



Mother Nature's Treasure: Sustainable Use of Baobab

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Introduction

Have you ever caught gold in your hands and let it fall while it can wipe your problems and turn you into a millionaire?

Welcome to the body's goldmine. We equate baobab to treasured gold because it can enrich the body in many ways. Baobab contains almost all types of nutrients in scales higher than we can estimate,

Explorer ;Adansonia drank baobab juice twice a day and was healthy throughout his study in Africa, and it lasts for longer periods in the stomach .

Baobab is indeed not a new term to everyone ,we have come across it in the markets as snacks or powder or even juice, but how much of its value are we aware of ? Do we consume it as a custom or because it is sweet and appealing to the eyes?

This project digs deep into finding importance's of Baobab and airing them to the society. One might think they are familiar with Baobab but we assure you in these findings you will find something you were not aware of.

Baobab is available in 9 species of which 2 are in Africa,6 in Madagascar and 1 in Asia. The plant grows mostly in dry climate as it highly stores water and needs a high amount of sunlight and shallow sand.

It sadly takes 15-20 years to fruit that is why we have highlighted an alternative method to reduce the time to 5 years.

Method

We collected baobab fruits and leaves from the baobab tree found in our school environment.

The pulp was crushed from the seed to obtain its powder, the seeds and leaves were dried in the sun and then grounded into a powdery form.

The powders(of the pulp, seeds, and leaves) were dissolved in distilled water to make sample solutions A, B, and C for pulp, seed and leaves respectively.

Results

The seed is pressed to produce oil processed for hair and skin uses; provides solution to broken and dry skin ,damaged and light hair it has magic which will leave you as tender as a baby.

The leaves contain 10.6% protein on dry weight basis .

In terms of WHO standards they are rated good as for each of the essential amino acids categories baobab leaves score to 100% mark.

Young leaves are fresh vegetables rich in vitamins and cheaply available with high medicinal values.

Baobab roots are used as herbs by natives and are highly used in the production of dye.

Also roots from young seedlings can be eaten raw like carrots.

The fruit pulp contains 10X much fibre than apples

6X the vitamin C of oranges

6X the potassium of bananas

Twice the calcium content of milk

More magnesium than coconut water

66% more iron than spinach

6X the anti oxidants of blueberries

Wild animals like elephants get water from the tree trunk as it can hold up to 120000 litres of water

Conclusion

Inspired by project findings we highly recommend that baobab should be in taken by everyone at least once per day for better health. It is traditionally believed that baobab is not planted rather grows naturally , however we oppose this by highlighting potting method which involves planting baobab seed in a pot with soil and favourable conditions like medium water and vast amount of sunlight and this treasure may be available in your backyard.

Also grafting the branches of the fruiting trees to seedlings decreases maturity time from 15-20 years to 5 years hence faster fruit growth.

As baobab is graced to few countries including Tanzania it is a great opportunity to export it to outside countries, this will greatly boost our economy. Tourism also benefits from old Baobab example 'THE SUNLAND BAOBAB' in South Africa which serves cocktail.

"Baobab for younger and happier looks and better economy".

References

DR Esther Nkuba of Tanzania food and nutrition center

Biology book 4

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THE PULP	
NUTRIENT	AMOUNT (per 100 g)
Protein(amino acids)	2.04-3.24 (g)
Sugar(glucose)	16.9-25.30 (g)
Dietary fibre*	45.8- 53.90 (g)
Pectin	23.4- 33.80 (g)
Vitamin C*	74.00-163.0 (mg)
Vitamin B1	0.01-0.09 (mg)
Vitamin B2	0.01-0.03 (mg)
Potassium*	2010.00-2390.00(mg)
Calcium*	257.00-370.00 (mg)
Magnesium*	126.00-179.00 (mg)
Iron*	3.95-9.13 (mg)

