

Egyptian Herbal Monograph

Volume 3

Medicinal Plants used in Egypt

Egyptian Drug Authority (EDA)

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Chamaemelum nobile L.

بابونج

1. Names & Synonyms

Chamaemelum nobile L. (1).

Family: Asteraceae/Compositae (1).

Syns.: *Anthemis nobilis* L., Chamomile, *Ormenis nobilis* L. J. Gay ex Coss. & Germ. (1).

Arabic: Baboonig بابونج.

English name: Roman chamomile flower (2).

2. Parts used for medicinal purpose

Flowerheads (2-4).

3. Major chemical constituents

- **Essential oil:** Esters of angelic and tiglic acids, 1,8 cineole, 1-*trans*-pinocarveol, 1-*trans*-pinocarvone, chamazulene, farnesol, and nerolidol (1, 5).
- **Phenolic compounds:** **Flavonoids:** Apigenin, luteolin, quercetin and their glycosides. **Phenolic acids:** caffeic and ferulic acids. **Coumarins:** scopolin, umbelliferone and herniarin (1, 5).
- **Sesquiterpenes lactones:** Nobilin, 3-epinobilin, 1, 10-epoxynobilin and 3-dehydronobilin (1, 5).
- **Others:** Anthemic acid, fatty acids, phytosterols, choline and inositol (1).

4. Medicinal Uses (Indications)

- A. Internal use: Symptomatic treatment of mild, spasmodic gastrointestinal complaints including bloating and flatulence (2-4).
- B. External use: Minor inflammations of the oral mucosa and skin in wounds and abrasions; as an itch-relieving agent; for treatment to promote wound healing (4, 6).

5. Herbal preparations correlated to medicinal use

1. Comminuted herbal substance as herbal tea infusion or decoction for oral use, or herbal substance for external use (2, 3).
2. Liquid extract, extraction solvent ethanol 70% v/v (2, 4).

Herbal preparation (2) is in a pharmaceutical dosage forms. The pharmaceutical form should be described by the pharmacopoeia full standard term.

6. Posology and method of administration correlated to medicinal use

Preparation 1

Indication A

Adolescents, adults and elderly: 1-4 g in 100-150 ml of boiling water as herbal tea 3 times daily between the meals (1-4).

Indication B (4)

- 3% infusion in poultices or mouthwashes, 2 – 3 times daily.
- 5 - 15% of the drug or equivalent (as semi-solid preparations), as needed.

Preparation 2

Indication A

Adolescents, adults and elderly: 1 - 4 ml, 3 times daily (1, 2, 4).

Duration of use: If the symptoms persist longer than 2 weeks during the use of the medicinal product, a doctor should be consulted (2).

Method of administration: Oral administration (1-4), oromucosal and topical applications (4).

7. Contraindications

Hypersensitivity to the active substance and to other plants of the same family.

8. Special warnings and precautions for use

- If the symptoms worsen during the use of the medicinal product, a doctor or a pharmacist should be consulted.
- The use in children under 12 years of age is not recommended (2, 4, 6).
- Roman chamomile may precipitate an allergic reaction or exacerbate existing symptoms in susceptible individuals (e.g. asthmatics) (1).

9. Interactions with other medicinal products and other forms of interaction (4)

- As a precaution, Roman chamomile should not be used concomitantly with aspirin, warfarin or other substances possessing anticoagulant activity

- Since apigenin is a ligand for the central benzodiazepine receptor, Roman chamomile should not be used concurrently with diazepam or other benzodiazepines, as this may potentiate their action
- Roman chamomile essential oil exhibited $\leq 40\%$ inhibition of CYP3A4 activity.

10. Fertility, pregnancy and lactation

- Roman chamomile is a known abortifacient and should not be used during pregnancy and breastfeeding (4).
- No fertility data available (2).

11. Effects on ability to drive and use machines

No studies on the effect on the ability to drive and use machines have been performed (2).

12. Undesirable effects

- None reported (2).
- If adverse reactions occur, a doctor or a pharmacist should be consulted.

13. Overdose

- No case of overdose has been reported (2).
- Large doses of Roman chamomile are stated to act as an emetic (1).

14. Relevant biological activities

Not required as per Egyptian guidelines for registration of herbal medicines.

15. Additional information

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16. Date of last revision

1/9/2022.

References

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