
THE DENTIST BIRD: THE EGYPTIAN SPUR-WINGED PLOVER

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ABSTRACT

The ancient Egyptians knew many different types of birds. They represented them on the walls of their tombs in different contexts and with various roles. Among these types of birds is the Spur-Winged Plover that is known by a number of titles in ancient Egypt and in the writings of Greek historians and travelers, as well as in Islamic writings, and a title that has become famous recently, which is (the dentist bird). The research aims to study and discuss this type of bird, its species, its characteristic natural features, its common name and titles in ancient and modern times, and its depiction or mention in the ancient Egyptian scenes or inscriptions. The research employs the descriptive and analytical methodology for the discussed scenes and collected data to achieve the aimed results of the study. One of the main results of the study is that the bird was known in Egypt since the Prehistoric Periods, as a domestic avian remain.

KEYWORDS: Plover; Spur-Winged; Bird; Crocodile; Servant; Dentist.

I. INTRODUCTION

The Nile Valley is rich in different Egyptian species and types of birds. One of these types of birds is the plover family (the Charadriidae) that is identified as shore birds having various short legs, compact bodies with rapid flight, or long legs and rounded wings that beat in an irregular rhythm. It inhabits aquatic margins or grasslands.¹ Plovers possess formidable weapons in the shape of strong, short beaks, strong legs, and occasionally bony protrusions or spurs on their wings.²

The plover family includes many species of plover birds; the spur-winged plover, the sociable plover, the white-tailed plover, the black-headed plover, the golden plover, the grey plover, the large sand plover, the Mongolian sand plover, the African sand plover, the Kentish plover, the

¹Stronach, N. (2003). *Checklist of the Birds of Selous Game Reserve*. Tanzania Wildlife Discussion Paper No. 35. Wildlife Division. Deutsche Gesellschaft für Technische Zusammenarbeit. GTZ Wildlife Programme in Tanzania. Dar Es Salaam. 11.

² Ferns, P. N. (2003). Plumage colour and pattern in waders. *Wader Study Group Bull* 100.126.

greater ringed plover, the middle ringed plover, and the little ringed plover. The degree of spread and occurrence of the mentioned various species of the plover family varies from the most common to the very rare species. The most common species everywhere are the green plover (Lapwing), Kentish plover and the little ringed plover. The common species but not everywhere are the spur-winged plover and the middle ringed plover as well but in Delta. The not common species are the white-tailed plover, the golden plover, the African sand plover, and the black-headed plover that is spread in Upper Egypt. The large sand plover is only seen on the sea-coast. The rare species are the sociable plover, the grey plover and the greater ringed plover, while the very rare species is the Mongolian sand plover.³ The ancient Egyptian bird fowl and catch bag included large numbers of wading birds, such as members of the plovers. They all occurred in regions with shallow water, thus indicating that the ancient Egyptians became skilled very early in exploiting the abundant resources in the Delta region throughout the year, relying on their availability. Plovers are one of the small wading bird group that are among the 103 different species of birds identified by Egyptologists and Ornithologists in the ancient Egyptian art (The birds listed in the hieroglyphic system are not included) (Fig.1).⁴

Terrestrial Birds (3) <ul style="list-style-type: none"> •Ostrich •Bustards 	Water Birds (9) <ul style="list-style-type: none"> •Grebes •Pelicans •Cormorants •Finfoot •Terns 	Large Wading Birds (20) <ul style="list-style-type: none"> •Herons •Egrets •Ibises •Spoonbill •Flamingo 	Small Wading Birds (9) <ul style="list-style-type: none"> •Snipe •Avocet •Plovers •Sandpipers 	Waterfowl (21) <ul style="list-style-type: none"> •Swans •Geese •Ducks 	Rallidae (4) <ul style="list-style-type: none"> •Coot •Gallinules •Moorhen
Kingfishers (5) <ul style="list-style-type: none"> •Hoopoe •Roller 	Passerines (11) <ul style="list-style-type: none"> •Wagtail •Redstart •Oriole •Shrike •Sparrows 	Birds of Prey (9) <ul style="list-style-type: none"> •Eagles •falcons •Hawks •Kite •Osprey 	Galliforms (4) <ul style="list-style-type: none"> •Guineafowl •Quail •Red Jungle fowl •Peacock 	Doves and Pigeons (3) <ul style="list-style-type: none"> Cuckoos (2) Owls (3) 	Vultures (1) <ul style="list-style-type: none"> Cranes (4) •Storks (3) Sandgrouse (1)

Fig. 1: Avian groups of the identified species of birds with its number (Designed by the Researcher)

³ Whymper, Ch. (2022). *Egyptian Birds: For the most part seen in the Nile Valley*. London. 111-212.

⁴Bailleul-Lesuer, R. F. (2016). *The Exploitation of Live Avian Resources in Pharaonic Egypt: A Socio-Economic Study*. A Dissertation Submitted to the Faculty of the Division of the Humanities in Candidacy for the Degree of Doctor of Philosophy. Department of Near Eastern Languages and Civilizations. The University of Chicago. Chicago. 111, 132.

The avian groups in Fig.1 that are primarily found near or on water are the water birds, the waterfowl, the Rallidae, kingfishers, and the large and small wading birds including plovers. Many of these birds were depicted in the ancient Egyptian marsh scenes living among the thick papyrus thickets that serve as backgrounds for the different activities occurring in the marshes. They were represented perching, nesting, feeding and protecting their young.⁵

One of the small wading plovers included in the identified avian groups is the spur-winged plover that is the main subject of the research.

The interactions of the plovers with water differ; some are more terrestrial and eat in the floodplain, while others are active feeders in shallow waters. Only 8 species can be regarded as permanent residents of the Nile region (Fig.2), despite the fact that about 15 species are more or less aquatic. The Spur-winged Plover, the focus of the study, is the most common and plentiful resident.⁶

	Uganda	Kenya	Ethiopia	Sudan	Egypt
<i>Charadrius pecuarius</i> – Kittlitz’s Plover	+	+	+	+	+
<i>C. tricoloris</i> – Three-banded Plover	+	+	+	+	-
<i>C. alexandrinus</i> – Kentish Plover	vagr	WV	+	WV	+
<i>C. marginatus</i> – White-fronted Plover ^a	WV	(+)	+	-	-
<i>Vanellus senegallus</i> – Wattled Lapwing	+	+	+	+	-
<i>V. albiceps</i> – White-headed Plover ^b	-	-	-	+	-
<i>V. spinosus</i> – Spur-winged Plover	+	+	+	+	+
<i>V. crassirostris</i> – Long-toed Plover	+	+	+	+	-

Fig. 2: Permanent resident plovers of the Nile region
(Source: Green, J. (2009). Birds of the Nile. 711. Table 11.)

II. OBJECTIVES OF THE STUDY

- (a) To identify the species of the spur-winged plover and its natural features.
- (b) To find the main characteristics and differences of the natural features of the bird.
- (c) To highlight the main areas of the bird presence in Egypt.
- (d) To indicate the earliest evidence of the bird presence in Egypt.
- (e) To discuss the characteristic habits of the spur-winged plover.
- (f) To discuss the names and titles of the spur-winged plover from ancient to modern times, and their significance.

⁵ Bailleul-Lesuer, R. F. (2016). *The Exploitation of Live Avian Resources in Pharaonic Egypt*. 132.

⁶ Green, J. (2009). Birds of the Nile. In *The Nile: Origin, Environments, Limnology and Human Use*. Dordrecht: Springer Netherlands.714.

- (g) To examine the ancient Egyptian evidences of daily life scenes that depict the bird and indicate the main context of the scene.
- (h) To indicate the earliest mention or depiction for the spur-winged plover in ancient Egypt.

III. METHODOLOGY

The research employs a descriptive and analytical methodology for the discussed scenes and data to achieve the aimed results of the study.

IV. DISCUSSION AND RESULTS

THE IMPORTANT AREAS OF THE SPUR-WINGED PLOVER IN EGYPT

The spur-winged plover is a breeding resident bird in Egypt. It is very common around the agricultural land. It is considered a beneficial bird species that resides in abundance only in the spring and winter seasons.⁷ It was among the domestic avian remains recovered at the Prehistoric site (El Omari)⁸ that was occupied during the Neolithic period.⁹ It is one of the distinguished birds of the Nile Valley, Delta, and the 6 major Egyptian inland wetland areas; the Bitter lakes in Ismailiya governorate, Wadi El Natron, Wadi El Rayan Lakes, and Lake Qaron in El Faiyum governorate, the Nile River, and Lake Nasser in Aswan.¹⁰ South of Cairo this bird is found along the Nile through Upper Egypt, Lower Nubia, Dongola, and Berber to Khartoum, on the Blue Nile, and on the White Nile and its tributaries.¹¹

The spur-winged plover is a prominent one of 35 species are known to breed in Lake Burullus protected area in Kafr El Sheikh governorate, as well as in Lake Manzala (about 300 pairs breeding), which is situated in the north-eastern corner of the Nile Delta and is considered to be; the largest of Egyptian Mediterranean wetlands, the most productive lake, most important wetland for wintering water birds, and also one of the most important breeding areas in the entire Western Palearctic region.¹² Other

⁷Miles, J. (1998). *Pharaoh's Birds a guide to ancient and present-day birds in Egypt*.16, 141.

⁸ El Omari is situated at the mouth of Wadi Hof, about 3 km north of Helwan, and 4 km from the modern course of the Nile (Kumar, K. (2021). Archaeological Landscape of the Nile Valley Civilization in Early Egypt. *International journal of Social Sciences & Interdisciplinary Research*. Volume 10. Issue 2. 12).

⁹ Bailleul-Lesuer, R. F. (2016). *The Exploitation of Live Avian Resources in Pharaonic Egypt*. 552, 558.

¹⁰ Baha El Din, S. M. (1999). *Directory of important Bird Areas in Egypt*. The Palm Press. Cairo.15, 17.

¹¹ Flower, M. S. (1933). II.—Notes on Some Birds in Egypt. *Ibis*, 75(1), 44-45.

¹² Baha El Din, S. M. (1999). *Directory of important Bird Areas in Egypt*.47-48, 51.

areas of breeding include Wadi El Natron and Lake Qaron in El Faiyum governorate (about 150 pairs of the spur-winged plover breeding in each area),¹³ Lake Nasser and Aswan Reservoir that is located between the Old Aswan Dam and the High Dam.¹⁴

THE BIRD DISTINCT APPEARANCE AND LIFE STYLE

The spur-winged plover (Fig.3) has a characteristic proportions; the black crown, throat, chest, tail, bill, and legs, the light brown wings and back, red eye and black iris, and the white cheek.¹⁵ It is the only species of plover birds that has not a crest.¹⁶ A prominent characteristic that gives rise to its name is a tiny claw or spur hidden inside each wing, an element that contributes to its distinct appearance.¹⁷ The spur-winged plover use these wing spurs in defense against potential threats to its young.¹⁸ Its nest is a simple hole in the cultivated land, using the plant as its natural shelter.¹⁹ It lays three or four eggs that are similar to the common Green Plover or Lapwing.²⁰



Fig. 3: The spur-winged plover in nature

(Source: <https://animalia.bio/spur-winged-lapwing>. Last accessed in 16 August at 7:05 PM)

¹³ For more details on the bird diversity in Lake Qaron see: El Sayed, S. Y., Kadry, M. A., & Sheta, B. M. (2024). Temporal and Spatial Variation in Avian Diversity at Lake Qaroun, Egypt. *Egyptian Journal of Aquatic Biology & Fisheries*, 28(1).

¹⁴ Baha El Din, S. M. (1999). *Directory of important Bird Areas in Egypt*. 55, 59, 61, 64.

¹⁵ Houlihan, P. F. (1988). *The Birds of Ancient Egypt*. The American University in Cairo Press. Egypt. 96.

¹⁶ Lock-Cornelisse, E. (2014). Old Kingdom, New Birds: Birds in the Marshland Scenes of Old Kingdom Elite Tombs. 16.

¹⁷ <https://app.birda.org/species-guide/6421/Spur-winged-Lapwing>. Last accessed in 16 August at 7:05 PM.

¹⁸ Whymper, Ch. (2022). *Egyptian Birds: For the most part seen in the Nile Valley*. 114.

¹⁹ Abd-Allaha, G. A., Seragb, M. S., El Bakarya, N. E. R., & Habiba, S. G. (2012). Biotic Relationships between Plants and Birds at Damietta Coastal Area, Egypt. *Scientific Journal for Damietta Faculty of Science I*. 99. Table 5.

²⁰ Whymper, Ch. (2022). *Egyptian Birds: For the most part seen in the Nile Valley*. 114.

THE BIRD CHARACTERISTIC HABITS

The spur-winged plover usually feeds on leeches, insects, plants, as well as invertebrates that it picks up from the ground.²¹ The spur-winged plover is distinguished by a natural behavioral characteristic; It frequently visits the Nile crocodiles' mating and bathing areas, where the birds coexist peacefully with the crocodiles that always suffer from *Placobdella* leeches and increasingly infected them the longer they live.²² It was commonly believed that the relationship between the bird and the crocodile was a prime example of animal symbiosis or mutualism interaction, in which each benefited the other.²³

It is believed that there is another species of the plover family has the same natural behavioral characteristic of the spur-winged plover. It is the black-headed plover (Fig.4), which is a very rare visitor seen close to the Egyptian boundaries. It was a common breeder alongside the Egyptian Nile up to the 19th century.²⁴ It currently lives only in the sub-Saharan Sahel region of North Africa from the Atlantic Coast right through Sudan and Ethiopia to the Red Sea.²⁵



Fig. 4: The black-headed plover in nature

(Source:<https://www.facebook.com/p/Wildlife-Cultures-Tourism-100064024291027/>; <https://animalia.bio/black-headed-lapwing>. Accessed in 22 August 2024 at 11:00 PM)

THE BIRD STATUS IN RED LIST CATEGORY

²¹ Taki-El-Deen, F. M. A. (2017). Histological and Histochemical Studies on the Alimentary Canal of Spur-Winged Lapwing *Vanellus Spinus*. *The Egyptian Journal of Hospital Medicine*. Vol. 67(1). 314.

²² Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 361.

²³ Mahmoud, S. Y. M. (2017). *Interaction between Birds and Animals in Egyptian Art. "from the Old Kingdom to the End of the Middle Kingdom"*. Master Degree Thesis. Faculty of Tourism and Hotels. Minia University.

²⁴ Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 361.

²⁵ Bailleul-Lesuer, R. F. (2012). *Between Heaven and Earth Birds in Ancient Egypt*. The Oriental Institute of the University of Chicago.142.

The spur-winged plover is considered to be (Least Concern) in the IUCN Red List Categories (Fig.5). It has an extremely large range. It does not qualify for the classification of Critically Endangered or Vulnerable. It is included among the widespread and abundant species.²⁶

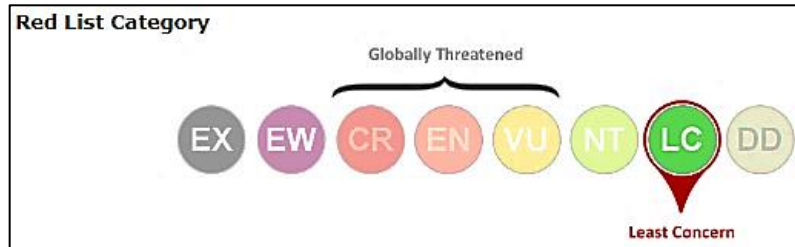


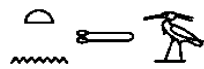
Fig. 5: The spur-winged plover status in the IUCN Red List Category (Source:<https://datazone.birdlife.org/species/factsheet/spur-winged-lapwing-vanellus-spinosus> in 24 August 2024 at 6:30 PM)

The main threats that may affect the bird's presence are the loss of natural and semi-natural habitat in swamps and fowling pressure.²⁷

THE BIRD NAMES AND TITLES

FIRSTLY NAMES

The ancient Egyptian name of the spur-winged plover is *tnt*



.²⁸ The Scientific name is *Vanellus spinosus* [American nomenclature], Synonyms [British nomenclature]: *Hoplopterus spinosus*.²⁹ The English name spur-winged plover or spur-winged lapwing.³⁰ In Arabic, its name is (Alqatqat شوكي الجناح), (Saqsāq

²⁶ The IUCN Red List Categories are an objective and widely accepted system for classifying species at high risk of extinction. Bird Life International (2024) Species factsheet: Spur-winged Lapwing *Vanellus spinosus*. Downloaded from <https://datazone.birdlife.org/species/factsheet/spur-winged-lapwing-vanellus-spinosus> in 24 August 2024 at 6:30 PM.

²⁷BirdLife International (2024) Species factsheet: Spur-winged Lapwing *Vanellus spinosus*. Downloaded from <https://datazone.birdlife.org/species/factsheet/spur-winged-lapwing-vanellus-spinosus> in 9 September 2024 at 11:00 PM.

²⁸ Wb 5, 313.7; Faulkner, R. O. (1991). *A Concise Dictionary of Middle Egyptian*. Griffith Institute Ashmolean Museum. Oxford. 300.

²⁹HBW and Bird Life International (2024). Handbook of the Birds of the World and Bird Life International digital checklist of the birds of the world. Version 8.1. Available at: http://datazone.birdlife.org/userfiles/file/Species/Taxonomy/HBW-BirdLife_Checklist_v81_Jan24.zip.

³⁰Hayman, P. , Marchant, J. , and Prater, T. (1986). *Shorebirds. An Identification Guide to the Waders of the World*. Christopher Helm. London.261.

(سقساق), or (Alziqzaq Albaladi الزقراق البلدي).³¹ The city of Zagazig in lower Egypt is said to have taken its name from this bird, which the Delta farmers call (zic-zag), plural (zic-a-zag).³²

Trochilos (meaning Runner and thistle bird)³³ is a Latin name (τροχίλος ancient Greek) attached to three different birds: the spur-winged plover, the black-headed plover, and the Winter Wren.³⁴ The Greek historian Herodotus was the first to describe the Egyptian plover (either the black-headed plover or the spur-winged plover) by the name Trochilos in the 5th century B.C.(Historiae, II, 68):³⁵

"Ἄτε δὴ ὧν ἐν ὕδατι δίαιταν ποιεύμενον, τὸ στόμα ἔνδοθεν φορέει πᾶν μεστὸν βδελλέων. Τὰ μὲν δὴ ἄλλα ὄρνεα καὶ θηρία φεύγει μιν, ὁ δὲ **τροχίλος** εἰρηναῖον οἱ ἐστὶ ἄτε ὠφελεομένῳ πρὸς αὐτοῦ· ἐπεὰν γὰρ ἐς τὴν γῆν ἐκβῆ ἕκ τοῦ ὕδατος ὁ κροκόδειλος καὶ ἔπειτα χάνη (ἔωθε γὰρ τοῦτο ὡς ἐπίπαν ποιέειν πρὸς τὸν ζέφυρον), ἐνθαῦτα ὁ **τροχίλος** ἐσδύνων ἐς τὸ στόμα αὐτοῦ καταπίνει τὰς βδέλλας· ὁ δὲ ὠφελεύμενος ἡδέεται καὶ οὐδὲν σίνεται τὸν **τροχίλον**".

*"Since it lives in the water, its mouth is all full within of leeches. All birds and beasts flee from it, except only the **trochilus**, with which it is at peace, because this bird does the crocodile a service; for whenever the crocodile comes ashore out of the water and then opens its mouth (and this it does for the most part to catch the west wind), the **trochilus** goes into its mouth and eats the leeches; the crocodile is pleased by this service and does the **trochilus** no harm".*

This description refers to the relation between the Egyptian plover and the Nile crocodile. The historian Aristotle added that once the bird had cleaned the crocodile's teeth, the crocodile gestured with its head for the bird to leave.³⁶

SECONDLY TITLES

– The Crocodile Bird or Crocodile Plover:

³¹ Omar, M. M. (2019). Studies on some harmful and beneficial bird species in newly reclaimed areas in Sohag Governorate. *Al-Azhar Journal of Agricultural Research* V. (44) No. (2). 187-193.

³² Flower, M. S. (1933). II.—Notes on Some Birds in Egypt. *Ibis*, 75(1), 44.

³³ Mynott, J. (2018). *Birds in the Ancient World Winged Words*. Oxford University Press.193, 394.

³⁴ Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 308; Jobling, J. A. (2010). *The Helm Dictionary of Scientific Bird Names*. London. 391.

³⁵ Prada, L. (2022). The Ancient Egyptian Origin of a Transcultural Trope, across Classical, Islamic, and Jewish Traditions. The First Attestation of the Crocodile Bird in Egyptian, or Why Herodotus Is Not a Liar (with the First Edition of P. Vienna D 6104). *ZAS* 150(1).105.

³⁶ Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 361.

Both birds (the black-headed plover and spur-winged plover) were seen near Nile crocodiles. They are still known to be particularly associated with Nile crocodiles as crocodile birds.³⁷ They are also unique in the way they care for their eggs the same way that crocodiles do. They lay them on the bank of a river, actually burying them under a thin layer of sand. The Crocodile Bird is a distinct wader. It is described as a little African courser that runs quickly and resembles a plover. It usually inhabits open land in Asia and Africa. Greek and Latin literature is very rich in examples of the Crocodile Bird.³⁸ Even now, the crocodile birds are still very popular.

– The Crocodile Servant:

The plover bird (either the black-headed plover or the spur-winged plover) performed a service for the Nile Crocodiles by entering their open mouths as they lie on the shore and eating the leeches from inside their jaws.³⁹ The title Crocodile Servant *b3k-msh* is mentioned in P. Vienna D 6104 (Fig.6), which includes a section of the dream book that lists dreams about birds. Nearly all of the birds' names are readable despite the fragment's terrible condition; they are a dove, a hoopoe, a goose, a hen, a vulture, a kite, the *ibnini*- and *nyny*-birds, and the Crocodile Servant bird.⁴⁰

³⁷ Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 150.

³⁸ Prada, L. (2022). The Ancient Egyptian Origin of a Transcultural Trope. 106, 120.

³⁹ Houlihan, P. F. (1988). *The birds of ancient Egypt*. 97.

⁴⁰ P. Vienna D 6104 is a small fragment of a Demotic papyrus, measuring only 7.6 x 4.5 cm (height by width). It has a blank back and the remnants of 14 lines of a demotic inscription etched on one side. It originally comes from the Faiyum, where it was probably kept in the library of one of the Egyptian temples. Based on paleographical evidence, it may be roughly dated to the second century CE. It is now preserved in the collection of the Österreichische Nationalbibliothek at Vienna (Prada, L. (2022). The Ancient Egyptian Origin of a Transcultural Trope. 115).

Table 1: Compared writings of <i>bik</i> and <i>msb</i> in the Vienna manuscript.		P. Vienna D 6104: Transliteration and Translation	
	<i>bik</i>	<i>msb</i>	
P. Vienna D 6104, l. x+12			x+1. n]r'y(?) 'P[w]f' [r] 'ir nb n' A vul]ture(?): he wi[ll] become owner of ... [..]
P. Vienna D 6644, col. x+2/35 (bik) and 30 (msb)			x+2. tr]t(?) r s-hm.t rm]t(.t)-'3.t r ti 'n-f nke' [..(?) A ki]te(?): a rich woman will give him property [..(?)
			x+3. ...] . lw=w r ms n-f 'sr lw'z'f r 'rS]y ...] : a son will be born to him, he will rejoic[ce.
			x+4. ...] . lw=f r lr nb n 'q'3y ...] : he will become owner of high land [..(?)
			x+5. g]r'mpy 'r s-hm.t' rm]t(.t)-'3.t r ti n-f] [nke(?) A d]ove: a rich woman will give him [property(?).
			x+6. k]w'kwpt 'P[w=...] . [.. A h]oopoe: [..] will [..] . [..]
			x+7. g]r'p lw=f r lr' [.. A goo]se: he will do/become [..]
			x+8. ...] . lw=f r' [..] . [.. ...] : he will ... [..]
			x+9. ...] . 'ty' r-h(.t)-n'n' ...] : ditto.
			x+10. 'ib'nini(?) r rm]t 'E3]y ... An ibnini-bird(?): man[ny] people will [..]
			x+11. 'kymy' lw'z'w r' [.. A hen: they will [..]
			x+12. 'bik'-'msb' [.. A crocodile-servant bird: [..]
			x+13. 'ny'ny lw'z'f [.. A nyny-bird: he will [..]
			x+14. ...] 'b' [.. ...] ... [..]

Fig. 6: The title of the Crocodile Servant inscribed in P. Vienna D 6104 (Source: Prada, L. (2022). *The Ancient Egyptian Origin of a Transcultural Trope*. 105, 128. Fig.11)

– The Crocodile Sentinel:

The spur-winged plover acts as the Crocodile Sentinel.⁴¹ It stands as a guard and uses its song and call to warn potential invaders, like the deadly ichneumon, and to facilitate communication.⁴² Greek accounts stated that when the water mongoose attempted to eat the crocodile eggs or throttle the sleeping crocodiles, the plover bird responded by loudly calling to wake them up.⁴³

– Crest-Shaker or Head-Shaker:

The spur-winged plover waves its foreparts like many other waders, frequently lifting the short feathers on its forehead to produce a crest. Its alert posture includes a regular shaking of the head.⁴⁴

⁴¹Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 105.

⁴² Nestorov, M. (2013). *Killing and Being Killed The Medieval Crocodile Story*. MA Thesis in Medieval Studies. Central European University. Budapest.10-11.

⁴³ <https://app.birda.org/species-guide/6421/Spur-winged-Lapwing>. Last accessed in 16 August at 7:35 PM.

⁴⁴Arnott, W. G. (2007). *Birds in the Ancient World from A to Z*. 308.

– Foot Tremblers:

The spur-winged plover is titled as Foot Trembler, because of the way it hunts its prey by stomping its feet to flush the prey from hiding, taking a few quick steps, then stabbing at the prey.⁴⁵

– The Dentist Bird:

The spur-winged plover is considered to be the Nile crocodile friendly bird that looks after its dental hygiene and cleans its teeth by removing the noisome scrap of food or leech between the ugly fangs.⁴⁶ The sharp spurs on the wings of the spur-winged plover help in pricking the most sensitive parts of the inside of the crocodile's mouth, in case it sleeps with the bird inside its mouth. This would revive the sleeping crocodile's abilities, so that it would remember its dentist bird and immediately open its jaws and release it.⁴⁷

It is worth to mention that the function of the bird cleaning the crocodile teeth as a dentist bird is clearly depicted and mentioned in one of the illustrations included in the Arabic Book of Al-Jahiz, the Book of Animals (Fig. 7):⁴⁸

"يَجُورُ بَابُ جُجْرِهِ وَلَا يَتَكَلَّفُ سِوَى مَا يَجْلِبُ إِلَيْهِ رَازِقِهِ وَرَازِقَ غَيْرِهِ وَاي شَيْءٍ أَعْجَبَ مِنْ طَائِرٍ لَيْسَ لَهُ رِزْقٌ إِلَّا أَنْ يُحَلَّلَ أَسْنَانَ التَّمْسَاحِ فَيَكُونُ ذَلِكَ رِزْقًا لَهُ وَتَرْوِيحًا عَنِ التَّمْسَاحِ".

⁴⁵ Hayman, P. , Marchant, J. , and Prater, T. (1986). *Shorebirds*.261; Wiersma, P., and Kirwan, G. M. (2020). Spur-winged Lapwing (*Vanellus spinosus*), version 1.0. In *Birds of the World* (J. del Hoyo, A. Elliott, J. Sargatal, D. A. Christie, and E. de Juana, Editors). Cornell Lab of Ornithology, Ithaca, NY, USA. <https://doi.org/10.2173/bow.spwlap1.01>.

⁴⁶ Prada, L. (2022). The Ancient Egyptian Origin of a Transcultural Trope. 105.

⁴⁷ Whymper, Ch. (2022). *Egyptian Birds: For the most part seen in the Nile Valley*. 113.

⁴⁸ The name Al-Jahiz, which means (the goggle eyed), is the nickname of the Arab scholar (Abu Othman Amr bin Bahr (776 – 868)). He is of African descent and lived in the 8th and 9th centuries in modern day Iraq. He is widely famous for his remarkable work, the Book of Animals. This encyclopedic work was most likely the first Arabic book about animals ever written. It is divided into seven volumes and included details concerning animals, their habitats and behavior, as well as anecdotes, proverbs, and poetic descriptions (<https://artsandculture.google.com/story/al-jahiz-and-the-book-of-animals-1001-inventions/iQXR7GSvFNVoLg?hl=en>). Accessed in 22 August 2024 at 6:00 PM).



Fig.7: An illustration for the relation between the spur-winged plover and the Nile crocodile in the Arabic Book of Animals

(Source: <https://www.1001inventions.com/al-jahiz/>. Accessed in 22 August 2024 at 5:23 PM)

THE BIRD DEPICTION IN ANCIENT EGYPTIAN ART

The spur-winged plover is rarely represented in the ancient Egyptian art.⁴⁹ The only known Old Kingdom depiction for this species is found in the 5th Dynasty tomb of Ti No. 60 at Saqqara (Fig. 8). It shows the spur-winged plover resting on an umbel, together with a great crowd of different species of birds (a total of 67 birds), in the upper part of the marshland scene on the northern wall of the chapel. It is carefully figured, but has unfortunately lost its pigment.⁵⁰

⁴⁹ Houlihan, P. F. (1988). *The Birds of Ancient Egypt*. 96.

⁵⁰ Lock-Cornelisse, E. *Old Kingdom, New Birds*. 12.

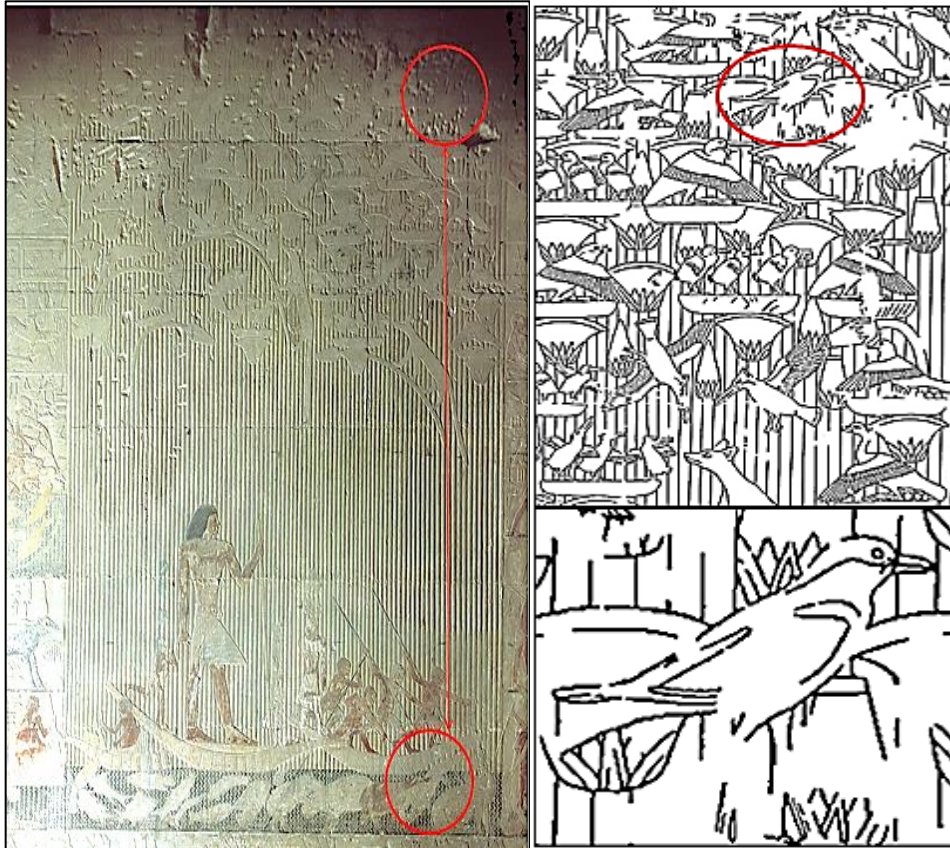
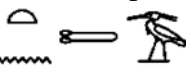


Fig. 8: The spur-winged plover in the Old Kingdom tomb of Ti
(Source: <https://klimtlover.wordpress.com/wp-content/uploads/2012/09/ti-watching.jpg>, Accessed in 25 August 2024 at 6:00 PM; Lock-Cornelisse, E. (2014). *Old Kingdom, New Birds*. 14, 16, Figs. 4, 8)

The spur-winged plover is one of the 29 species of birds recorded in the Middle Kingdom 11th Dynasty tomb of Baket III (No.15) at Beni Hassan.⁵¹ The spur-winged plover is depicted among a series of birds, which are visually arranged into two intermediate groups based on their habitats,⁵² water and land birds, each with its name written above in green Hieroglyphic signs, in the spaces above and to the right of the fishing scene in the lower register on the northern wall of the main chamber of the

⁵¹Miles, J. (1998). *Pharaoh's Birds a guide to ancient and present-day birds in Egypt*.16, 141.

⁵² Bashford, L. M. (2021). *Egyptian Observations of the Avian World: categorisation through human, bird, language, and landscape interactions*. A thesis submitted for the degree of Doctor of Philosophy. Department of Ancient History, Faculty of Arts, Macquarie University. 53.

tomb.⁵³ Above the spur-winged plover is inscribed its ancient Egyptian name *tnṯ* . It is painted with lifelike form and distinct colors,⁵⁴ except for the false hind spur fastened to each leg (Fig.9).⁵⁵

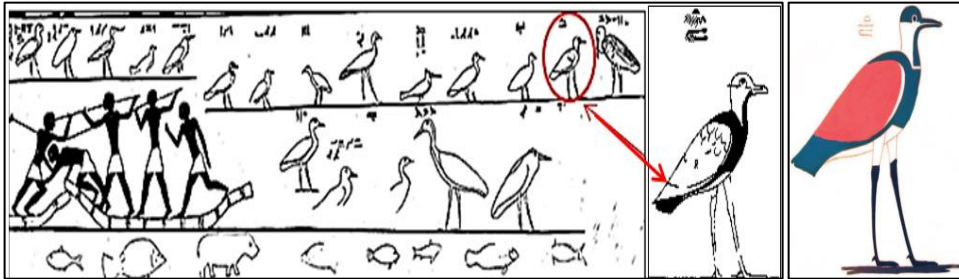


Fig. 9: The Depiction of the spur-winged plover in the tomb of Baket III at Beni Hassan

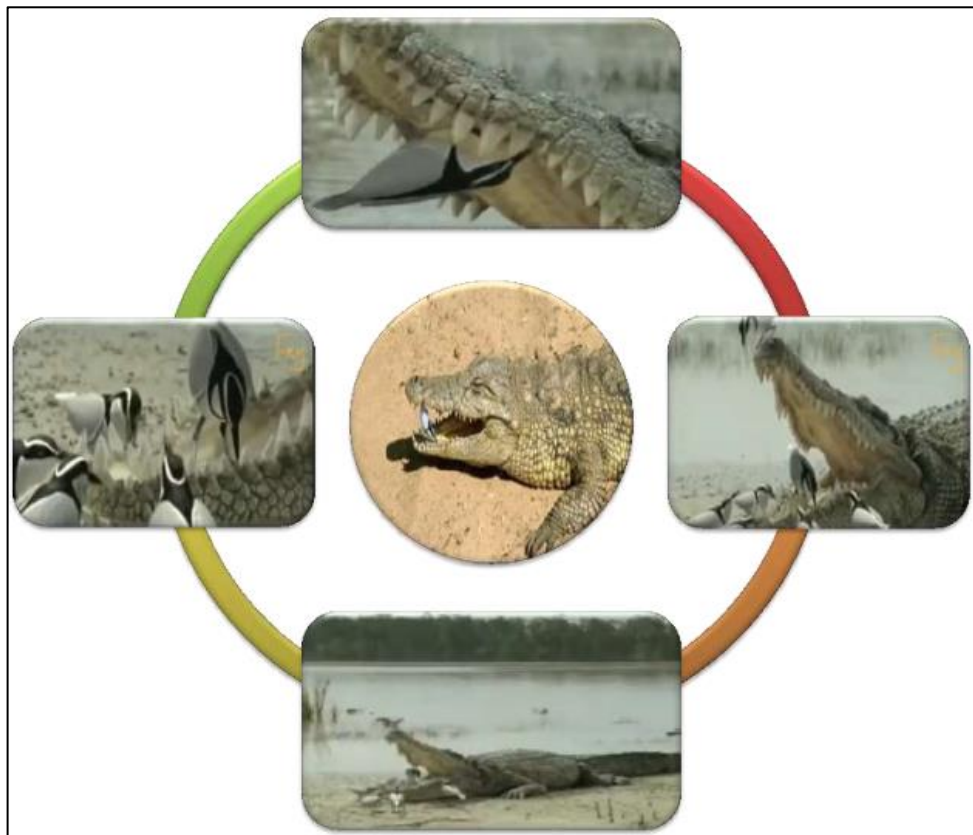
(Source: Newberry, P. E.(1893). *Beni Hasan. Part II.* London. Pl. IV; Bailleul-LeSuer, R. & Wyatt, J. (2012). 19th century epigraphers as key to the identification of Baqet III's birds in Beni Hassan. Pl. I.1)

It is noticed in the 5th Dynasty marshland scene of Ti, how the spur-winged bird, while resting on an umbel in the upper part of the scene, is oriented in the same direction of the crocodile in the lower part of the scene (Fig.8). Although the crocodile is an amphibian, its depiction environment in the ancient Egyptian marshland scenes is always water in different contexts of marsh related activities like Spear-fishing, Fishing with a hand-held net, Hippopotamus hunt, Cattle fording a canal or stream, and a pleasure cruise in marsh. It was never depicted on land or on the surface of the water. In real nature (Fig. 10) the crocodile plover is used to performing its function of cleaning the crocodile's teeth while on the surface of the water or land and not inside the water. This was not illustrated in the ancient Egyptian art.

⁵³Newberry, P. E.(1893). *Beni Hasan. Part II.* London. 47, Pl. IV; Davies, N. M. (1949). Birds and Bats at Beni Hasan. *The Journal of Egyptian Archaeology.* Vol. 35. 16. Pl. II.

⁵⁴ Bailleul-LeSuer, R. & Wyatt, J. (2012). 19th century epigraphers as key to the identification of Baqet III's birds in Beni Hassan. In: *Talking along the Nile Ippolito Rosellini, travellers and scholars of the 19th century in Egypt.* Proceedings of the International Conference held on the occasion of the presentation of Progetto Rosellini. Pisa.27. Pl.I.1.

⁵⁵Arnott, W. G. (2007). *Birds in the Ancient World from A to Z.* Routledge. London & New York. 361.



**Fig. 10: The crocodile plover in nature
(Designed by the Researcher)**

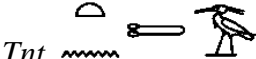
The Spur-winged plover was among the domestic avian assemblage of the ancient Egyptian Middle Kingdom individual houses, as one bird was found in a late 12th Dynasty house No. 84 in the Northern town at Elephantine.⁵⁶It was also among the avian remains discovered at Tell el Maskhuta and dated to the Graeco-Roman period.⁵⁷

⁵⁶ Bailleul-Lesuer, R. F. (2016). *The Exploitation of Live Avian Resources in Pharaonic Egypt*. 117. For more details on domestic architecture at Elephantine see Arnold, F. (2019). The meaning of change in ancient Egyptian domestic architecture Houses on Elephantine and the birth of the “private”. *MDAIK*. Band 75. 1-13.

⁵⁷Tell el Maskhuta is situated along Ismailia canal, about 15km to west of the city. The site is widely recognized in the archaeological literature due to its significance along Wadi Tumilat, one of the earliest routes for communications with the East (Iacoviello, A. (2022). Tell el-Maskhuta, A Key Site along the Wadi Tumilat: reassessment and New Data. In *The Delta Survey Workshop: Proceedings from Conferences held in Alexandria (2017) and Mansoura (2019)*. Archaeopress Publishing Ltd. 209).

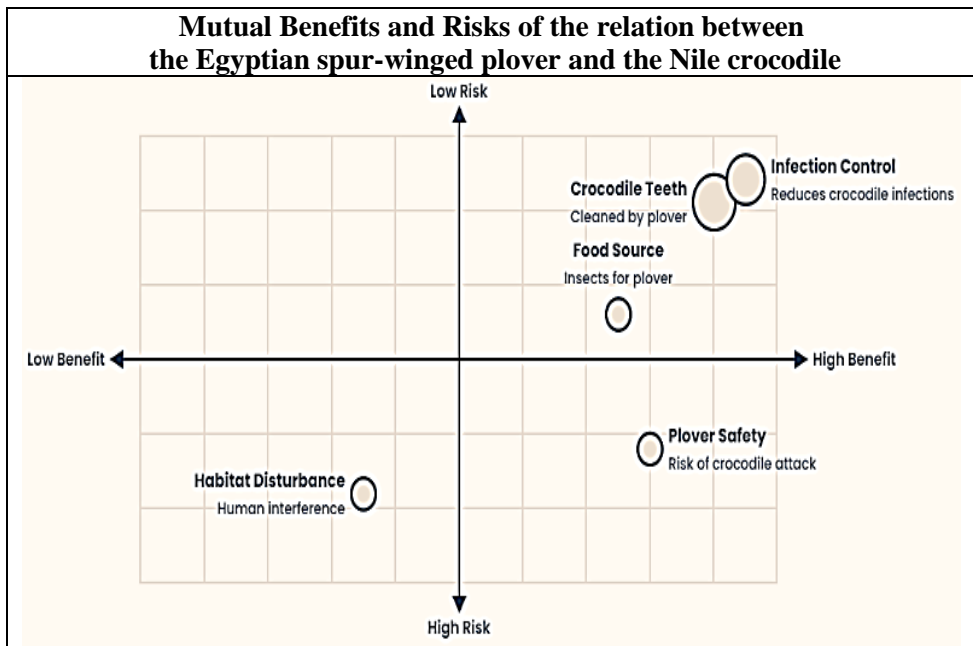
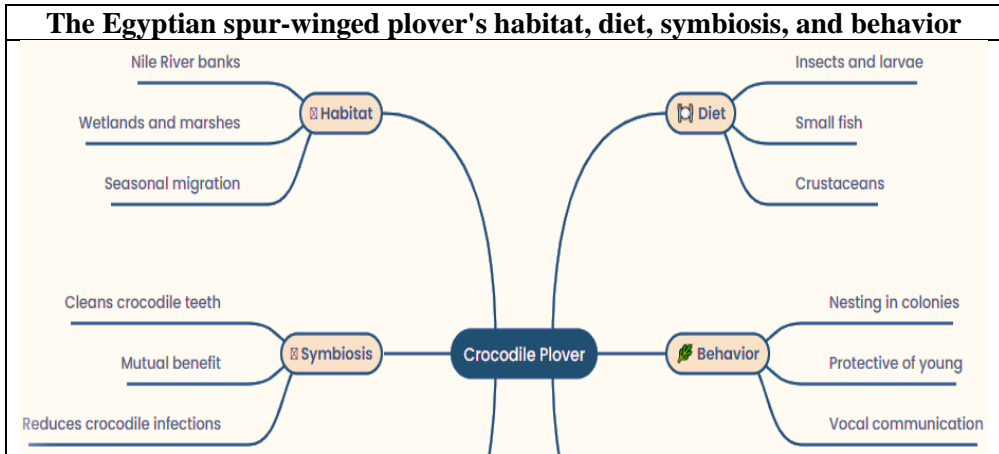
V. CONCLUSION

- The spur-winged plover is a common Nile Valley species of the plover family (the Charadriidae) that is known as small wading shore birds and are among the 103 different species of birds identified by Egyptologists and Ornithologists in the ancient Egyptian art.
- The spur-winged plover is the most common and plentiful resident of the Nile region (in the spring and winter seasons). It was known in Egypt since the Prehistoric Periods, as it was among the domestic avian remains recovered at the Prehistoric site (El Omari) that was occupied during the Neolithic Period.
- The spur-winged plover was represented in the context of the ancient Egyptian marsh scenes living among the thick papyrus thickets that serve as backgrounds for the activities like fowling and fishing in the marshes.
- The spur-winged plover is distinguished with a characteristic proportions. It is named by the adjective (spur-winged) due to the tiny spurs hidden inside the wings. It is also the only species of the plover birds that has no crest.
- The spur-winged plover together with another species of its family, called the black-headed plover, are known to coexist peacefully with the Nile crocodiles, in particular. They frequently visits the Nile crocodiles' mating and bathing areas. They are unique in the way they care for their eggs the same way that crocodiles do. They also do a vital dental service for the crocodile by eating and cleaning the scrap of food or leech between its ugly fangs.⁵⁸ Thus the bird was described by a number of titles reflecting such distinguished relation between the two animals; the Crocodile Bird or Crocodile Plover, the Crocodile Servant, the Crocodile Sentinel, and the Dentist Bird.
- The following table and illustrations (built with MyLens.ai) concluded certain main remarks about the Egyptian spur-winged plover:

Concluding remarks about the Egyptian spur-winged plover	
The ancient Egyptian name	 <i>Tnt</i> . First attested in in the Middle Kingdom 11 th Dynasty tomb of Baket III (No.15) at Beni Hassan.
The Scientific name	<i>Vanellus Spinusus</i> (Synonyms: <i>Hoplopterus spinusus</i>).

⁵⁸ Prada, L. (2022). The Ancient Egyptian Origin of a Transcultural Trope. 105.

The Latin Name & The ancient Greek Name	The Latin name Trochilos and τροχίλος in Greek (Note, this name was also attached to two other species of birds; the black-headed plover, and the Winter Wren). Herodotus was the first one to describe the bird with this name.
The English name	The spur-winged plover or spur-winged lapwing.
The Arabic name	Alqatqat القطقاط شوكي الجناح, Saqsāq سقساق, or Alziqzaq Albaladi الزقزاق البلدي.
Titles	<ul style="list-style-type: none"> -The Crocodile Bird or Crocodile Plover. -The Crocodile Servant. -The Crocodile Sentinel. - Crest-Shaker or Head-Shaker. - Foot Tremblers. - The Dentist Bird.
The areas of presence in Egypt	<ul style="list-style-type: none"> -The Nile Valley and Delta. -The Bitter lakes in Ismailiya governorate. -Wadi El Natron, Wadi El Rayan Lakes, and Lake Qaron in El Faiyum governorate. -the Nile River, and Lake Nasser in Aswan. -Lake Burullus protected area in Kafr El Sheikh governorate. -Lake Manzala.
The earliest evidence of presence in Egypt	Among the domestic avian remains recovered at the Prehistoric site (El Omari) that was occupied during the Neolithic Period.
The earliest depiction in the ancient Egyptian art	In the 5 th Dynasty marshland scene of Ti, tomb No. 60 at Saqqara.
The earliest title indicating the relation between the bird and the Nile crocodile	The Crocodile Servant <i>b3k-msh</i> is first inscribed in Demotic script in P. Vienna D 6104.
The earliest detailed description for the relation between the bird and the Nile crocodile	By Herodotus in the 5 th century B.C. (in <i>Historiae</i> , II, 68)
The earliest clear illustration for the relation between the bird and the Nile crocodile	In the Arabic Book of Al-Jahiz, the Book of Animals.



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