



A Low Cost Vegetable Cutting Machine

138. Edmund Rice Sinon

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Introduction:

Grace Temu and Nancy Godfrey are young scientists of Tanzania from Edmund Rice Sinon Secondary School Arusha coming with a newly, simple, modified and multipurpose technological machine for cutting vegetable like Legumes leaves, Spinach, Chinese, Tomato, Green pepper, Carrot, Green beans etc. It's our hope that this absolute technological Instrument will help both the local and urban people especially our sisters and mother as well as business people.

Method:

A plastic container is cut in a flat round shape.
 The ^ and v shapes are cut on the right and left of the flat lid-like structure respectively.
 Cut the marks as the way you marked them by using a strong knife.
 Apply glue aside the cuts of the marked signs.
 Place the long sharpeners in X sign as seen in the pictures.
 Take another container and the lid of the container and then put a hole at the container's lid.
 Tight the first plastic round using a screw.
 The lid with a hole is attached to motor and tightened , then a small cut around side the lid is made.
 The small round side made is joined with another plastic of the same size as the round so as to place on your vegetables.
 Put the lid on top of its container and use another small plastic bottle to cover the motor from becoming wet/moisten.
 Then connect the motor with a cable direct to an electric source (a socket or solar panel with inverttr).
 The vegetable is then put on the side round of your lid and hence enjoy the results.



Results:

The research we did around Muriet and Olkereyan villages in Arusha had shown that many people get to spend too much time and energy when it comes into cutting vegetables for preparation of meals. This can be proved by Mrs. Laizer (Mama Neema) from Olkereyan whom we spoke with in our project conversation session. Not only her but also Mr. Jembe said the same thing and added that it sometimes cause injuries since the knives have to be in direct contact with one's hands.
 By doing this project we became more aware of the problems faced by most of the families both in urban and rural areas in cutting vegetables especially by using the local methods (hand knives).
 After several experiments, the results showed that our equipment has brought hope of reducing if not eliminating completely those problems.

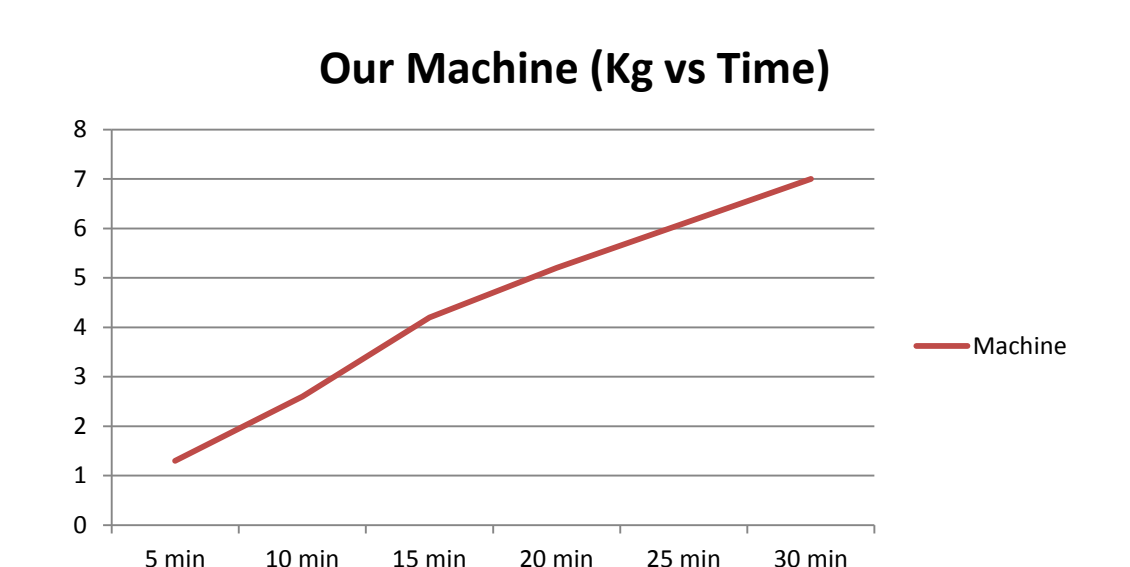
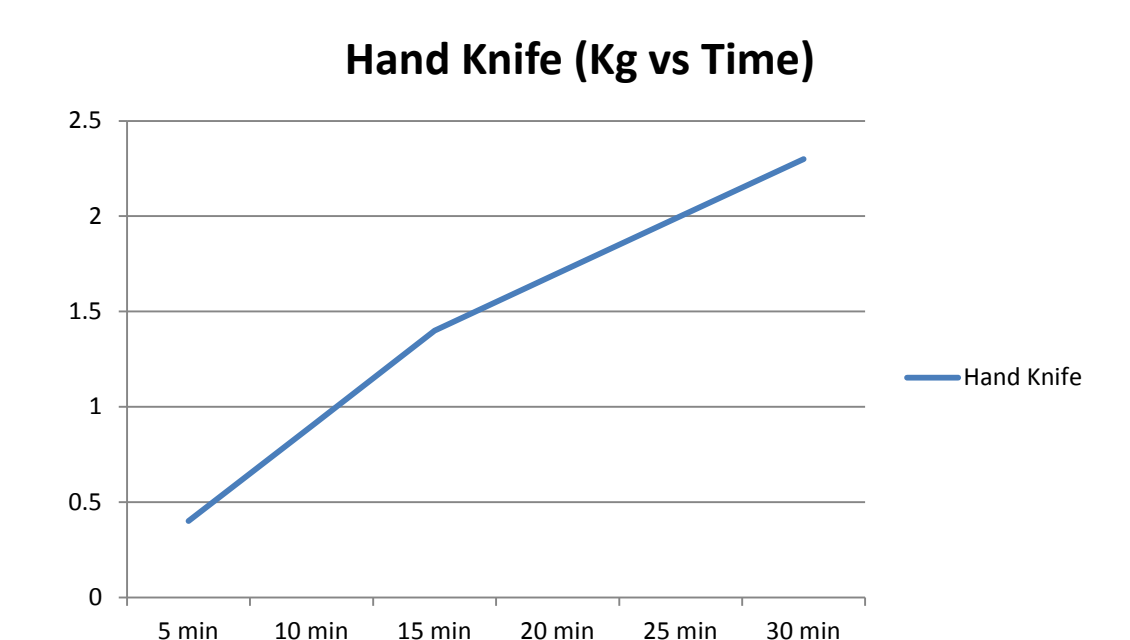


Table of result comparing our Vegetable Cutting Machine to Local Method (Hand Knife).

Time (Min):	5	10	15	20	25	30
Hand Knife (Kg):	0.4	0.9	1.4	1.7	2.0	2.3
Our Machine (Kg):	1.3	2.6	4.2	5.2	6.1	7.0



Conclusions

From the results above, we conclude by saying that our Vegetable Cutting Machine is the best and emerging technology to be used at home both in urban and rural areas.
 The following are the advantages of our Vegetable Cutting Machine:
 It is portable.
 It save time.
 It is affordable.
 It is friendly to our environment.
 It involves recycling processes.
 It can be used as a source of income.
 It is multipurpose.
 Does not need high skills when using or making.

References

Creativity and positive clear focus toward societal technological advancement led us to research from various sources like: Internet, Library, and Homes as Well as Workshops.

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