

**Dr. Duke's Phytochemical and Ethnobotanical Database**

**List of Plants for ACETIC-ACID**

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Abelmoschus moschatus</i>	Plant	--	--		--
<i>Abelmoschus moschatus</i>	Seed	--	--		Wealth of India.
<i>Acacia decurrens</i>	Plant	--	--		--
<i>Acacia melanoxylon</i>	Plant	--	--		--
<i>Acinos suaveolens</i>	Shoot	100	100		Jim Duke's personal files.
<i>Actaea racemosa</i>	Plant	--	--		Newall, C. A., Anderson, L. A. and Phillipson, J. D. 1996. Herbal Medicine - A Guide for Health-care Professionals. The Pharmaceutical Press, London. 296pp.
<i>Aesculus hippocastanum</i>	Seed	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Akebia quinata</i>	Seed	--	--		--
<i>Allium cepa</i>	Bulb	--	--		Wilkens, W. F. 1964. Isolation and Identification of the Lachrymogenic Compound of Onion. Cornell Univ., Agr. Expt. Sta. Mem. No., 385: 31 pp.
<i>Aloysia citrodora</i>	Plant	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
<i>Anamirta cocculus</i>	Fruit	--	--		--
<i>Ananas comosus</i>	Fruit	0.49	0.49	-0.6429596690411867	--
<i>Apium graveolens</i>	Plant	--	--		--
<i>Arctium lappa</i>	Plant	--	--		--

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Aspalathus linearis</i>	Plant	--	--		--
<i>Astragalus gummifer</i>	Gum	25000	25000		--
<i>Avena sativa</i>	Plant	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Borago officinalis</i>	Plant	--	--		--
<i>Borago officinalis</i>	Leaf	--	--		Leung, A. Y. and Foster, S. 1995. Encyclopedia of Common Natural Ingredients 2nd Ed. John Wiley & Sons, New York. 649 pp.
<i>Camellia sinensis</i>	Plant	--	--		--
<i>Cananga odorata</i>	Flower	--	--		--
<i>Capsicum annuum</i>	Fruit	--	--		--
<i>Capsicum frutescens</i>	Resin, Exudate, Sap	--	--		--
<i>Centaurea cyanus</i>	Flower	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Chrysanthemum x morifolium</i>	Flower	--	--		Wealth of India.
<i>Cimicifuga racemosa</i>	Plant	--	--		Newall, C. A., Anderson, L. A. and Phillipson, J. D. 1996. Herbal Medicine - A Guide for Health-care Professionals. The Pharmaceutical Press, London. 296pp.
<i>Cinnamomum camphora</i>	Plant	--	--		--
<i>Citrus aurantium</i>	Flower	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.

Plant	Part	Low PPM	High PPM	StdDev	Reference
Citrus aurantium	Plant	--	--		--
Citrus limon	Essential Oil	--	--		Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
Citrus paradisi	Fruit	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
Citrus sinensis	Plant	--	--		--
Commiphora myrrha	Resin, Exudate, Sap	--	--		--
Coriandrum sativum	Fruit	1	1	-0.6428126249807119	Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
Coriaria thymifolia	Plant	--	--		--
Croton tiglium	Seed	1800	3000	-0.9346844062201093	--
Cymbopogon martinii	Plant	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
Datura stramonium	Plant	--	--		--
Digitalis purpurea	Leaf	--	--		--
Elettaria cardamomum	Fruit	--	--		Leung, A. Y. and Foster, S. 1995. Encyclopedia of Common Natural Ingredients 2nd Ed. John Wiley & Sons, New York. 649 pp.
Ephedra sinica	Shoot	--	--		--
Eriodictyon californicum	Plant	--	--		Leung, A.Y., Encyclopedia of Common Natural Ingredients Used in Food, Drugs, and Cosmetics, John Wiley & Sons, New York, 1980.
Eruca sativa	Hs	--	--		--

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Erythroxylum zambesiacum</i>	Root	--	--		--
<i>Ficus carica</i>	Fruit Juice	--	--		Shiraishi, S. C., Kawakami, K., Widodo, S. E., Shiraishi, M., Kitazaki, M. 1996. Organic acid profiles in the juice of fig fruits. Journal of the Faculty of Agriculture Kyushu University, 41(1-2): 29-33.
<i>Ginkgo biloba</i>	Fruit	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Ginkgo biloba</i>	Pollen Or Spore	--	--		Jim Duke's personal files.
<i>Gleditsia triacanthos</i>	Seed	--	--		--
<i>Glycine max</i>	Seed	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Glycyrrhiza glabra</i>	Root	2	2		--
<i>Haematoxylum campechianum</i>	Wood	--	--		ANON. 1948-1976. The Wealth of India raw materials. Publications and Information Directorate, CSIR, New Delhi. 11 volumes.
<i>Hedeoma pulegioides</i>	Plant	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Helichrysum angustifolium</i>	Plant	--	--		--
<i>Hibiscus sabdariffa</i>	Fruit	--	--		Chemical Constituents of Oriental Herbs (3 diff. books)
<i>Hibiscus sabdariffa</i>	Seed	--	--		Chemical Constituents of Oriental Herbs (3 diff. books)
<i>Hibiscus sabdariffa</i>	Calyx	--	--		--

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Juniperus communis</i>	Fruit	--	9000	1.951794238179258	List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Kalanchoe pinnata</i>	Plant	--	--		Tramil
<i>Laurus nobilis</i>	Leaf	--	--		Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
<i>Lavandula x intermedia</i>	Plant	--	--		Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
<i>Levisticum officinale</i>	Root	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
<i>Linum usitatissimum</i>	Seed	3105	3853	-0.45177356521117334	List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Lycopersicon esculentum</i>	Fruit	--	--		--
<i>Malus domestica</i>	Plant	--	--		--
<i>Melia azedarach</i>	Fruit	--	--		--
<i>Mentha arvensis var. piperascens</i>	Plant	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
<i>Mentha pulegium</i>	Essential Oil	--	--		--
<i>Mentha spicata</i>	Plant	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
<i>Mentha spicata</i>	Essential Oil	--	--		--
<i>Mentha x piperita</i>	Plant	--	--		ANON. 1948-1976. The Wealth of India raw materials. Publications and Information Directorate, CSIR, New Delhi. 11 volumes.

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Menyanthes trifoliata</i>	Plant	--	--		Madaus, G. 1976. Lehrbuch der Biologischen Hilfsmittel. Vol., 1-3. 2862 pp. (+ 144 p. index). Georg Olms Verlag, Hildesheim. Reprint of 1938 Madaus.
<i>Monarda fistulosa</i>	Essential Oil	--	--		Guenther, E., The Essential Oils, 6 volumes, D. van Nostrand, New York, 1948-1952.
<i>Morinda citrifolia</i>	Plant	--	0.02	-0.7153735267894865	--
<i>Morus alba</i>	Leaf	--	--		--
<i>Musa x paradisiaca</i>	Fruit	--	--		Rizk, A.F.M. and Al-Nowaihi, A.S., The Phytochemistry of the Horticultural Plants of Qatar, Scientific and Applied Research Centre, University of Qatar.
<i>Myristica fragrans</i>	Seed	--	--		--
<i>Myristica fragrans</i>	Seed Essent. Oil	--	--		--
<i>Myrtus communis</i>	Plant	0	1	-0.6988076937022064	Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
<i>Neurolaena lobata</i>	Plant	--	--		--
<i>Nicotiana tabacum</i>	Leaf	--	--		ANON. 1948-1976. The Wealth of India raw materials. Publications and Information Directorate, CSIR, New Delhi. 11 volumes.
<i>Ocimum basilicum</i>	Essential Oil	--	--		--
<i>Ocimum gratissimum</i>	Plant	--	--		Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
<i>Ocimum tenuiflorum</i>	Plant	--	--		--
<i>Panax ginseng</i>	Shoot	--	--		--
<i>Panax quinquefolius</i>	Plant	126	126	1.414181220491693	--

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Pelargonium graveolens</i>	Essential Oil	--	--		--
<i>Peucedanum ostruthium</i>	Root	--	--		--
<i>Polygonum hydropiper</i>	Plant	--	--		--
<i>Prunus armeniaca</i>	Essential Oil	--	--		--
<i>Prunus cerasus</i>	Fruit	--	--		--
<i>Prunus persica</i>	Fruit	--	--		--
<i>Pyrus communis</i>	Plant	--	--		--
<i>Rheum rhabarbarum</i>	Pt	--	--		--
<i>Ribes nigrum</i>	Fruit	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Ribes rubrum</i>	Fruit	--	--		--
<i>Ribes uva-crispa</i>	Fruit	--	--		--
<i>Rosa canina</i>	Seed	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Rosmarinus officinalis</i>	Resin, Exudate, Sap	--	--		--
<i>Rubus idaeus</i>	Plant	--	--		--
<i>Saussurea lappa</i>	Root Essent. Oil	--	--		--
<i>Schoenocaulon officinale</i>	Seed	--	--		--

Plant	Part	Low PPM	High PPM	StdDev	Reference
<i>Scutellaria baicalensis</i>	Root Essent. Oil	--	--		--
<i>Sterculia urens</i>	Gum	--	--		--
<i>Tagetes minuta</i>	Essential Oil	--	--		--
<i>Tamarindus indica</i>	Fruit	--	--		ANON. 1948-1976. The Wealth of India raw materials. Publications and Information Directorate, CSIR, New Delhi. 11 volumes.
<i>Telosma cordata</i>	Flower	2610	2610		K. Furukawa, T. Arai, S. Hashimoto, (1993); Volatile components of <i>Telosma cordata</i> Merrill flowers, Flavour Fragr. J., Vol 8, 221-223.
<i>Theobroma cacao</i>	Seed	1520	7100	1.3864579714312821	--
<i>Thuja occidentalis</i>	Branches	--	--		--
<i>Thymus mastichina</i>	Plant	--	--		Lawrence, B.M., Essential Oils 1976-1977, Essential Oils 1978, Essential Oils 1979-1980.
<i>Trifolium pratense</i>	Root	--	--		--
<i>Trifolium pratense</i>	Fruit	--	--		--
<i>Urtica dioica</i>	Plant	--	--		--
<i>Vaccinium corymbosum</i>	Fruit Juice	0.7	0.7	0.9999999999999999	--
<i>Vaccinium myrtillus</i>	Fruit Juice	0.32	0.32	-0.9999999999999999	--
<i>Valeriana jatamansi</i>	Root	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
<i>Valeriana officinalis</i>	Root	--	--		--
<i>Vanilla planifolia</i>	Fruit	--	151	-0.5995643718999257	--

<b>Plant</b>	<b>Part</b>	<b>Low PPM</b>	<b>High PPM</b>	<b>StdDev</b>	<b>Reference</b>
Veratrum album	Rhizome	--	--		--
Veratrum viride	Rhizome	--	--		--
Viburnum opulus	Bark	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
Viburnum opulus	Root Bark	--	--		--
Viburnum prunifolium	Bark	--	--		--
Vitis vinifera	Fruit	1500	2000	-0.06645757225743394	List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
Vitis vinifera	Leaf	--	--		List, P.H. and Horhammer, L., Hager's Handbuch der Pharmazeutischen Praxis, Vols. 2-6, Springer-Verlag, Berlin, 1969-1979.
Zingiber officinale	Rhizome	--	--		--
Zingiber officinale	Rhizome Essent. Oil	--	--		--