

***Parietaria officinalis* (Urticaceae) a new addition to the alien flora of Morocco**

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Abstract

Parietaria officinalis (Urticaceae) is reported in this study for the first time for the vascular flora of Morocco. This ruderal species was observed on old walls and sidewalks in the city of Kenitra. It likely represents a recent accidental introduction that requires monitoring through further observations. This record enriches the list of exotic taxa in Morocco.

Keywords: new record, exotic flora, ruderal, North Africa, chorology.

Resumen

***Parietaria officinalis* (Urticaceae) una nueva adición a la flora exótica de Marruecos**

Parietaria officinalis (Asteraceae) se cita en este trabajo por primera vez para la flora vascular de Marruecos. Esta especie ruderal ha sido observada en muros y aceras de la ciudad de Kénitra. Se trata, probablemente, de una introducción accidental reciente que debería ser objeto de seguimiento mediante nuevas observaciones. Esta nueva cita amplía la lista de taxones exóticos presentes en Marruecos.

Palabras clave: nuevo registro, flora exótica, ruderal, África del Norte, corología.

***Parietaria officinalis* L., Sp. Pl.: 1052 (1753)**

MOROCCO. Rabat-Salé-Kénitra Region, Kenitra, within the floristic division of North Atlantic Morocco-3 (Man-3 according to Fennane & Ibn Tattou, 1998), in the Maamora distric, 34°15'20 N, 6°35'4 W, 58 m s.n.m., 19 April 2024, A. Jbilou 225, det. O. Benkhniue (RAB114857) (Figure 1).

According to Fennane *et al.* (1999), the genus *Parietaria* L. in Morocco is represented by annual or perennial herbs, sometimes woody at the base, without stinging hairs. Three taxa are recognized in this territory: *P. judaica* L., *P. mauritanica* Durieu and *P. lusitanica* L. subsp. *lusitanica*, primarily found in rocky environments, walls, and shaded ravines (Fennane *et al.* 1999; Valdés *et al.* 2002).

P. officinalis is native to Central and Southern Europe, the Caucasus, Iran, and Central Asia (Fedtschenko *et al.*, 1937; Chrtek, 1974; Davis, 1982; Tutin *et al.*, 1993; Uotila, 2011; Takhtajan, 2012;

POWO, 2025). In Western Europe, it is common in anthropized environments, including walls, rocky areas, and wastelands. It is well naturalized in the United Kingdom (Stace, 2019), Germany (Hassler & Muer, 2022), Southern Scandinavia (Jonsell, 2000), and Poland (Mirek et al., 2020). Outside its native range, the species has been introduced in New Caledonia (MacKee, 1994), the Caribbean (Acevedo-Rodríguez & Strong, 2012), Alabama (Kral et al., 2011), and Bermuda (Britton, 1918). On the Isles of Scilly, it is naturalized (Parslow & Bennallick, 2017).

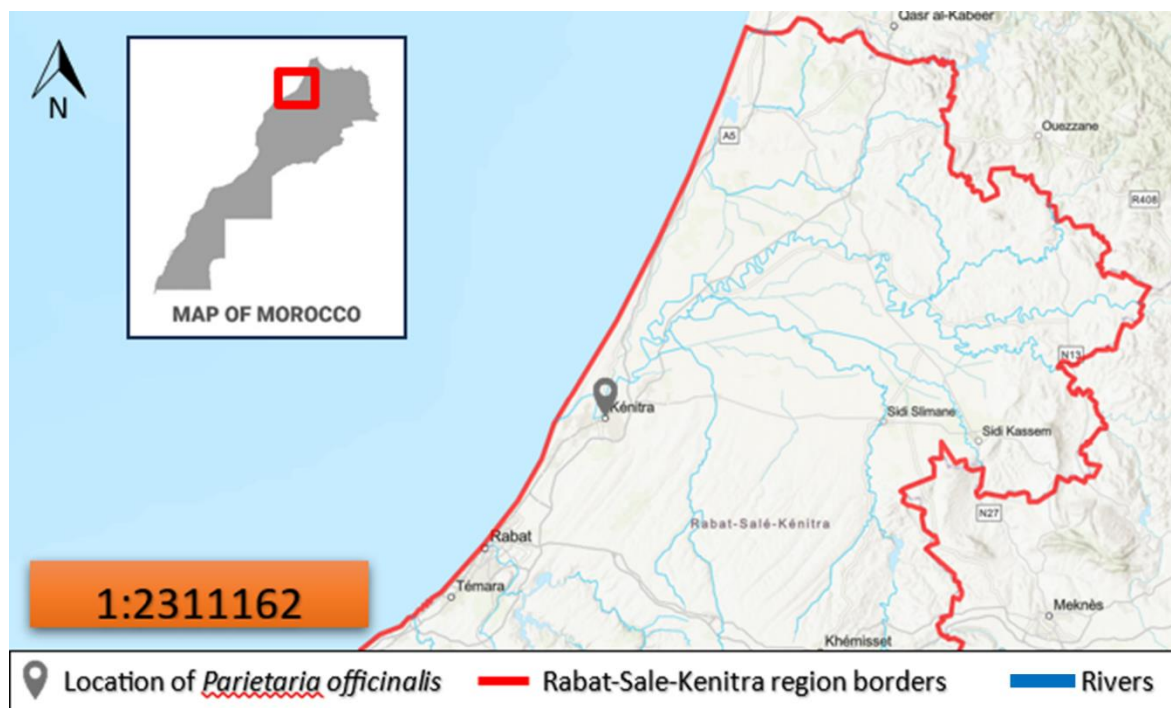


Figure 1. Location point of *Parietaria officinalis* (modified on Google Maps, 2025).

Figura 1. Punto de localización de *Parietaria officinalis* (modificado a partir de Google Maps, 2025).

Among the *Parietaria* species found in Morocco, *P. judaica* is the one that most closely resembles *P. officinalis* (Table 1). However, *P. officinalis* can be easily distinguished from *P. judaica* by its shiny, oval-lanceolate leaves and hooked hairs on the bracts (Table 1; Figure 2). In contrast, *P. judaica* has pale, non-shiny, ovate leaves with an elongated tip and bracts lacking hooked hairs (Table 1). Additionally, *P. judaica*'s fruiting perianth is longer and tubular, in contrast to *P. officinalis*'s shorter and campanulate perianth. The two species also differ in leaf size; *P. judaica* leaves rarely exceed 7 cm in length, while *P. officinalis* leaves can reach up to 12 cm (Paiva, 2006; Townsend, 1968).

Based on our observations, the discovery of a small population of *P. officinalis* in Morocco, specifically in the North Atlantic phytogeographic region, prevents us from confirming its naturalization. However, its establishment potential should be monitored. Since *P. officinalis* is often confused with other species (notably with *P. judaica*), other occurrences may have gone unnoticed. This initial remark is consistent with reports of other alien taxa for Morocco, such as *Cotula australis* Hook.f., that have lately been found in the area (Jbilou et al., 2023). According to our observation on the field, about 40 individuals in a single population of *P. officinalis* were found on an old wall in the city center of Kénitra, growing alongside accompanying species such as *Urtica urens* L., *Chenopodium murale* (L.) S. Fuentes, Uotila & Borsch, *Malva sylvestris* L., *Amaranthus viridis* L., and *Hordeum murinum* subsp. *leporinum* (Link) Arcang. (Figure 3). This suggests a probable accidental introduction, most likely through horticultural activities or human transport. No natural or established population has been detected so far. The flowering period extends from March to October.

P. officinalis has not been recorded from Africa in any scientific publication to date (African Plant Database, 2025). Three occurrence records of this species are available on GBIF for Morocco (GBIF, 2025), but none have been published or confirmed in peer-reviewed sources. These records come from herbarium collections, and only two include images of herbarium sheets. One of them (K003805330; <https://www.gbif.org/occurrence/4952007868>) cannot be assigned to *P. officinalis*; although the image is not very sharp, the shape of the leaf blade, with its oval form and elongated tip, suggests *P. judaica* instead. The image of the other specimen (K003805329; <https://www.gbif.org/occurrence/4952025187>) also lacks sufficient detail for accurate identification. A future review of these specimens would be valuable to confirm their identity.

Table 1. Comparative table of distinguishing characteristics of *Parietaria officinalis* with *P. mauritanica*, *P. judaica*, and *P. lusitanica* subsp. *lusitanica* (data from Fennane *et al.*, 1999; Paiva, 2006; Townsend, 1968).

Tabla 1. Tabla comparativa de las características distintivas de *Parietaria officinalis* con *P. mauritanica*, *P. judaica* y *P. lusitanica* subsp. *lusitanica* (datos obtenidos de Fennane *et al.*, 1999; Paiva, 2006; Townsend, 1968).

Characteristics	<i>P. officinalis</i>	<i>P. mauritanica</i>	<i>P. judaica</i>	<i>P. lusitanica</i> subsp. <i>lusitanica</i>
Life cycle	Perennial	Annual (perennial)	Perennial (from a crown)	Annual (perennial)
Stem type and size	Erect, 30–80 cm	Erect or sprawling stems (10–40 cm)	Ascending, erect or spreading, less than 40 cm	creeping or ascending stems (10–40 cm)
Stem hairiness	Mix of spreading erect hairs and short curved hairs	Glabrous or slightly pubescent at the apex	Soft hairs with grayish tint	Pubescent (glabrescent in lower part)
Leaf blade shininess	Shiny	Entirely green and non-shiny	Pale and non-shiny	Pale and non-shiny
Leaf blade shape	Oval-lanceolate	Broadly ovate, attenuate or rounded	Oval with elongated point	Ovate-acuminate to ovate-orbicular
Bracts	Clearly triangular	Ovate to oblong	Linear	Linear to lanceolate
Bract hairiness	Spreading erect and hooked hairs	Ciliate	Moderately spreading hairs	Without hooked hairs
Stamens	2 mm long	2–3.5 mm long	2 mm long	> 0.5 mm long
Styles	1 mm long	< 1 mm long	1 mm long	1 mm long
Perigonium	Pubescent to tomentose	Ciliate	Pubescent	Tomentose without hooked hairs
Receptacle	Tomentose	Tomentose	Tomentose	Almost glabrous
Achenes	Black, shiny nutlet, ± flattened, circular	Ovoid or oblong and shiny brown	Dark brown, symmetrical, acute apex	Stipitate, ovoid, acute or mucronate and shiny

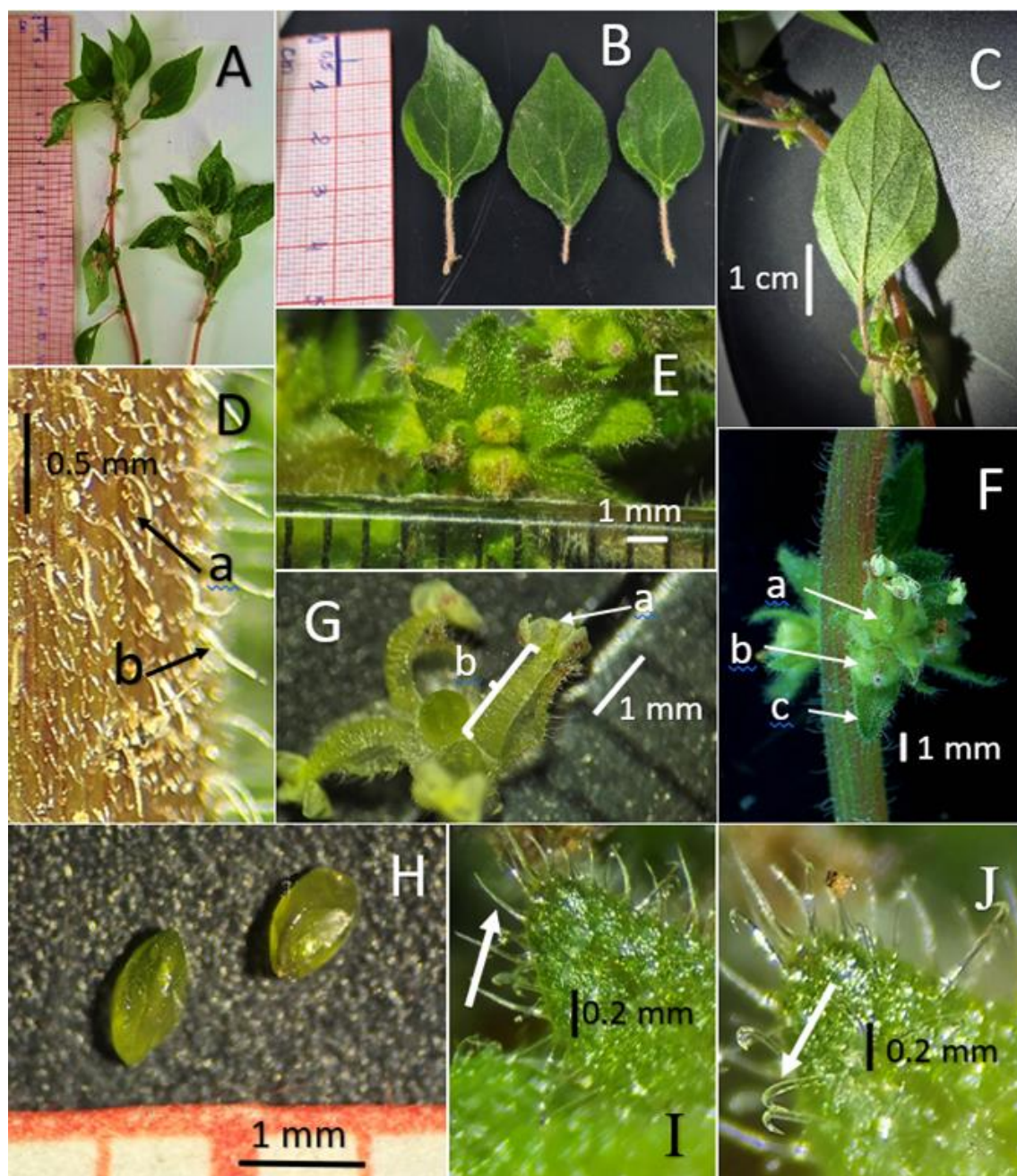


Figure 2. *Parietaria officinalis* from Maamora Street, Kenitra. A) Plant upper part. B) Adaxial leaf surface. C) Abaxial leaf surface. D) Stem hair. a: short hairs; b: long hairs. E) Female flower. F) Inflorescence. a: hermaphrodite flower; b: female flower; c: bract. G) Stamen. a: anther; b: filament. H) Achene. I) spreading bract hairs. J) Hooked bract hairs. Photos: A. Jbilou.

Figura 2. *Parietaria officinalis* en la calle de Maamora, Kenitra. A) Parte superior de la planta. B) Haz de la hoja. C) Envés de la hoja. D) Pelos del tallo. a: pelos cortos; b: pelos largos. E) Flor femenina. F) Inflorescencia. a: flor hermafrodita; b: flor femenina; c: bráctea. G) Estambre. a: antera; b: filamento. H) Aquenio. I) Pelos extendidos de la bráctea. J) Pelos en gancho de la bráctea. Fotos: A. Jbilou.



Figure 3. *Parietaria officinalis* habitat. Photo: A. Jbilou.

Figura 3. Hábitat de *Parietaria officinalis*. Fotografía: A. Jbilou.

Conflict of Interest

The author declares no conflict of interest related to this publication.

CRedit authorship contribution statement

Conceptualization: AJ, NB, OB, JD, ZL. Investigation: AJ, NB, OB, HE. Determination: OB. Visualization: OB, AJ. Writing-Original manuscript preparation: AJ. Writing-Review & Editing: NB, OB.

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