THE JOURNAL OF THE HERPETOLOGICAL ASSOCIATION OF EHODESIA.

AUGUST, 1958.

LIST OF MEMBERS AS AT 1st AUGUST 1958.

- D.G.Broadley, F.Z.S., Honorary Secretary/Treasurer. P.O. Bembesi, Southern Rhodesia.
- D.K.Blake, Honorary Branch Secretary, Umtali Branch. 61 First Street, Umtali, Southern Rhodesia.
- W.W.Armitage (Umtali Branch) c/o Irrigation Department, P.O.Mount Darwin, S.Rhodesia.
- S.Warren (Umtali Branch) c/o Irrigation Department, Umtali, S.Rhodesia.
- Rev. K.Tasman, S.J. Monte Cassino Mission, Macheke, Southern Rhodesia.
- A.H.Siemers Prince Edward School, P.O.Box 8076, Causeway, Salisbury, S.F.
- V.J.Wilson Game & Tsetse Dept., P.O.Box 37, Fort Jameson, N.Rhodesia.
- E.L.McCarthy, F.Z.S.
 15 "J" Avenue, Luanshya, N.Rhodesia.
- L.D.E.F.Vesey-FitzGerald International Red Locust Control Service, P.O.Box 37, Abercorn, Northern Rhodesia.
- Captain C.F.S.Pitman, C.B.E., D.S.O., M.C. Flat 9, 12 Chelsea Embankment, London S.W.3., England.
- R.M.Isemonger 5 Charles Bullock Avenue, Belvedere, Salisbury, S.Rhodesia.
- W.A.Menage P.O.Box 70, Salisbury, S.Rhodesia.
- D.S.Rider c/o 49 Fife Street, Bulawayo, S.Rhodesia.
- M.R.French P.O.Box 8110, Causeway, Salisbury, S.Fhodesia.
- L.Balarin Teachers' Training College, P. Bag T.333, Heany, Bulawayo, S.R.
- Miss P.Galland Teachers' Training College, P. Bag T.333, Heany, Bulawayo, S.R.

ASSOCIATE MEMBERS

- Serum Department, South African Institute for Medical Research,
 P.O.Box 1038, Johannesburg, South Africa (Exchange of
 Publications).
- J.D.Visser
 Dept. of Wild Life Conservation, Jonker's Hoek,
 Stellenbosch, C.P., South Africa.
- Wild Life Protection Society of South Africa, / Publications).
 P.O.Box 1398, Johannesburg, South Africa (Exchange of
- The Fauna Preservation Society, c/o Zoological Society of London, Regent's Park, London 1.W.l., England. (Exchange of Publications).
- The British Herpetological Society, c/o Zoological Society of London, Regent's Park, London R.W.l., England. (Exchange of Publications).
- Dr. V.F.FitzSimons Transvaal Museum, P.O.Box 413, Pretoria, Tvl., S uth Africa.
- Dr. Walter Rose "Oaknook", Protea Road, Newlands, C.P., South Africa.

Charles E. Shaw
Curator of Reptiles, Zoological Society of San Diego,
P.O.Box 551, San Diego, California, U.S.A.

Roger Conant Taunton Lakes, Marlton, New Jersey, U.S.A.

Edmond V.Malnate
West Lake Road, Lake Pine, Marlton, New Jersey, U.S.A.

New York Zoological Society, 185th Street & Southern Boulevard, New York 60, N.Y., U.S.A.

J.W.Steward
11 Churchill Road, St Albans, Herts, England.

J.H.E.Leakey
P.O.Box 658, Mairobi, Kenya.

John Wood, The South African Snake Farm P.O.Box 6, Fish Hock, C.P., South Africa.

A.HeathileId
28 Seventh Street, Parkhurst, Johannesburg, Tvl., South Africa.

JOTTINGS FROM COBHA CORNER

Dear Member,

With the great influx of new members during the last quarter and a number of changes of address, it became neccessary to publish an up to date list of our membership. I have also included in this issue a list of papers and journals in the Association Reference Library.

Association Reference Library.

Those members who have not yet paid their subscriptions for 1958-59 (Due last April) are requested to send in their cheques or Postal Orders for \$2-\$ by the end of the month as I wish to prepare the books for audit.

Twelve blazer badges worked in gold and silver wire have been ordered from a London firm. Any members who want one of these badges and have not yet ordered one are advised to let me know as soon as possible for there are only a few unreserved. The price is 57/6. The cost of producing lapel badges for a small membership proved to be uneconomic.

Postal Vote - As it will cost about £16 to register the Association badge and motto, members are requested to vote by post on a proposal that the last sentence in paragraph 12 of the Constitution - "This badge and motto shall be properly registered" shall be deleted.

To assist in working out the ranges of certain races of <u>Dispholidus</u> and <u>Psammophylax</u> in Forthern Rhodesia, members in that area are asked to note the following points:

<u>Dispholidus typus</u> - Sex; Colouration and Markings;

Subcaudal count.

Psammophylax tritaeniatus - Presence or absense of dark dorsal and lateral stripes. All possible scale counts.

Specimens of these species are also needed for the

National Museum collection.

Contents of Journal 10.4.

Page 3. A key to the Snakes of Rhodesia and Nyasaland - Part I.

by D.G.Broadley (To be published in three parts).

Page 4. Library Service - List of publications available.

Page 5. Case History of an Atractaspis bibronii bite. by A.H.Siemers Page 6. The Genus Philothamnus in Khodesia & Lyasaland by D.G.B.

Page 7. Here and There.

Good Hunting,

D.G.Broadley

Hon. Secretary/Treasurer, Herpetological Association of Ehodesia.

	3
10 o o	ART I.
A. Key to Families.	
1. Body encircled by small scales more or less unifor 3 or 4 scales immediately preceding vent; eye midistinguishable, beneath a shield	.nute, when
Body not encircled by small scales owing to the paths belly of a longitudinal series of transversel plates, known as ventrals; 1 or 2 scales immediated ceding vent; eye clearly visible beneath a transperse "watchglass" scale	y enlarged cely pre- carent
	longer than <u>HLOPIDAE</u> (B) nd-Snakes)
Ocular shield bordering mouth; 14 scales round me tail much longer than broad; size very small, wor <u>LEPTOTYP</u> (Worm-Si	mlike H <u>LOPIDAE</u> (C)
3. Ventral shields much narrower than body; midbody more than 75; vestigial limbs present, discerable of "claws" before the vent	e as a pair
Ventral shields as broad as or nearly as broad as midbody scale rows less than 50; no vesigial limb	s body; os present.4
4. No enlarged poison fangs at <u>FRONT</u> of jaw <u>COI</u>	LUBRIDAE (E) Ical Snakes)
One or more pairs of enlarged poison fangs at fro	ont of jaw.5
5.Poison fangs immovable. not encased in a sheath of	f membrane
(Cobras,	Mambas,Etc.)
	<u> </u>
Note. 1 Warning: Snakes of the genus <u>Psammophis</u> have greatly enlarged fang-like teeth below the anterior the eye.	e a pair of border of
B. Key to the <u>TYPHLOPIDAE</u> (Blind Snakes) of Rhodesi.	a & Nyasaland
1. Midbody scale rows 30 or more; shout with a shar edge in adults, but rounded in juveniles Typhlo	ply angular
Midbody scale rows less than 30; snout rounded t	hroughout
2. Midbody scale rows 28; range Southern Rhodesia	
2. Midbody Scale rows 20; range Bouthern induesta ;	s delalandii Blind-Snake)
Midbody scale rows less than 28; range north of	
Widhody scale rows 22-262 midhody diameter into	

3. Midbody scale rows 22-26²; midbody diameter into total length 30-43 times; colouring as lineolate phase of <u>T.s.mucruso</u>; range N.Rhodesia (Kabompo to Abercorn)...<u>Typhlops p.punctatus</u> (Spotted Blind-Snake)

Midbody scale rows 22-24; midbody diameter into total length 44-76 times; colouring plumbeus above; range Nyasaland.....

Typhlops tettensis obtusus (Shire Blind-Snake)

Note. 2 Midbody scale counts much higher fourther north.



Fig. 1.



Fig. 2.

Leptotyphlops longicauda.

Leptotyphlops conjuncta.

LIBRARY SERVICE

The following Journals and papers are at present available to Full Members. Publications may be taken cut for up to 14 days on application to the Secretary.

"South African Snake Venoms and Antivenoms" - Christensen (SAIMR)

"Studies on the Venom of the "Boomslang" (<u>Dispholidus typus</u>)." - Grasset & Schaafsma (SAIMR)

"On the interrelation of the antigenic properties of snake venoms and its bearing upon the polyvalence and the assay of sera"
- Grasset (S.A.I.M.R.).

"Recherches sur le Venin et l'anavenin de la Vipere du Gabon (<u>Bitis gabonica</u>). Importance de l'introduction de son antigene dans la preparation du serum antivenimeux pour l'Afrique Equatoriale." - Grasset & Zoutendyk (S.A.I.M.R.)

"Methode rapide de preparation de serums antivenimeux polyvalents - antiviperides et Cobras - au moyen des anavenins formoles." - Grasset & Zoutendik (S.A.I.M.R.)

"Etude comparee sur l'immunite anti^{toxi}que chez les reptiles" -- Grasset (S.A.I.M.R.)

"On the Standardisation of African Viper (<u>Bitis arietans</u>) and Cape Cobra (<u>Naia flava</u>) Antivenenes." - Grasset (S.A.I.M.R.)

"Standardisation of the Cobra (<u>kaja flava</u>) Antibody." - Grasset.

"Sur la susceptibilite des Reptiles Sud-Africains aux venins de Viperides et Colubrides." - Grasset & Zoutendyk (S.A.I.M.R.)

"Sur le passage des antigenes et des anticorps dans les oeufs de Reptiles." - Grasset & Zoutendyk (S.A.I.M.R.)

"Clinical Experiments on the effect of African Snake Venoms on Human Cancer cases with or without concomitant deep therapy." - Ligneris & Grasset.

Standardisation of Cobra (Naja flava) Venom using the Graded Response Method." - Christensen & Finney.

"Concentration of Polyvalent African Antivenom Serum." - Grasset.

"The Antigenic Characteristics and Relationship of Viperine Venoms based on the cross neutralising action of Heterologous Anti-venomuos sera." - Grasset & Zoutendyk (S.A.I.M.F.)

"Studies on the Gaboon Viper (Bitis gabonica) and the preparation of a specific therapeutic antivenine." - Grasset & Zoutendyk.

"Anavenoms and their use in the preparation of antivenomous sera." 6 Grasset (S.A.I.M.F.)

"Hyperglycaemic action of Snake Venoms in relation to their toxic and antigenic properties." - Grasset & Goldstein (S.A.I.M.R.)

"African ild Life" (Wild Life Protection Society of South /frica) Volume 11. kos. 1,2 & 4. Volume 12. Nos. 1 & 2.

"Oryx" (Fauna Preservation Society) Vol. IV. No. 4.

British Journal of Herpetology (British Herpetological Society) Volume 2. Nos. 1 to 5.

CASE HISTORY OF AN ATRACTASPIS BIBRONIL BITE. By A.H.Siemers.

Saturday 14th July 6.00 p.m. Bitter by an unknown snake. 6.02 - First joint of forefinger swollen to about twice its normal size; has a puffed appearance and slightly blue in colour. No pain felt before, but a burning pain now appears and seems to increase in intensity. Wound or fang mark sucked by patient.

6.05 - Incision made over single fang puncture. About $\frac{1}{8}$ " deep and 4" long. Potassium permanganate crystals sprinkled in wound and immediately washed out with water. Pain has increased slightly and swelling is spreading to the hand. Snake suspected of being a Burrowing Adder.

6.08 - Snake identified as Burrowing Adder (Atractaspis bibroni).

6.15 - Arrive at hospital together with serum. Swelling has

spread to half way up the hand. 6.20 - 7 c.c. of serum injected into the muscle of the arm.

5 c.c. injected into the hand just above the swelling. 5 c.c.

injected into the thigh.

6.25 - Tourniquet applied in the form of blood pressure app.
on the upper arm. Kept at a pressure of 150 and released every
20 minutes for 3 minutes. This was kept on until 5.00 p.m. Put to bed.

8.00 Pain has now become considerable. Swelling has reached the wrist. Tourniquet removed.

9.30 Pain has become unbearable. Swelling has reached the elbow. 10.00 - Feeling ill and vomiting. Vomiting continued throughout the night until 10.30 a.m. next morning.

10.30 - Injection given to produce sleep, but has no effect. No sleep obtained until Sunday night when an injection was given and two hours sleep resulted.

Sunday 15th July Very uncomfortable day. Swelling up to the shoulder joint. Hand swollen to nearly three times its normal size. Pain very bad. Not able to keep any food or liquid down. Injection given at 9.30 p.m. Slept until 11.30 p.m., thereafter very uncomfortable and restless.

Monday 16th July Pain subsides quite a bit. Swelling remains the same.

Tuesday 17th July Swelling starts to subside slightly on the hand, but seems to increase on the arm. Elister appears on the site of the bite.

Wednesday 18th July Discharged from Hospital. Hand still very swollen. Temperature almost normal. Blister has increased considerably in size.

Thursday 19th July Blister about 1" x $\frac{1}{2}$ " x $\frac{1}{4}$ " lanced. No pus, but only water and blood.

- Saturday 21st July Swelling of arm and hand has gone down although still swollen. Finger still very much swollen. Big white patches, due probably to dead skin and otherwise still very inflamed. Still oozing blood.
- Monday 23rd July Finger shows first signs of improvement. Smelling has gone down slightly. Lips swelling and bumps appear on arm, probably due to serum reaction.
- Wednesday 25th July Finger stll seems to be improving, although certain patches have gone a greenish-blue colour, but this may be due to dead blood under the skin. Finger has been treated throughout with petroleum dressing only. Dry dressing now applied.
- Thursday 26th July Some improvement seems to be noticeable although the discolouration is spreading.
- Saturday 28th July Sling is taken off, although the finger is still quite swollen. Swelling on the hand has gone down quite a bit.
- Saturday 4th August Hand is almost back to normal, but the finger is still slightly swollen. The outer skin and flesh of the finger is hard and stiff and the finger can only be bent slightly and this bending is accompanied by some pain. Skin on hand and on part of the finger is starting to peel off.
- Saturday 11th August Finger still slightly painful especially to the touch. All movement in the first joint seemingly lost.
- Saturday 18th August Most of hard skin has peeled off finger. The finger has not yet returned to its normal size. All movement in first joint lost, second joint only has limited movement.

THE GENUS PHILOTHAMNUS IN RHODESIA AND NYASALAND. By D.G. Broadley.

Two species of <u>Philothamnus</u> are recorded from Rhodesia for the first time, following my examination of a collection made in the Mweru - Abercorn area of Northern Rhodesia by Monsieur H.J.Bredo, former Director of the International Red Locust Control Service at Abercorn. This therefore seems a good time to review the members of the genus found in Rhodesia and Nyasaland.

Philothamnus s.semivariegatus is distinguished from the other Green-Snakes by its strongly keeled ventrals and subcaudals. Although the Bush Snake is uniform green in some parts of its range, Rhodesian specimens invariably have black cross-bars on the anterior part of the body, which is blue-green like the head. The posterior portion of the body is usually bronze. The throat is bright yellow and the belly cream or light bronze. The scale counts are high - ventrals 169-209, subcaudals c.125 to 144. The tail is often truncated, and if the tip is lost early in life the terminal point is regene ated, leading to reports of snakes with lower subcaudal counts. This snake has the widest range, being found throughout the region under consideration. The largest recorded in Rhodesia was a female 1108 mm in length from Umshagashe River, S.Rhodesia.

Philothamnus hoplogaster is distinguished from the others by having only 8 upper labials, only two of which enter the eye. The normal colouring is grass green above and white below. Some specimens have up to a dozen black spots or blotches on the nape and anterior portion of the body. The head is small and rounded. Lepidosis - ventrals 145-161; subcaudals 77-103. This is the smallest of the local Green-Snakes, the largest on record for the region being only 720 mm from the Misuku Mountains in Lyasaland. The species has a wide range in Northern Rhodesia and Lyasaland. It is common in the Eastern Districts of Southern Rhodesia and most of Mashonaland. It is very scarce in Matabeleland, most of the area being too dry for it.

Philothamnus i. irregularis is a more robust snake than the last species. Like the Bush Snake, it has normally 9 upper labials, the 4th,5th and 6th entering the eye. It has a large, rather rectangular head and a bold eye with a golden iris. Rhodesian

specimens usually have numerous black edged scales on the anterior third of the body. Lepidosis - ventrals 147-179; subcaudals 94-121. Largest perfect specimen recorded - 1146 mm from Mount Silinda, S.A.

Philothamnus ornatus is easily recognised by a broad red-brown dorsal stripe, which is narrowly edged with yellow. It has black edged scales on the neck like <u>irregularis</u>. This species was treated as a race of <u>irregularis</u> by <u>Loveridge</u> in his Synopsis of the /frican Green Snakes. However both forms occur together around Lake Mweru and <u>ornatus</u> is readily separated by its fewer labials - 8, the 3rd,4th & 5th entering the eye and lower subcaudal counts. Lepidosis - ventrals 152-170; subcaudals 86-104. The head of <u>ornatus</u> is more rounded than that of <u>irregularis</u>. The largest of nine specimens from the Lake Mweru - Abercorn area of N.Rhodesia measured 777 mm. The species has also been recorded from Lealui and Serenje 777 mm. The species has also been recorded from Lealui and Serenje in N. Rhodesia. The only Southern Rhodesian specimen differs from the northern material in having 9 upper labials on one side and 10 on the other, with the 4th,5th & 6th entering the orbit. Further material is needed to show if the specimen is merely aberrant or if there is a recognisable southern race. I found this snake dead on the road at Reitfontein, Salisbury.

Philothamnus heterolepidotus looks at first sight like a much attenuated P.hoplogaster, for it has the same small rounded head and uniforn green dorsum and white belly. It differs in having 9 upper labials, the 4th,5th & 6th entering the eye. Lepidosis - ventrals 179-186; subcaudals 115-119. These figures are taken from the five specimens collected by Bredo in the Lake Mweru region of Northern Rhodesia. The largest measures 745 mm. This western species may turn up elsewhere along the border of the Congo Belge.

Key to the genus Philothamnus in Rhodesia & Nyasaland.

1. Subcaudals sharply angular, keeled like the ventrals; usually more than 130 pairs of subcaudals...<u>Philothamnus s.semivariegatus</u> (Variegated Bush-Snake)

Subcaudals rounded or angular, but not sufficiently angular to be called keeled; less than 130 pairs of subcaudals..........2

- 2. Usually 2 upper labials entering eye.... Philothamnus hoplogaster (Southeastern Green-Snake)
- 3. Usually 8 upper labials, the 3rd,4th & 5th entering the orbit;... (Ornate Green-Snake)
 - Usually 9 upper labials, the 4th,5th & 6th entering the orbit; . no brown dorsal stripe.....4
- 4. Ventrals 147-189; head large and broad; habit moderately robust. (Western Green-Snake)

(Slender Green-Snake)

HERE AND THERE.

UMVUMA - At Central Estates, Umvuma a large Psammophis s.sibilans disgorged a 26½ inch <u>Dendroaspis</u> p.polylepis after capture. The latter is now in the lational Museum collection. - D.S.Rider.

SALISBURY - The site for the Salisbury Snake Park, between the Motel and Lake McIlwaine, is now cleared. It is hoped that the Park will be open to the public about the middle of 1959. - F.M.Isemonger.

UMTALI - A fine specimen of the Blotched Tree-Frog (Hylambates maculatus) was taken under a boulder at Leopard Rock, Vumba Mountain on 14th July. This species had not previously been recorded from Southern Rhodesia. - D.G. Broadley.

FORT JAMESON - A File Snake recently brought in regurgitated a Dispholidus typus 4'4" in length. - V.J. Wilson.