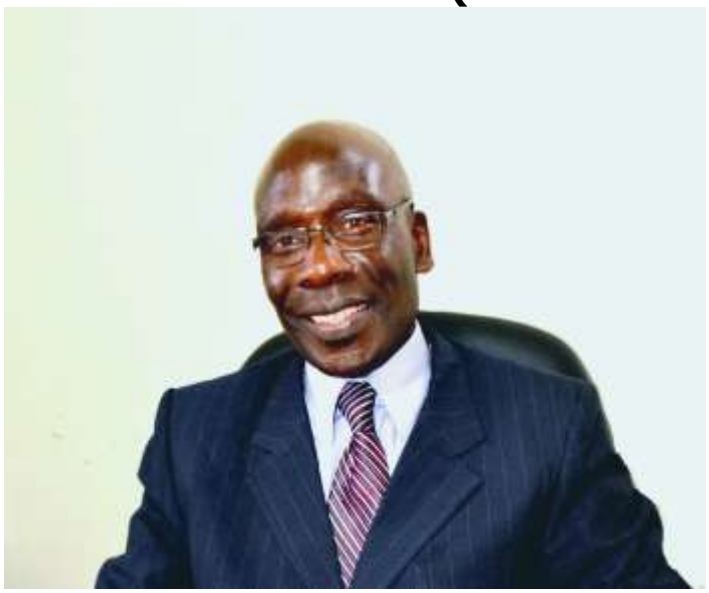
ORIGINAL COMMUNICATION

Anatomy Journal of Africa. 2015. Vol 5 (1): i - ii

NEUROPROTECTIVE AND ANTIATHEROGENIC POTENTIAL OF *Launaea taraxacifolia* (wild lettuce)



Julius Ogeng'o PhD, MD
Professor of Human Anatomy
University of Nairobi
Email: jogengo@uonbi.ac.ke
Tel: +254720837592

Histological and biochemical studies reveal that *Launaea taraxacifolia* displays chemoprotective effects against drug induced oxidative stress, neuronal death and alteration of brain microanatomy (Oweoye et al., 2015). In this issue of the Anatomy Journal Africa, Oweoye and Onwuka (2016) report further structural and chemical evidence that extracts of this plant ameliorate lead induced neurotoxicity and postulate that these neuroprotective effects are due to its antioxidant activity. Anti oxidants protect against oxidative stress induced tissue damage. This suggests that extracts of this plant may affect multiple organs. Readers of Anatomy Journal of Africa are therefore encouraged to learn more about such plants and their potential effects. *Launaea taraxacifolia*, known as wild lettuce, is a leafy vegetable of the family of *Asteraceae* found in several African countries (Adebisi, 2004).

The leaves are eaten fresh as salad or cooked as sauces. They are potential sources of nutrients because they are rich in flavonoids, cardiac glycosides, tarpenoids, tannins, steroids, saponins, cardemolides, β-catotenes; valuable minerals like copper, iron, zinc, sodium, magnesium, calcium, manganese, potassium and phosphorus; essential vitamins such as ascorbic acid, riboflavin, tecopherol; proteins; essential fatty acids and fibre (Adinortey et al., 2012; Gbadamosi et al., 2012; Olugbenga et al., 2015).

The antiatherogenic effects of this plant are derived from its chemical composition which confer antioxidant, anti-inflammatory, hypolipidemic, hypotensive, hypoglycemic and free radical scavenging properties (Adewale et al., 2013; Adejuwon et al., 2014; Koukoui et al., 2015; Sanoussi et al., 2015). I advocate for more research on the compositin and therapeutic effects of this plant.

Launaea taraxacifolia

REFERENCES

1. Adebisi AA. 2004. Launea taraxacifolia (wild) Amin ex C. Jeffrey. In: Grubben GJH and Denton OA Eds, PROTA 2: Vegetables/Legumes.
2. Adejuwon AS, Femi – Akinlosotu O, Omirinde JO, Owolabi OR, Afodun AM. 2014. Launaea taraxacifolia ameliorates cisplatin – induced hepatorenal injury. Eur J Med Plant; 4: 528 – 541.
3. Adewale A, Ayoade AA, Alani EA. 2013. Determination of vitamins in few selected West African green leafy vegetables. J Am Sci; 9: 40 – 43.
4. Adinortey MB, Sarfo JK, Quayson ET, Weremfo A, Adinortey CA, Ekloh W, Ocran J. 2012. Phytochemical screening, proximate and mineral composition of Launaea taraxacifolia leaves. Res J Med Plants; 6: 171 – 179.
5. Gbadamosi IT, Alia AE, Okolosi O. 2012. In – vitro antimicrobial activities and nutritional assessment of roots of ten Nigerian vegetables. NY Scie J; 5: 234 – 240.
6. Koukoui O, Agbangnan P, Boucherie S, Yovo M, Nusse O, Combettes L, Sohounhloue D. 2015. Phytochemical study and evaluation of cytoxicity, antioxidant and hypolipidemic properties of Launaea taraxacifolia leave extracts on cell lines HepG2 and PLB985. Am J Plant Sci; 6: 1768 – 1779.
7. Olugbenga DJ, Undigweundeye UR, Ngozi UR. 2015. Phytochemical screening, proximate analysis and acute toxicity study of Launea taraxacifolia ethanolic extract on albino rats. Int J Sci Tech; 3: 199 – 202.
8. Owoeye O, Femi – Akinlosotu M, Adejuwon SA. 2015. Launaea taraxacifolia acqueous extract attenuates cisplatin – induces neurotoxicity by decreasing oxidative stress and neurol cell death in rats. Arch Basic App Med; 3: 71 – 78.
9. Owoeye O, Onwuka SK. 2016. Lead toxicity. Effect of Launaea taraxacifolia on the histological and oxidative alterations in rat region II cornu ammonis and cerebellum. Anat J Afr; 5: 783 – 794.
10. Sanoussi F, Ahissou H, Dansi M, Hounkonnu B, Agre P, Dansi A. 2015. Ethnobotanical investigations of three traditional leafy vegetables - Alternanthera sessulus (L). DC. Bidens polisa L. Launeau taraxacifolia wild widely consumed in Southern and central Benin. J Biod Euv Sci; 6: 187 – 198.