiri, Kodagu, Karnataka	12.19948°N 75.65099°E	Jerdon 1870
26	*O.* cf. *beddomei*	-	Cheemeni, Kasargod, Kerala	12.23383°N 75.23425°E	Agarwal & Ramakrishnan 2017
27	*O.* cf. *beddomei*	-	Manipal, Udupi, Karnataka	13.35265°N 74.78045°E	Patel & Vyas 2020
28	*O.* cf. *beddomei*	-	Chennai, Tamil Nadu	12.98045°N 80.02875°E	Patel & Vyas 2020

Supplemental Material

Sup. Material 1. Comparative material examined.

Ophisops agarwali: Holotype: BNHS 2750, Bhuvero, Ratanmahal, Dahod District, Gujarat.
Ophisops leschenaultii: BNHS 1414, BNHS 1415, Talakona, Tirupati, Chittoor District, Andhra Pradesh.
Ophisops jerdonii: BNHS, 1594, Pune, Maharashtra; BNHS, 1601, Yawal WLS, Maharashtra; BNHS, 1805, Nabhdungar, Sam, Jaisalmer, Rajasthan; HP 106, HP 107, HP 108, near Junagadh, Gujarat; RV 101, Kutch, Gujarat; RV 102, Surendranagar, Gujarat.
Ophisops pushkarensis: Holotype: BNHS 2031, near Pushkar, Rajasthan; BNHS 1726, BNHS 1727, Jessore WLS, Gujarat.
Ophisops kutchensis: Paratype: BNHS 2024, near Tera, Kutch, Gujarat; HP 109, HP 110, near Dwarka, Gujarat.
Ophisops microlepis: Holotype (images): ZSI 2236, 'Korba in Bilaspur, the eastern part of Chhatisgarh division, Central Province' (in Chhattisgarh, central India).
Ophisops nictans: Syntypes: 1946.9.3.89-92, 'Cuddapah, Madras' (=Kadapa, Andhra Pradesh).
Ophisops elegans: BNHS 901, Iraq.

Supplemental Figures

Sup. Figure 1. The complete phylogeny tree