

## NATURAL HEALTH PRODUCT

### AFRICAN WILD MANGO – *IRVINGIA GABONENSIS*

This monograph is intended to serve as a guide to industry for the preparation of Product Licence Applications (PLAs) and labels for natural health product market authorization. It is not intended to be a comprehensive review of the medicinal ingredient.

#### Notes

- ▶ Text in parentheses is additional optional information which can be included on the PLA and product label at the applicant's discretion.
- ▶ The solidus (/) indicates that the terms and/or statements are synonymous. Either term or statement may be selected by the applicant.

**Date** June 3, 2019

#### Proper name(s), Common name(s), Source material(s)

Table 1. Proper name(s), Common name(s), Source material(s)

Proper name(s)	Common name(s)	Source material(s)		
		Proper name(s)	Part(s)	Preparation(s)
<i>Irvingia gabonensis</i>	African wild mango	<i>Irvingia gabonensis</i>	Seed	Dried

References: Proper name: USDA 2019; Common name: USDA 2019; Source material: Ross 2011, Ngondi et al. 2009, Oben et al. 2008a, b, Ekpo et al. 2007, Ngondi et al. 2005.

#### Route of administration

Oral

#### Dosage form(s)

This monograph excludes foods or food-like dosage forms as indicated in the Compendium of Monographs Guidance Document.

Acceptable dosage forms for the age category listed in this monograph and specified route of administration are indicated in the Compendium of Monographs Guidance Document.

### Use(s) or Purpose(s)

- ▶ Could be a complement to a healthy lifestyle that incorporates a calorie-reduced diet and regular physical activity for individuals involved in a weight management program (Ross 2011; Ngondi et al. 2009, Ngondi et al. 2005).
- ▶ Helps support healthy cholesterol levels/cardiovascular health by reducing total and LDL cholesterol (Ross 2011; Ngondi et al. 2009; Ngondi et al. 2005).
- ▶ Helps support healthy glucose levels (Ross 2011; Ngondi et al. 2009; Adamson et al. 1986).
- ▶ Source of/Provides antioxidants (Atawodi 2011; Agbor et al. 2005).

The following combined use(s) or purpose(s) is/are also acceptable:

Helps support healthy glucose and cholesterol levels (Ross 2011; Ngondi et al. 2009; Ngondi et al. 2005; Adamson et al. 1986)

### Dose(s)

#### Subpopulation(s)

Adults 18 years and older

#### Quantity(ies)

*Weight management, cholesterol, glucose*

Method of preparation: Standardized Dry Extracts

150 milligrams of dry extract standardized to 7% albumin, two times per day (Ross 2011; Ngondi et al. 2009; Oben et al. 2008a, b).

#### *Antioxidant*

Methods of preparation: Dry, Powder, Non-Standardised Extracts (Dry extract, Tincture, Fluid extract, Decoction, Infusion)

Not to exceed 3.15 grams of dried seed, per day (Ekpe et al. 2007; Ekpo et al. 2007; Ngondi et al. 2005).

#### Direction(s) for use

*Weight management, cholesterol, glucose*

Take before meals (Ross 2011; Ngondi et al. 2009; Oben et al. 2008a,b; Ngondi et al. 2005; Adamson et al. 1986).



### **Duration(s) of use**

No statement required.

### **Risk information**

#### **Caution(s) and warning(s)**

##### *All products*

Consult a health care practitioner/health care provider/health care professional/doctor/physician prior to use if you are breastfeeding or have diabetes (Ross 2011; Ngondi et al. 2009; Adamson et al. 1986).

##### *Antioxidant, cholesterol, glucose*

Consult a health care practitioner/health care provider/health care professional/doctor/physician prior to use if you are pregnant.

#### **Contraindication(s)**

##### *Weight management*

Do not use this product if you are pregnant.

#### **Known adverse reaction(s)**

Stop use if you experience symptoms of hypoglycaemia including feelings of anxiety, dizziness, tremor, sweating, nausea or headache (Adamson et al. 1986; Ngondi et al. 2009; Oben et al. 2008a,b).

### **Non-medicinal ingredients**

Must be chosen from the current Natural Health Products Ingredients Database (NHPID) and must meet the limitations outlined in the database.

### **Storage conditions**

No statement required.



## Specifications

- ▶ The finished product specifications must be established in accordance with the requirements described in the Natural and Non-prescription Health Products Directorate (NNHPD) Quality of Natural Health Products Guide.
- ▶ The medicinal ingredient must comply with the requirements outlined in the NHPID.

## References cited

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Agbor, GA, Oben JE, Ngogang JY, Xinxing C, Vinson JA. Antioxidant capacity of some herbs/spices from Cameroon: a comparative study of two methods. *Journal of Agricultural and Food Chemistry* 2005; 53(17): 6819-6824.

Atawodi, SE. Polyphenol content and in vitro antioxidant activity of methanol extract of seeds of *Irvingia gabonensis* Baill. of Nigerian origin. *Electronic Journal of Environmental, Agricultural and Food Chemistry* 2011; 10(6): 2314-2321.

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Ngondi JL, Oben JE, Minka SR. The effect of *Irvingia gabonensis* seeds on body weight and blood lipids of obese subjects in Cameroon. *Lipids in Health and Disease* 2005; 4:12.

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Oben JE, Ngondi JL, Momo CL, Agbor GA, Makamto Sobgui CS. The use of a *Cissampelos quadrangularis*/*Irvingia gabonensis* combination in the management of weight loss: a double-blind placebo-controlled study. *Lipids in Health and Disease* 2008b; 7:12.

Ross MS. A proprietary seed extract of *Irvingia gabonensis* is found to be effective in reducing body weight and improving metabolic parameters in overweight humans. *Holistic Nursing*



Practice 2011; 235(4): 215-217.

USDA 2019: United States Department of Agriculture, Agricultural Research Service, National Genetic Resources Program. Germplasm Resources Information Network (GRIN). [Internet]. *Irvingia gabonensis* National Germplasm Resources Laboratory, Beltsville (MD). [Accessed 2019 May 14]. Available from: <https://npgsweb.ars-grin.gov/gringlobal/taxonomybrowse.aspx>

### References reviewed

Adamson I, Okafor C, Abu-Bakare A. A supplement of Dikanut (*Irvingia gabonensis*) improves treatment of type II diabetics. *West African Journal of Medicine* 1990; 9(2): 108-115.

Kothari SC, Shivarudraiah P, Venkataramaiah SB, Gavara S, Soni MG. Subchronic toxicity and mutagenicity/genotoxicity studies of *Irvingia gabonensis* extract (IGOB131). *Food and Chemical Toxicology* 2012; 50: 1468-1479.

Leung, Woot-tsuen Wu. & Leung, Woot-tsuen Wu. & Food and Agriculture Organization of the United Nations. Food Consumption and Planning Branch. & United States. Nutrition Program. Food composition table for use in Africa; a research project sponsored jointly by U.S. Dept. of Health, Education, and Welfare, Nutrition Program, and Food Consumption and Planning Branch, Food and Agriculture Organization of the United Nations. Bethesda, Md 1968.

Onakpoya I, Davies L, Posadzki P, Ernst E. The efficacy of *Irvingia gabonensis* supplementation in the management of overweight and obesity: A systematic review of randomized controlled trials. *Journal of Dietary Supplements* 2013; 10(1): 29-38.