

Specification : Thao En-on extract / สารสกัดเถาเอ็นอ่อน

(Manose RM-0005)

(Application : An active ingredient for anti-inframmatory and anti-sprain / สารสำคัญในผลิตภัณฑ์ด้านการอักเสบและแก้เคล็ดขัดยอก)

1. Name of the raw material : Thao En-on extract
2. Active components : Steroids, alkaloids and flavonoids^{(1), (2)}
3. Common and scientific name/ Family of the plant : Thao En-on (*Cryptolepis buchanani* Roem. & Schult.)/ ASCLEPIADACEAE
4. Physical appearance : Dark brownish solid with specific odor
5. pH : 4
6. Standardization : HPLC fingerprint using cryptosin as a marker
7. Solubility : Soluble in water and ethanol
8. Microbial contamination : No pathogenic microorganism with less than 1,000 cfu/g of the total plate count of bacteria, yeast and fungi which is conformed to the Thai FDA regulation

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9. Biological activities : Anti-sprain, anti-inflammation⁽³⁾, analgesic⁽⁴⁾, chondroprotective⁽⁴⁾ and hepatoprotective effects⁽²⁾
 10. Animal / human performance test : Anti-inflammation in animals⁽³⁾
 11. Safety : No skin irritation in human volunteers
 12. Pharmaceutical, food supplement or cosmetic applications : Topical products and cosmetics for anti-inflammatory and anti-sprain
 13. Recommended concentrations in the product : 0.1-5 % w/w
 14. Storage : Keep in tight and light protection container at room temperature
 15. Precautions : Must not be used in patients with heart diseases and discontinue if there is any adverse effect
 16. Cost per kg : Please request

References

1. Sharma D, Sahu AN, Mujeeb M, Bharti A, Sharma A, Tripathi RK, Ashraf K. (2012) Development of pharmacognostical profile of *Cryptolepis buchanani* Roem & Schult. **International Journal of Pharmacy and Pharmaceutical Sciences.** 4(2): 615-618
2. Padmalochana K, Dhana Rajan MS, Lalitha R, Sivasankari H. (2013) Evaluation of the antioxidant and hepatoprotective activity of *Cryptolepis buchanani*. **Journal of Applied Pharmaceutical Science.** 3(2): 99-104
3. Laupattarakasem P, Wangsrimongkol T, Surarit R, Hahnvajanawong C. (2006) *In vitro* and *in vivo* anti-inflammatory potential of *Cryptolepis buchanani*. **Journal of Ethnopharmacology.** 108: 349-354
4. Hanprasertpong N, Teekachunhatean S, Chaiwongsa R, Ongchai S, Kunanusorn P, Sangdee C, Panthong A, Bunteang S, Nathasaen N, Reutakul V. (2014) Anagelsic, anti-inflammatory, and chondroprotective activities of *Cryptolepis buchanani* extract; *in vitro* and *in vivo* studies. **BioMed Research International.** Article ID 978582