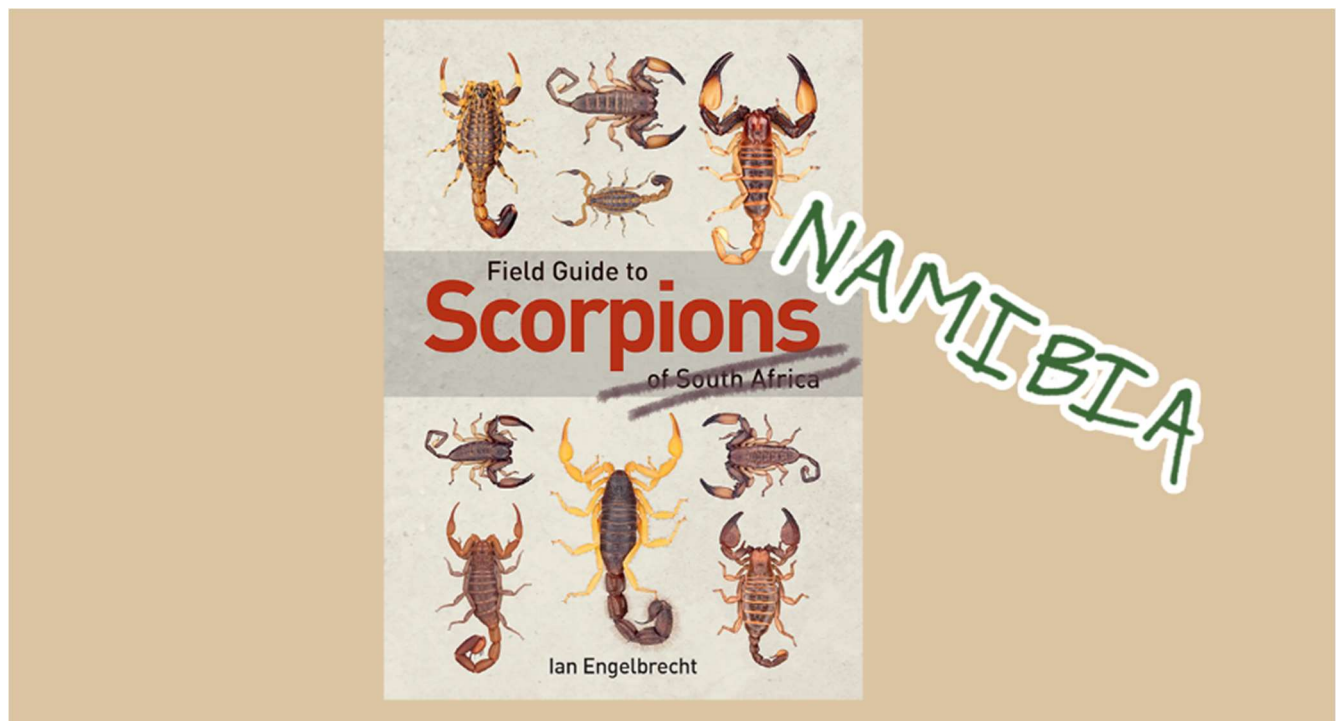


Field Guide to Scorpions of Namibia

A comprehensive guide to Namibia's scorpion fauna



Prepared for prospective project funders and partners
Project lead: Dr Ian Engelbrecht

Executive summary

The Field Guide to Scorpions of Namibia is a two-summer-season research, fieldwork and publishing project to produce a comprehensive and accessible guide to the country's scorpion fauna. The book will be modelled on the Field Guide to Scorpions of South Africa and published by Struik Nature, with the same emphasis on rigorous identification, high-quality photography, distribution mapping and practical field use.

The need is straightforward: there is currently no comprehensive identification guide to Namibian scorpions. Nearly 70 species are recorded from the country. Some are medically important, while many are unique, rare or restricted to small geographic ranges. For residents, visitors, field guides, health practitioners, naturalists and researchers, a modern identification resource would fill a significant information gap.

The aim is not simply to photograph one representative of each species. Wherever possible, the guide will illustrate adult males and females, colour and geographic forms, standardized grey-background views, natural-background images, diagnostic views, habitat and mapped distributions.

Funding is being sought to support fieldwork, equipment, and writing and editing time. This fixed scientific and photographic scope makes the project ambitious, with significant uncertainty in how much field effort will be required to achieve it. The aim is to raise N\$500,000 to cover all costs and expenses. Additional funds over and above this amount will be used for additional fieldwork and mapping, improved photographs, and research purposes.

Geographic focus	Fieldwork	Funding target	Publisher
Namibia	6–10 trips of about two weeks across two summer seasons	N\$500,000 fundraising target	Struik Nature

The project is partnered and permitted through the National Museum of Namibia in Windhoek. Fieldwork will also create lasting value beyond the book through new distribution records, carefully selected museum specimens where necessary, iNaturalist observations, skills sharing, identification training, public engagement and a stronger foundation for future scorpion research in Namibia.

The Namibian guide will follow the format and layout of the successful Field Guide to Scorpions of South Africa, produced by the same author and publisher. That precedent provides a practical model for the photographic standards, species accounts, maps, design workflow and publisher-author editing process required for the Namibian book.



Namibia has a high diversity of scorpion species, including numerous endemic and undescribed species.

Why this project matters

Namibia has an exceptionally interesting scorpion fauna, yet identifying species and understanding their distributions remains difficult for non-specialists and specialists alike. Existing records are unevenly distributed, some areas and habitats remain poorly surveyed, and several taxa are rare, variable or taxonomically challenging.

A guide will also have practical relevance because Namibia includes medically important scorpions. Better identification information can help people distinguish the species that warrant particular caution from the many species that do not pose any threat, while supporting more informed communication about scorpion stings and scorpion diversity.

This project will:

- Make reliable scorpion identification more accessible to naturalists, guides, researchers, conservation practitioners and the public.
- Bring together photographs, identification information, habitat context and distribution data in a single practical resource.
- Generate new occurrence data from targeted and exploratory surveys across Namibia.
- Strengthen local knowledge through field participation, identification courses, talks and guided activities.
- Provide a durable baseline for future taxonomic, ecological and conservation research.

The book

The intended product is a comprehensive field guide covering the scorpion species recorded from Namibia, with allowance for the reality that a very small number of exceptionally rare species may prove impossible to relocate. The photographic standard is deliberately demanding because the usefulness of a field guide depends on showing the variation that readers will encounter in the field.

- Adult male and female examples wherever obtainable.
- Standardized grey-background photographs for direct comparison between species.
- Natural-background photographs showing how animals appear in the field.
- Diagnostic views, including hands/pedipalps and undersides where useful.
- Coverage of important colour, geographic and morphological variation.
- Habitat photographs and distribution maps.
- Concise, field-oriented species accounts supported by specimen study and literature review.

Karasbergia methueni Hewitt, 1913

Dinky Thickettail

Pronunciation

MEH-yow-wee-eye

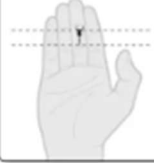
The name honours the British zoologist, Paul Ayskford Methuen, who worked with John Hewitt at the Transvaal Museum (now the Ditsong National Museum of Natural History) at the time.



MEDICAL IMPORTANCE

Of no medical significance to humans due to its small size; struggles to pierce human skin.

15–20mm



Rocky hillsides with sparse vegetation and granite geology, near Woodstock, Northern Cape.

A tiny, uniform pale yellow-brown scorpion with a very thick, smooth tail; occurs in the Northern Cape

Description: 15–20mm. Overall uniform pale yellow-brown; abdomen sometimes darker with narrow pale yellow bands where the tergites overlap. Pincers short. Tail very thick relative to the body; segments without keels, appearing smooth but covered with small, fine pits visible only on close examination. Subaculear tubercle absent.

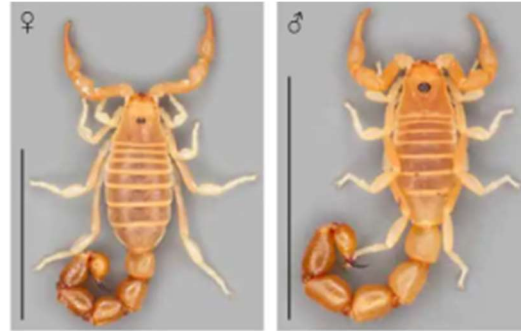
Sexual dimorphism: Sexes similar, but males matt in appearance, with a more slender abdomen. Females more shiny and broader across the abdomen.

Distribution: Bushmanland, northern parts of the Great Karoo and western parts of the Kalahari region in the Northern Cape. The range extends into southern Namibia.

Habitat: Primarily along drainage lines, alluvial flats and vegetated pans but also on rocky flats and at the base of hills. Prefers areas with sparse vegetation.

Behaviour: During the day, retreats into small holes and the burrows of other animals, often around vegetation. Wanders slowly on the surface at night, and can be seen in high densities under the right conditions. Sometimes climbs into low vegetation in search of prey. Moves confidently with the tail held high over the back, giving the impression of being imperious, despite its very small size. When disturbed, it characteristically stops and waves its tail from side to side above the body. Unlike *Uroplectes* species, it is not able to run fast.

Similar species: May be confused with other small buthids, but the very thick tail and uniform coloration are distinctive. Bears a remarkable resemblance to the East African and Middle Eastern genus *Orthochinus* and may be a relic of a prehistoric arid corridor between eastern and south-western Africa.



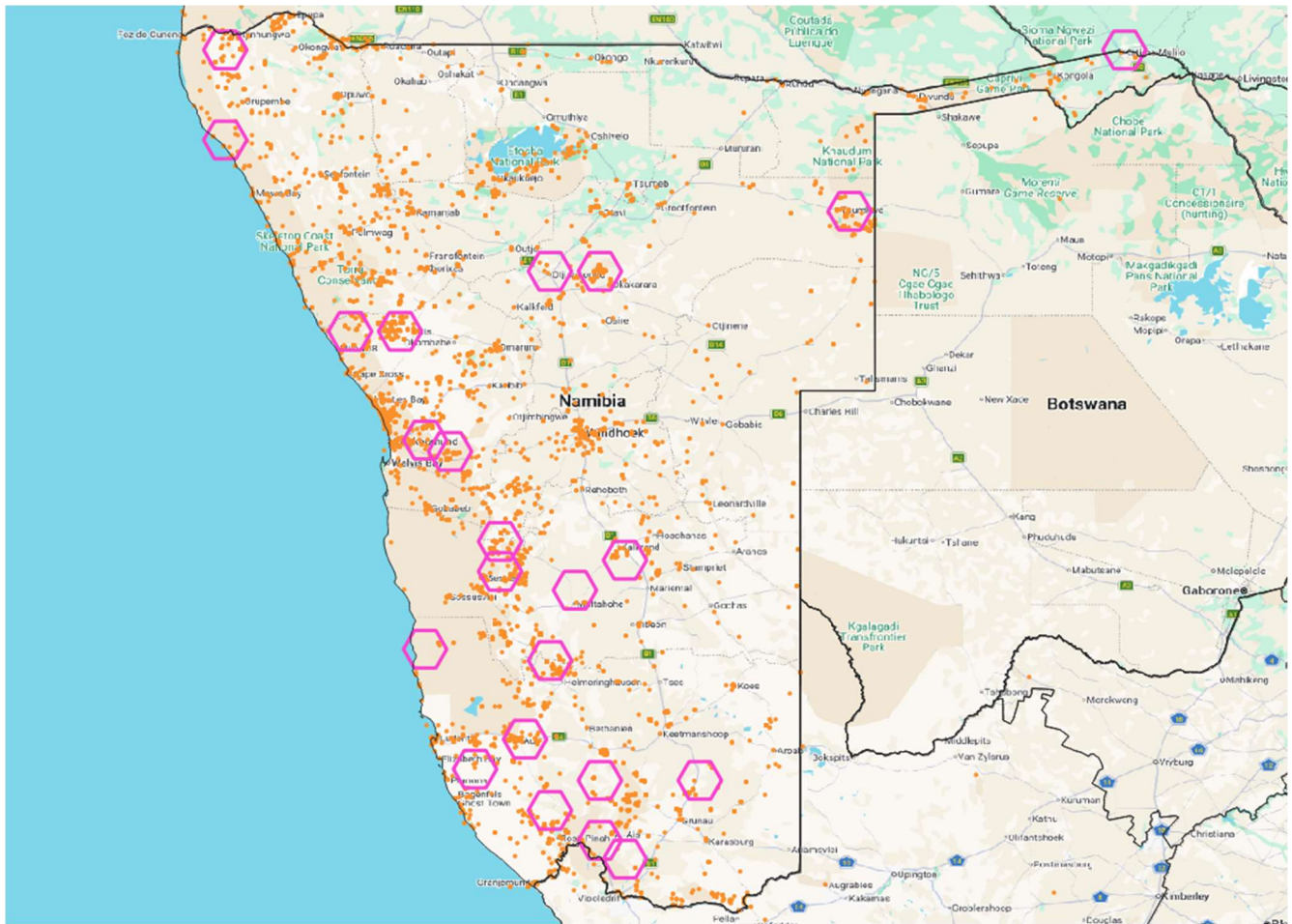
The Namibian guide will follow the proven format and photographic approach of the South African field guide.

About the author

Dr Ian Engelbrecht is an expert on southern African scorpions and mygalomorph spiders (baboon and trapdoor spiders). He has worked for several scientific and biodiversity organisations in South Africa, as well as the private sector. He authored *A Field Guide to South African scorpions*, published by Struik Nature, in 2023. His expertise also extends to biodiversity conservation more broadly, natural history collection management, and biodiversity informatics. He obtained his PhD through the University of Pretoria. He is undertaking this project in partnership and affiliation with the National Museum in Windhoek.

A targeted fieldwork strategy

Fieldwork is being planned from existing museum and citizen-science distribution data rather than by simply travelling widely and hoping to encounter the required species. Museum and iNaturalist records are mapped in a GIS, summarized within overlapping spatial grids, and analysed to identify a minimum set of areas capable of covering the greatest number of target species. These results are then refined using expert knowledge, logistics, access, habitat information and known gaps.



*GIS-based site prioritisation focuses effort on areas most likely to deliver required species while retaining opportunities for exploratory survey.
Known scorpion records (orange) and priority sampling areas (purple grids)*

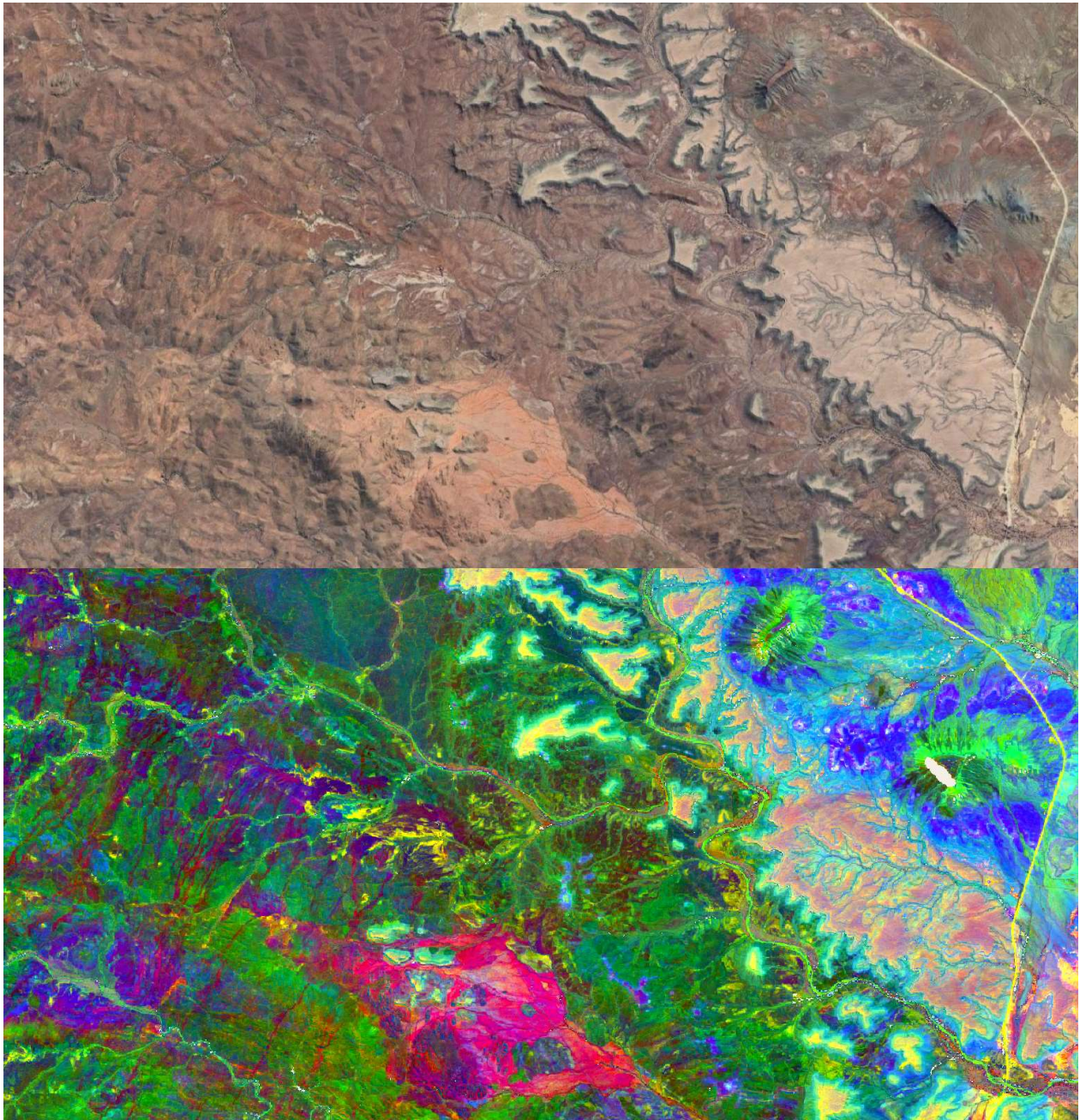
The field programme is divided into geographic blocks across the Namibian summer. Within those blocks, routes remain deliberately flexible. Satellite imagery and satellite-derived geological mapping are used to identify contrasting habitats, isolated geological features, dune systems and other promising survey locations.

Working with weather, not against it

Scorpion activity is strongly influenced by environmental conditions. Daily soil-moisture information and recent rainfall patterns derived from NASA satellite imagery will be monitored during fieldwork. Surveys can be redirected towards areas where recent rain is likely to have improved activity, while areas experiencing active rainfall can be allowed time to dry before being revisited. Night work is concentrated around the darker part of the lunar cycle (new moon), when UV-light searching is most productive.

What fieldwork actually involves

An expedition typically uses one vehicle and a small team of one to three people. Days are used for photography, habitat reconnaissance, burrow searching, travel, supplies and discussions with landowners. Several promising night-survey sites are identified in advance. UV-light surveys generally begin around 20:00–21:00 and may continue until 01:00–02:00. Camping at the final survey site reduces unnecessary night driving.



Habitat reconnaissance makes use of Google Satellite imagery (top) and geology maps derived from Sentinel2 imagery (bottom).

The central lesson from producing the South African field guide is that this work cannot be rushed. A rigid itinerary can cause important targets to be missed. The more effective approach is to spend enough time to understand an area, but move on quickly when conditions are poor. Unexpected discoveries can justify extending a stay; rain, vehicle problems, illness or equipment failure can require immediate changes of plan. Flexibility is therefore an operational requirement, not a lack of planning.

Data, specimens and scientific legacy

Each survey site is documented with locality, coordinates, dates, habitat, conditions, species observations and photographs. Distribution records will be loaded to iNaturalist to be available to the wider public and scientific communities. Physical specimens will be collected sparingly and only where they add clear scientific value—for example, an unexpected species, an unusual form, a difficult identification, or material

required for DNA-based research. Specimens collected under the project will be deposited in the National Museum of Namibia.

Skills sharing and public engagement

The project is designed to leave more than a publication behind. Namibian participants will be invited to join fieldwork and learn the practical process of reading landscapes, selecting survey sites and locating scorpions. Identification courses in collaboration with the museum will provide microscope-based training for difficult species. Public talks, walks and engagement with tourism guides will broaden the reach of the work.

- More skilled local scorpion observers and enthusiasts.
- A substantial increase in openly accessible occurrence records.
- Improved capacity to recognize medically significant and difficult species.
- New research questions and potential material for taxonomic and genetic work.
- A stronger knowledge base for biodiversity education, tourism and conservation.

Project leadership and partnerships

The project is led by Dr Ian Engelbrecht, a biologist with postgraduate training in conservation biology and a PhD from the University of Pretoria. His experience spans arachnid taxonomy, biodiversity collections, conservation and biodiversity-data systems. He is the author of Field Guide to Scorpions of South Africa.

The project is partnered and permitted through the National Museum of Namibia, whose arachnology collection will receive voucher material collected where necessary. A growing network of Namibian naturalists, researchers, conservation organisations, tourism partners and other supporters is contributing local knowledge, access, logistics, publicity and field assistance.

Funds will be managed through the Ubuntu Wildlife Trust, a registered NGO in South Africa. A Namibian based NGO partner is also being sought.

Work programme

Phase	Principal activities	Output
Planning & preparation	Distribution-data compilation; georeferencing; GIS prioritisation; permits; logistics; equipment; access.	Prioritised target areas and expedition plans
Summer field season 1	Major targeted expeditions; photography; occurrence recording; exploratory survey; specimens where justified.	Majority of photographic and distribution targets
Inter-season work	Image processing; specimen work; literature review; gap analysis; writing; refinement of target list.	Draft content and clear list of remaining gaps
Summer field season 2	Revisit missed targets; seek rare species/forms; fill geographic and	Completion of fieldwork to greatest practicable extent

	photographic gaps.	
Manuscript & editing	Species accounts; maps; image preparation; complete manuscript; publisher editing and author revisions.	Publication-ready manuscript
Publication	Design and production by Struik Nature; sponsor fulfilment and distribution.	Field Guide to Scorpions of Namibia, aiming for mid-2028

Funding requirement

The project is seeking N\$500,000 in funding to cover base fieldwork, equipment, and writing time. Fieldwork success cannot be reduced to a fixed number of trips: if a target species is missed, another visit may be necessary; if a rare or unexpected form is found, additional work may be justified. The project therefore needs sufficient flexibility to pursue the defined outcome rather than stop when an arbitrary trip count has been reached.

Funding supports the following broad cost areas:

- Six to ten field expeditions of approximately two weeks each across two summer seasons.
- Fuel, vehicle-related field costs, camping and field subsistence.
- Specialist field, photographic and supporting equipment.
- Living and subsistence costs between expeditions while working in Namibia.
- Fieldwork planning, data management, image processing, specimen study, research and writing.
- The substantial author time required during the publisher's editing and production process.
- Copies of the finished book supplied as crowdfunding and sponsorship rewards.
- Administrative, banking and unforeseen project expenses.

The project funding amount is not fixed. Additional funding has direct scientific value. It can provide more time to complete the work, support field participation by others, extend surveys into poorly known areas, and potentially enable complementary research such as DNA sequencing in difficult species groups.

Sponsorship and recognition

The fundraising strategy combines corporate sponsorship with a public crowdfunding campaign. The intention is to make one strong fundraising push rather than repeatedly returning to supporters to request additional funds.

The project website provides a public information hub for prospective supporters, including the project rationale, sponsorship information, species information, contact details and a live funding tracker. This gives funders and members of the public a simple way to follow progress and direct others to a single authoritative source for the project.

Support level	Recognition / reward described in the presentation
Project backer (N\$100+)	Entry-level contributions support the work; a digital high-resolution scorpion image and thank-you are offered.

Standard book (N\$450+)	A contribution approximately equivalent to the retail price acts as a pre-order, with part of the contribution supporting the project.
N\$1,000+	A copy of the book plus acknowledgement as a project supporter in the book.
N\$2,500+	A special sponsor's edition with a signed, numbered tip-in acknowledgement page.
Corporate sponsorship from N\$25,000	Logo recognition in the book (including the imprint page and back cover) plus 10 copies.
Major contributions above R100,000	Option for a dedicated page carrying a short message about the sponsor's biodiversity or conservation contribution.

Book shipping is not included in these contribution values. Distribution points are planned so supporters can collect copies or arrange onward courier delivery without project funds being absorbed by shipping costs.

Why support Scorpions of Namibia?

Support for this project enables a concrete, durable outcome: a professionally published field guide backed by original fieldwork, new biodiversity data and specialist expertise. At the same time, the work builds local knowledge, strengthens museum and citizen-science records, supports public education and creates a platform for future research.

The project already has substantial planning behind it, a proven publication model, an established publisher, a museum partnership and a network of people in Namibia willing to assist with access, logistics, outreach and fieldwork. Funding is the key resource needed to convert that preparation into sustained field effort and, ultimately, the completed book.

Contributing and contact information

The general public can contribute to the project through the crowdfunding platform [ThundaFund.africa](https://thundafund.africa) (or try bit.ly/nam-scorp).

The project website is namibiascorpions.net.

Corporates interested in sponsorship can contact the author, Ian Engelbrecht, on info@namibiascorpions.net

A recording of an online presentation by the author about the project is available at bit.ly/nam-scorp-talk (45mins).