

Herbal Teas Used Against Gastrointestinal Disorders

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Gastrointestinal Disorders

- A. Anorexia and dyspepsia
- B. Gastritis and peptic ulcer disease
- C. Irritable bowel syndrome
- D. Diarrhea
- E. Constipation
- F. Liver Diseases

C. Irritable bowel syndrome

Irritable bowel syndrome (IBS, also called irritable colon) is a common, chronic functional disorder defined as a variable combination of chronic recurring gastrointestinal symptoms with no identifiable structural abnormalities or biochemical pathology.

The symptoms are pain, constipation, diarrhea, altered defecation, and bloating.

Treatment of IBS

Treatment is symptomatic and depends on individual manifestations. Constipation can be treated with a fiber supplement such as wheat bran, linseed, or psyllium, while diarrhea is managed by reducing dietary fat intake and, if necessary, by taking an antidiarrheal agent that reduces bowel motility.

Treatment of IBS

Abdominal spasms and pain can be treated with mebeverine-type antispasmodics, but peppermint oil is equally or more effective.

Mentha piperita, nane, Peppermint

Medicinal peppermint (*Mentha piperita*, Lamiaceae) is a hybrid that was first cultivated in England. It does not grow in the wild.

All the aerial parts of peppermint are used as a drug and tea.

The crude drug should contain at least 1.2% volatile oil. It also contains 6-12% tannins along with flavonoids, triterpenes, and bitter principles.

Dried peppermint leaves are used in making teas.

Peppermint oil

Peppermint oil, obtained by steam distillation of the fresh and dried herb, is a colorless to pale green liquid with a pungent odor of peppermint.

It has an initially burning taste and cool aftertaste, especially when air is drawn in through the mouth.

The main constituent (about 50-60%) is menthol. Peppermint oil also contains menthone (5-30%) a number of esters (about 5-10%), and small amounts of cineole and other terpenes.

Peppermint oil

Peppermint oil antagonizes the spasmogenic action of barium chloride, pilocarpine, and physostigmine.

It relaxes muscles (less potent than papaverine in this action).

Peppermint oil acts like Ca^{+2} blockers. The antispasmodic action of peppermint oil is based on properties that are characteristic of Ca^{+2} antagonists.

Alcohol extracts from the aerial parts of peppermint have the most potent effect compared with extracts of other herbs that contain essential oils (lemon balm (*Melissa officinalis*), rosemary (*Rosmarinus officinalis*), chamomile (*Matricaria chamomilla*), fennel (*Foeniculum vulgare*), caraway (*Carum carvi*), and *Citrus* sp.)

Risks and Side Effects of Peppermint oil

The long term use of peppermint tea is not associated with risks or significant side effect.

****!! Peppermint oil should not be applied to the nasal area of small children as it can provoke glottic spasms and respiratory arrest.**

*According to Commission E monographs, peppermint leaves are indicated for gastrointestinal tracts, biliary tract, **irritable colon**, and respiratory tract. An average daily dose of **3-6 g** is recommended for peppermint leaves taken in **tea** form.

*An average daily dose of **0,6 mL** of peppermint oil is recommended for the treatment of **IBS**.

D. Diarrhea

Diarrhea refers to the frequent (more than 3 times daily) passage of a liquid or semi-liquid stool.

Acute diarrhea has an abrupt onset, usually lasts only 3-4 days, often has an infectious cause, and tends to be self-limiting. Chronic diarrhea persists longer than 4 weeks.

Causal treatment of the underlying disease is essential in all chronic forms of diarrhea. Phytomedicines have a significant role, both as traditional home remedies and as galenic preparations, in the symptomatic treatment of diarrhea.

Three groups of preparations are particularly important;

- tannin-containing herbs,
- pectins,
- -special strain of dried yeast.

Treatment of acute diarrhea

Camellia sinensis (Green/Black tea), çay

By far the most pleasant way to take tannins is to ingest them in the form of green or black tea.

The tea should be steeped for 15-20 min, however, to release as much of the tannins as possible; [this will necessarily impart a bitter taste to the beverage](#).

Black and green tea are both derived from the tea shrub (*Camellia sinensis*, formerly known as *Thea sinensis*).

It grows wild in Asia. The cultivated leaves are harvested and dried to yield the crude drug.

Treatment of acute diarrhea

Camellia sinensis (Green/Black tea), çay

- Green tea consists of leaves that are heated immediately after harvesting, mechanically rolled and crushed, and then dried to prevent enzymatic changes. In this way the natural constituents and color of the tea leaf are essentially preserved.

Green tea has a particularly high tannin content and is strongly astringent.

Treatment of acute diarrhea

Camellia sinensis (Green/Black tea), çay

- Black tea is produced by fermentation. The leaves are wilted before they are rolled and then left in a humid environment for several hours to promote enzymatic changes in the herb, which gradually turn reddish brown. The herb is then dried to yield the black leaf that has a distinctive varietal flavor.



Treatment of acute diarrhea

Table 1. Tannin-containing herbs and preparations for the treatment of acute diarrhea.

Herb preparation	Active constituents	Average daily dose
Green/Black tea (<i>Camellia sinensis</i>)	5-20% tannins 2-5% caffeine 1% volatile oil	3-10 g of crude drug¹⁾
Bilberry (<i>Vaccinium myrtillus</i>)	5-10 %tannins 1% fruits acids	20-60 g of berries²⁾
Witch hazel leaf and bark (<i>Hamamelis virginiana</i>)	5-10% tannins	0.1-1 g of crude drug³⁾
Tormentil root (<i>Potentilla erecta</i>)	15-20% tannins	2-6 g of crude drug¹⁾
Oak bark (<i>Quercus</i> sp.)	10-20% tannins	2-6 g of crude drug¹⁾
Albumin tannate	ca. 50% tannins	2-4 g

¹⁾ Prepare as infusion (tea); ²⁾ dried berries; ³⁾ for external use only.

Antidiarrheal tea

Rx	Black tea leaves	40
	Balm leaves	20
	Fennelseed, crushed	20
	Centaurry (Centaurium erythrae)	20

Mix to make tea

Directions: Prepare 2 teaspoons in 1 cup as an infusion,
sleep 10-20 min.