

**The Longwood Herbal Task Force**  
(<http://www.mcp.edu/herbal/default.htm>) and  
**The Center for Holistic Pediatric Education and Research**

## **Essiac**

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### *Overview*

Essiac herbal mixture is one of the most commonly used complementary therapies for cancer in the United States and Canada. It has also gained some popularity as a treatment for other chronic and incurable conditions. Despite the plethora of testimonials concerning its use, there are no prospective controlled trials evaluating its effectiveness for any health condition. There are no reports of serious adverse effects with short term use. It is not recommended for use during pregnancy or lactation or in children less than two years old. Based on its constituent herbal ingredients, caution is suggested for use by patients with a history of renal stones, those with intestinal obstruction and in patients taking cardiac glycoside medications.

### *Historical and Popular Uses*

Essiac was first widely used and promoted by an Ontario nurse, Rene Caisse, in the 1920's. In fact, its name is simply Caisse spelled in reverse. Caisse heard about the herbal mixture from one of her patients, a woman whose breast cancer had apparently been healed by a secret herbal formula given her by an Ojibwa medicine man. The original tea was made from four dried herbs: burdock root, the inner bark of the slippery elm tree, sorrel and turkey (medicinal) rhubarb root<sup>1</sup>.

The Flor-Essence brand of Essiac (the largest sales) contains in addition blessed thistle, red clover, kelp, nasturtium and watercress. Other commercial formulations include South American cat's claw bark. There have been numerous testimonials to the effectiveness of Essiac in treating adults with cancer; Canadian cancer researchers estimate that Essiac is one of the six most commonly used remedies by patients with breast cancer<sup>2</sup>. Based on its popularity as a cancer remedy, Essiac has also been used to enhance immune function, aid in recovery from chronic illnesses such as diabetes, fight AIDS, rid the body of toxins and maintain health<sup>1,3</sup>.

There are numerous Internet sites devoted to dispensing information, marketing information and consumer discussions about Essiac. Below are listed a few:

- HealthCare Reality Check: <http://www.hcrc.org/faqs/essiac.html>
- Essiac Home Page: <http://essiac-info.org/index.html>
- Patient Information and Discussion group: <http://www.znet.com/~oct31/tea/old/index.shtml>
- Canadian Cancer Information Service: <http://www.breast.cancer.ca>
- University of Texas Center for Alternative Medicine:  
<http://www.sph.uth.tmc.edu/utcam/summary/essic.htm>

### ***Botany***

*Medicinal species:* The traditional Essiac blend contains *Arctium lappa* (burdock root), *Rheum officinale* (medicinal rhubarb root), *Rumex acetosa* (common sorrel leaf) and *Ulvus rubra* or *U. fulva* (slippery elm bark). Precise amounts of the different herbs are proprietary secrets although the major constituents appear to be sorrel and burdock<sup>1</sup>.

*Common names:* Essiac

*Botanical family:* See individual monographs for specific herbs.

*Plant description:* See individual monographs for specific herbs.

*Where it's grown:* All of the ingredients grow easily in North America.

## *Biochemistry*

### **Essiac: Active Chemical Constituents**

- Sulfur-containing polyacetylenes (00.1% - 0.002%)<sup>4</sup> from burdock
- Arctigenin from burdock
- Anthraquinones from rhubarb root
- Oxalic acid from rhubarb root, slippery elm bark and sorrel
- Tannins from rhubarb root, slippery elm bark and sorrel
- Mucilage from slippery elm bark
- Other: organic acids; aldehydes; carbohydrates (up to 45% - 50% inulin in burdock root); sesquiterpene lactones, phytosterols<sup>5</sup>, O-glycosides of aloe-emodin (anthraglycosides), emodin, chrysophanol, physcion; dianthrone glycosides of rhein (sennosides A and B); heterodianthones including Palmidins A-C, sennidin C, rheidin B, rhein<sup>5</sup>; pectin

The herbal mixture is a unique, proprietary secret for each manufacturer and may contain varying amounts of each of these ingredients. Some mixtures also contain watercress, blessed thistle, red clover and kelp. See individual monographs for specific biochemical ingredients.

## *Experimental Studies*

### **Essiac: Potential Clinical Benefits**

1. Cardiovascular: N/A
2. Pulmonary: N/A
3. Renal and electrolyte balance: N/A
4. Gastrointestinal/hepatic: N/A
5. Neuro-psychiatric: N/A
6. Endocrine: N/A
7. Hematologic: N/A
8. Rheumatologic: N/A
9. Reproductive: N/A
10. Immune modulation: Anti-inflammatory: See monographs for burdock and rhubarb;  
Increases delayed hypersensitivity reactions: See monograph for rhubarb.
11. Antimicrobial: N/A
12. Antineoplastic: Antineoplastic
13. Antioxidant: N/A
14. Skin and mucus membranes: N/A
15. Other/miscellaneous: N/A

Because Essiac is used primarily as a cancer remedy, the scientific review in this monograph focuses on studies related to the effect of the herbal mixture on cancer. See individual monographs for discussions of the specific effects of individual herbal components.

**10) Immune modulation:** Anti-inflammatory; increases delayed hypersensitivity reactions.

Burdock and rhubarb have anti-inflammatory activity in animal studies, inhibiting the metabolism of arachidonic acid to prostaglandins E2 and F2 and thromboxane. On the other hand, rhubarb root increases delayed hypersensitivity reactions in mice. See the monographs for burdock and rhubarb for more information.

**12) Antineoplastic:** Antineoplastic. Until 1987, Essiac was made by Rene Caisse (who died in 1978) or Dr. M. Dymond in home workshops. Since then, it has been manufactured and marketed by several different producers. Claims for these products include “builds the

immune system”, “detoxifies the body”, “removes heavy metals”, “restores energy levels”, “cleanses the blood”, “promotes cell repair”; these and similar claims can be found on numerous internet sites promoting the use and sale of Essiac<sup>6,7</sup>.

i. *In vitro data*: none

ii. *Animal data*: Based on preliminary, promising results in mice treated with Essiac, researchers at Memorial Sloan Kettering and the National Cancer Institute requested the Essiac formula to perform additional experiments. Their requests were refused by Caisse in the 1960’s. Studies in the 1970’s at Sloan Kettering on mice using Essiac prepared by Caisse showed no significant effect on tumor growth.

iii. *Human data*: Based on numerous testimonials of its effectiveness and public demand for Essiac<sup>8</sup>, in 1978 the Canadian government granted Laval University and Toronto General Hospital permission to investigate Essiac. Subsequently, certain Canadian physicians were allowed to supervise Essiac therapy in patients for whom no other therapy had been effective. Five-year follow-up of the 87 patients treated under this study showed that 78 experienced no benefit. In the others, benefit was uncertain due to prior and concurrent therapies with mainstream medical treatments<sup>9</sup>. In a retrospective review of 59 Canadian cancer patients who had used Essiac, none reported serious adverse effects and 30% felt it had helped them, primarily psychologically<sup>10</sup>. There are no prospective or randomized, controlled clinical trials evaluating the safety and effectiveness of Essiac therapy in adults or children suffering from any form of cancer, diabetes, AIDS, or other health conditions<sup>11,1,12</sup>.

## ***Toxicity and Contraindications***

*All herbal products carry the potential for contamination with other herbal products, pesticides, herbicides, heavy metals and pharmaceuticals.*

*Allergic reactions can occur to any natural product in sensitive persons*

*Allergic reactions:* Allergies to sorrel have been reported. Contact dermatitis to burdock root has been reported.

*Potentially toxic compounds in Essiac:* Tannins, oxalic acid, anthraquinones. Contamination or misidentification of any component is possible; imported ingredients may be contaminated with heavy metals; quantity of active ingredients may vary.

*Acute toxicity:* Contaminated burdock products have caused acute atropine-like poisoning. Other acute anticholinergic type poisonings have also been reported with burdock.

Anthraquinones in rhubarb may cause diarrhea and intestinal cramping. Oxalic acid may trigger renal stones. Tannins may lead to upset stomach, renal damage and hepatic injury.

*Chronic toxicity:* Due to its cathartic effects, Essiac may deplete serum potassium, thereby potentiating effects of cardiac glycosides; caution suggests limiting chronic use or close monitoring of renal function and electrolytes.

*Limitations during other illnesses or in patients with specific organ dysfunction:* Due to its oxalic acid content, Essiac should be used with caution in patients with a history of renal stones; it should also be avoided in patients with intestinal obstruction.

*Interactions with other herbs or pharmaceuticals:* Due to potential potassium depletion, avoid use by patients taking cardiac glycosides.

*Safety during pregnancy and/or childhood:* Most herbalists recommend avoiding Essiac during pregnancy and lactation and in children less than two years old. There are no studies evaluating safety in these ages or conditions.

## ***Typical dosages***

*Provision of dosage information does NOT constitute a recommendation or endorsement, but rather indicates the range of doses commonly used in herbal practice.*

*Doses may vary according to the type and severity of the condition treated and individual patient conditions.*

NOTE: Caisse gave the mixture by mouth, intramuscular injection or intravenous injection. Nowadays, Essiac is primarily taken in tea form by mouth. There is a case report of a patient who died almost immediately after receiving a physician-administered injection of Essiac<sup>13</sup>.

*Adult doses of the tea: 30 ml (1 oz) po one to three times daily, taken on an empty stomach, 2 hours before or after meals.*

*Available in dry powder (approximately 20 grams per liter of water).*

*Available in prepared tea in 16 ounce or 17 ounce bottles.*

*Pediatric dosages: Unknown*

*Availability of standardized preparations: Unknown*

*Dosages used in herbal combinations: Unknown*

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