

Dr. Duke's Phytochemical and Ethnobotanical Databases

Chemicals found in *Cyamopsis tetragonoloba*

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
0	PROTEIN	Seed	242000.0	362000.0	1.1404403733742927	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	CARBOHYDRATES	Shoot	697000.0	782000.0	1.0817725502152693	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
15	FIBER	Shoot	131000.0	258000.0	0.8880777335227723	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
15	FIBER	Leaf	97000.0	228000.0	0.8219169280936776	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	ASH	Leaf	144000.0	165000.0	0.8130765270791607	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	CARBOHYDRATES	Leaf	574000.0	707000.0	0.7566939770077538	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	PROTEIN	Leaf	225000.0	252000.0	0.4005844311513218	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
28	CALCIUM	Leaf		24200.0	0.3937598773084697	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
28	CALCIUM	Shoot	7430.0	19800.0	0.3692304919069643	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
27	LINOLEIC-ACID	Seed Oil		472000.0	0.3180948503279217	Varade, P. B., Misra, B. K., Sikka, K. C., Singh, S. P. 1984. Nutritive Assessment of Guar Oil (<i>Cyamopsis tetragonoloba</i> L. Taub). <i>J Agr Food Chem</i> , 32(5): 1073-1075.
0	WATER	Fruit		825000.0	0.236641791750783	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	PROTEIN	Shoot	119000.0	211000.0	0.0029003981990752305	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
13	PALMITIC-ACID	Seed Oil		179000.0	-0.01895036765611912	Varade, P. B., Misra, B. K., Sikka, K. C., Singh, S. P. 1984. Nutritive Assessment of Guar Oil (<i>Cyamopsis tetragonoloba</i> L. Taub). <i>J Agr Food Chem</i> , 32(5): 1073-1075.
0	ASH	Seed	33000.0	43000.0	-0.14678225213812016	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
53	BETA-CAROTENE	Fruit		2.0	-0.14693466516508752	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
18	OLEIC-ACID	Seed Oil		290000.0	-0.16298033837697343	Varade, P. B., Misra, B. K., Sikka, K. C., Singh, S. P. 1984. Nutritive Assessment of Guar Oil (Cyamopsis tetragonoloba L. Taub). J Agr Food Chem, 32(5): 1073-1075.
6	IRON	Shoot		331.0	-0.2250517161113515	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
112	ASCORBIC-ACID	Shoot		2800.0	-0.23555395280964694	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
4	PHOSPHORUS	Shoot	1600.0	2855.0	-0.24195509734336013	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
112	ASCORBIC-ACID	Fruit		490.0	-0.2540222790363039	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
6	IRON	Fruit		58.0	-0.29741781491919245	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
14	POTASSIUM	Shoot		19100.0	-0.3338334397526517	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
4	PHOSPHORUS	Leaf		2700.0	-0.41791805519896574	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	FAT	Shoot	2400.0	24000.0	-0.4258935674266053	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
8	STEARIC-ACID	Seed Oil		58000.0	-0.46568311898509607	Varade, P. B., Misra, B. K., Sikka, K. C., Singh, S. P. 1984. Nutritive Assessment of Guar Oil (Cyamopsis tetragonoloba L. Taub). J Agr Food Chem, 32(5): 1073-1075.
0	ASH	Shoot	75000.0	80000.0	-0.5227382651464656	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
28	CALCIUM	Fruit		1300.0	-0.5898896055857143	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	FAT	Fruit		2000.0	-0.6259762506792121	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
53	BETA-CAROTENE	Shoot		11.0	-0.6744401420904678	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
4	PHOSPHORUS	Fruit		500.0	-0.8249556409969647	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	FAT	Leaf		9000.0	-0.9457674024745288	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	PROTEIN	Fruit		37000.0	-0.9718744540749881	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	ASH	Fruit		14000.0	-1.1047928929878599	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
15	FIBER	Fruit		23000.0	-1.1198873805281946	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	FAT	Seed		27000.0	-1.255672714114354	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
0	CARBOHYDRATES	Fruit		122000.0	-3.5340739619094204	CRC Handbook of Medicinal Herbs and/or CRC Handbook of Proximate Analyses
43	PROTocatechuic-acid	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonolobus). Plant Biochem J, 5: 140-145.
0	FLUOROACETIC-ACID	Gum		9.5		Vartiainen, T., Gynther, J. 1984. Fluoroacetic Acid in Guar Gum. Food Chem Toxicol, 22(4): 307-308.
77	CHLOROGENIC-ACID	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	KAEMPFEROL-7-O-BETA-D-GLUCOSIDE-3-GLYCOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
6	CONIFERYL-ALCOHOL	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonolobus). Plant Biochem J, 5: 140-145.

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
77	CHLOROGENIC-ACID	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	KAEMPFEROL-7-O-BETA-D-GLUCOSIDE-3-GLYCOSIDE	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	P-HYDROXYCINNAMYL-ALCOHOL	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonoloba). Plant Biochem J, 5: 140-145.
0	KAEMPFEROL-3-O-RUTINOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
1	JUGLANIN	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonoloba). Plant Biochem J, 5: 140-145.
6	MYRISTIC-ACID	Seed Oil				Varade, P. B., Misra, B. K., Sikka, K. C., Singh, S. P. 1984. Nutritive Assessment of Guar Oil (Cyamopsis tetragonoloba L. Taub). J Agr Food Chem, 32(5): 1073-1075.
0	KAEMPFEROL-3-O-RUTINOSIDE	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	3-EPIKATONIC-ACID	Seed				Coxon, D. T., Wells, J. W. 1980. 3-epikatonic acid from Guar Meal, Cyamopsis tetragonoloba. Phytochemistry, 19: 1247-1248.
25	P-COUMARIC-ACID	Silk Stigma Style				Kandasamy, M. K. 1986. The Stigmatic Exudate of Cyamopsis tetragonoloba L. Taub. Biochem Physiol Pflanz, 181(8): 571-575.

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
0	TEXASIN-7-O-BETA-D-GLUCOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	7-O-BETA-(2-RHAMNOSYL-GLUCOSYL)-MYRICETIN	Seed				Singh, J., Kaushal, G. P., Sood, R. 1989. A New Flavonol Glycoside from Guar (Cyamopsis tetragonoloba L. Taub). J Indian Chem Soc, 66(11): 833-834.
0	QUERCETIN-3-O-BETA-D-RUTINOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	7-O-BETA-(2-RHAMNOSYL-GLUCOSYL)-MYRICETIN	Leaf				Singh, J., Kaushal, G. P., Sood, R. 1989. A New Flavonol Glycoside from Guar (Cyamopsis tetragonoloba L. Taub). J Indian Chem Soc, 66(11): 833-834.
0	GUARAN	Seed				Karaw-Ya, M. S., Ammar, N. M., Al-Okbl, S. Y. 1994. Studies on Guaran as Hypoglycemic Agent. Fac. Pharmacy, Cairo University, Cairo 11562 Egypt. Egypt J Food Sci, 22(1): 1-12.
0	DAIDZEIN-7-O-BETA-D-GLUCOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
176	QUERCETIN	Fruit				Daniel, M. 1989. Polyphenols of Some Indian Vegetables. Curr Sci, 58(23): 1332-1334.
62	GALLIC-ACID	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonoloba). Plant Biochem J, 5: 140-145.
0	2,3,4-TRIHYDROXY-BENZOIC-ACID	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
51	ELLAGIC-ACID	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	P-COUMAROYL-QUINIC-ACID	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
102	CAFFEIC-ACID	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
75	KAEMPFEROL	Fruit				Daniel, M. 1989. Polyphenols of Some Indian Vegetables. Curr Sci, 58(23): 1332-1334.
62	GALLIC-ACID	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
0	7-O-BETA-D-GLUCOSIDE-3-O-(2-DIRHAMNOSYL-GLUCOSYL)-KAEMPFEROL	Leaf				Singh, J., Kaushal, G. P. 1992. A New Flavonol tetraglycoside From Guar (Cyamopsis tetragonoloba) Leaves. J Indian Chem Soc, 69(6): 345-346.
0	MYRICETIN-7-O-BETA-D-GLUCOSIDE-3-GLYCOSIDE	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
7	ASTRAGALIN	Leaf				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
8	GENTISIC-ACID	Fruit				Bajaj, K. L., Rani, M., Arora, Y. K. 1978. Polyphenols and Lignins of Mature Guar Pods (Cyamopsis tetragonoloba). Plant Biochem J, 5: 140-145.

Activities Count	Chemical	Plant Part	Low PPM	High PPM	StdDev	Reference Citation
0	FLUROACETIC-ACID	Fruit		1.0		Vartiainen, T., Gynther, J. 1984. Fluoroacetic Acid in Guar Gum. Food Chem Toxicol, 22(4): 307-308.
0	MYRICETIN-7-O-BETA-D-GLUCOSIDE-3-GLYCOSIDE	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.
7	ASTRAGALIN	Seed				Kaushal, G. P., Bhatia, I. S. 1982. A Study of Polyphenols in the Seeds and Leaves of Guar (Cyamopsis tetragonoloba L. Taub). J Sci Food Agr, 33: 461-470.