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Flaxseed Namkeen – A Good Source Of Functional Food

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Abstract:

Today functional food are widely used in the field of food science. Due to their health benefits among health conscious consumers. In this research paper, flaxseed is used as functional food which gives many health benefits. Flaxseed is cultivated in various parts of the whole world for fibers, flaxseed oil and also for medicinal purpose. It is rich in dietary fibers and healthy fat, so it is helpful to reduce cholesterol level of hypothyroid patients. The hypothyroidism occurs, when the thyroid glands produce too much or too less amount of thyroid hormones. The hypothyroidism affects around 10-15 % of the human population all over the world. The review highlights the benefits of flaxseeds and its role as a therapeutic medicinal food.

Keywords: flaxseed, hypothyroidism, flaxseed snacks, dietary fiber, good fat.

Introduction: Flaxseed (*Linum usitatissimum* L.) grown from the flax plant, which produces annually. It is generally used as a food as well as medicine also. *Linum usitatissimum* L. means “very useful”. It is mainly produced in two varieties: brown and yellow or golden. Flaxseed is very important oilseed crop for all industries for food, feed and fiber purpose. Every part of flaxseed plant is used either directly or after processing. The seeds contain oil which is rich in omega 3 fatty acid, linolenic acid, lignans and large amount of soluble fibers. Flaxseed is beneficial for many health problems but if it took in small amount. It is gluten free and has a nutty flavor so it can be consumed easily.

Flaxseed is consumed directly or grounded form. So the present study is designed to see the effect of flaxseed snacks which is made for the purpose of hypothyroid patients.

Health benefits of flaxseed:

- Flaxseeds are loaded with many nutrients such as Protein, carbohydrates, fibers, saturated fat, omega 3 fatty acids, vitamins, calcium, minerals, iron, magnesium and phosphorous etc.
- It is good source of omega 3 fatty acids
- Flaxseed are rich source of lignans
- Seeds are rich in dietary fibers
- They contain good quality protein
- It helps to control blood sugar level
- It is helpful to reduce cholesterol level

Material and methods:

In the present study, The material and method are concluded for the production of flaxseed namkeen (snack) for the purpose of weight loss.

Raw material used to make Flaxseed namkeen:

The raw material used to make such a tasty flaxseed namkeen are as follows- fresh well graded, good colored flaxseed, oats, flattened rice (Poha), gram(Chana), coriander seeds, rock salt, oil and chat masala are purchased from the good quality shop of Gwalior city. The flaxseed namkeen easily preserve for one month in room temperature.

Flow chart of preparing flaxseed namkeen (Snacks):

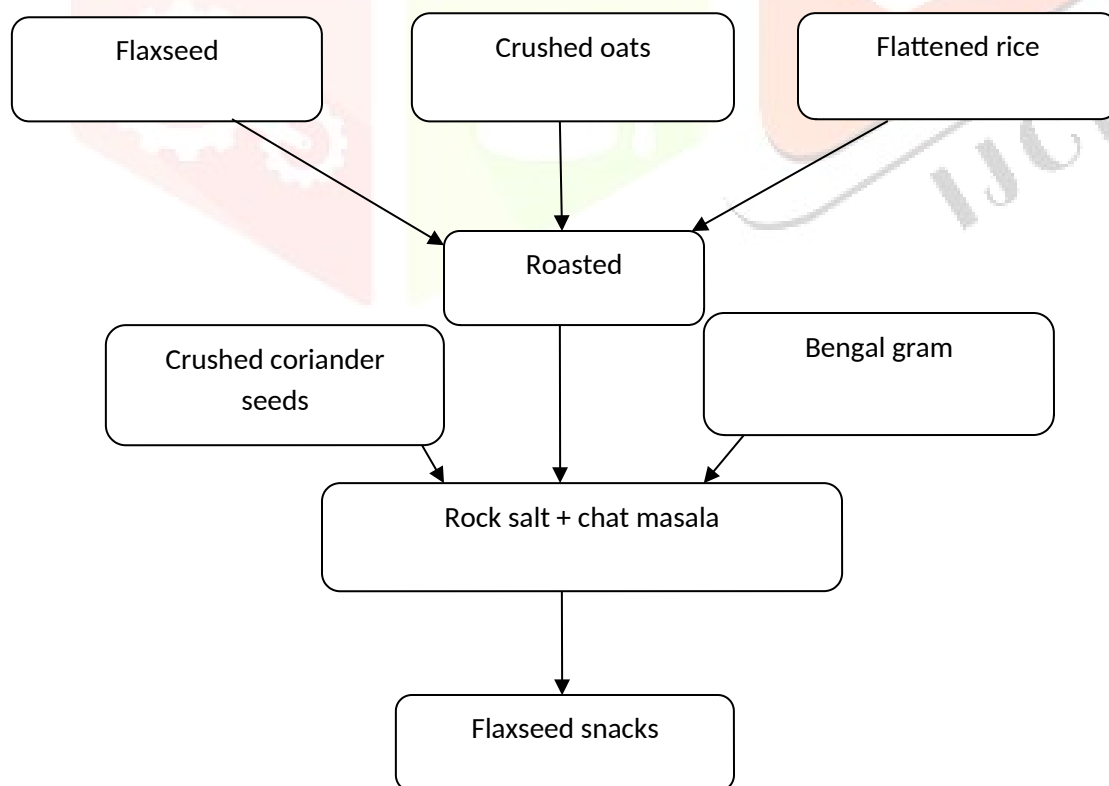


Table 1: formulation and standardization of Flaxseed Snack per 100 gm.

Ingredients	FS1	FS2	FS3	FS4	FS5	FS6
Flaxseed(gm)	45	48	50	40	47	45
Oats(gm)	20	20	20	17	15	12
Flattened rice(gm)	15	15	15	25	20	20
Gram(gm)	14	12	13	12	10	12
Coriander Seeds (gm)	02	03	-	03	05	03
Rock Salt(gm)	01	01	1.5	2.5	2.5	2.5
Oil (ml)	02	-	-	-	-	05
Chat Masala (gm)	01	01	0.5	0.5	0.5	0.5

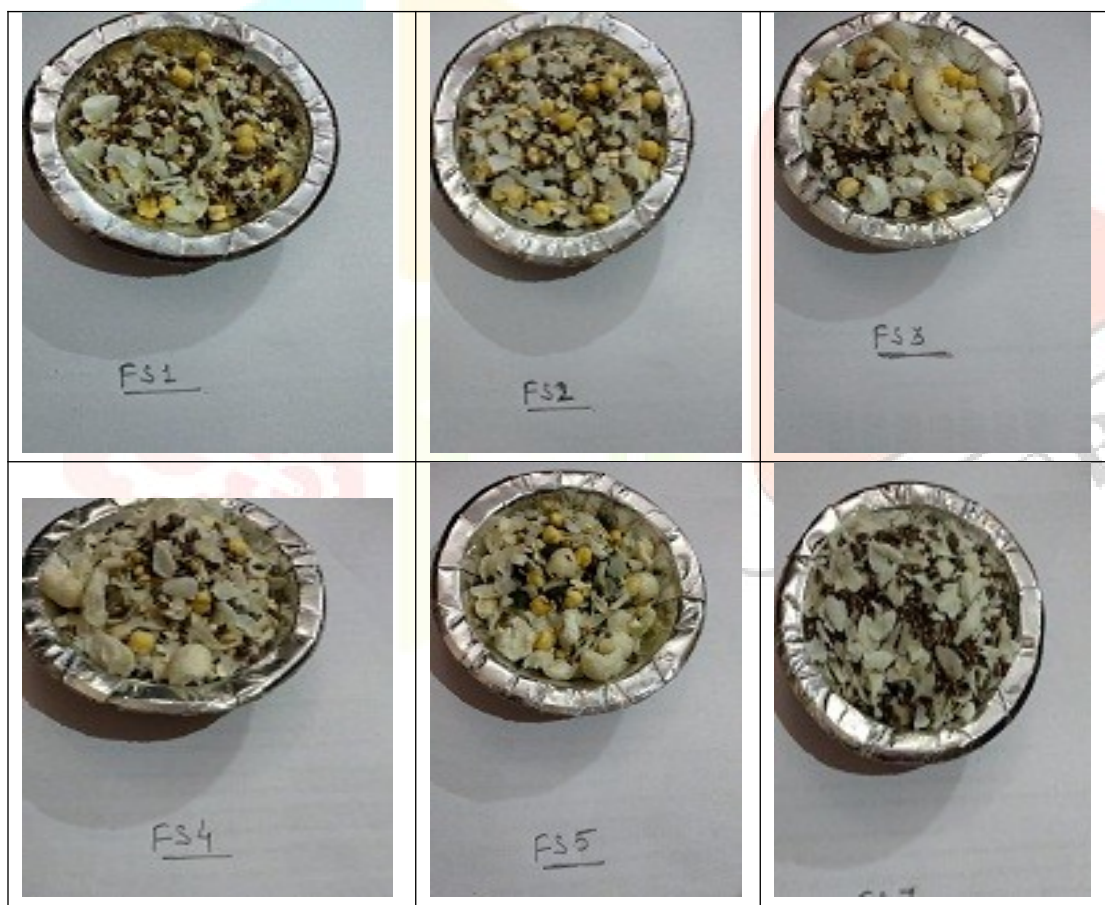


Table 2: Nutritional Analysis of Flaxseed Snack

S. No.	Test Parameter(s)	Test Method Used	Results (Unit)
1.	Moisture	IS 1011: 2002 (RA :2009)	3.32 g/100g
2.	Fat*	FSSAI LAB MANUAL	23.21 g/100G
3.	Carbohydrate*	Calculation Method	48.72 g/100g
4.	Protein*	FSSAI LAB MANUAL	20.11 g/100g
5.	Crude Fiber	IS 1155:1966 (RA:2015)	0.42 g/100g
6.	Iron*	Spectrophotometer Method	5.15 mg/100g
7.	Calcium*	Spectrophotometer Method	419.17 mg/100g
8.	Phosphorous*	Spectrophotometer Method	431.25 mg/100g

Result and Discussion: The result has been explained with the help of different tests. In the result, over all acceptability of flaxseed snack which is made by mixing many ingredients like flaxseeds, oats, gram, flattened rice, rock salt and chat masala to reduce weight. This flaxseed snack is tasty as well as healthy. So everyone can easily eat this product. Trial 2 (FS 2) have more acceptable than all other trials which is given in table 1. And the final nutritional value of the acceptable product is given in table 2. This nutritional value is come from the different test methods.

References:

- B.Dave Oomah, G. M. (1998, januart). Flaxseed products for disease prevention. Bhatta, R. (1995, january). Nutrient composition of whole flaxseed meal. In: Cunnane SC. Flaxseed in Human Nutrition.
- Charu Katare, S. S. (2012, january). Flax Seed: Apotential medicinal food. K.K. Singh, D. J. (2011, march 03). Flaxseed: A potential Source of food, feed and fibre.
- Moetazza M Alshafel, S. K. (2015). Flaxseed as functional food. *Research journal of Pharmceutical, Biological and Chemical sciences* .
- Nahida Rashid, P. A. (2018). Alsi(*Linum Usitatissimum*(Linn.): Apotential Multifaceted Unani Drug. *Journal of Pharmacognosy and Phytochemistry* , 3294-3300.
- Priyanka Kajla, A. S. (2015). Flaxseed- a potential functional food source. *Journal of food science and technology* .
- Rajju Priya Soni, M. K. (2015, july 23). Flaxseed-composition and its health benifits.
- Sadia Chishty, M. B. (2016). Health benefits and nutritional value of Flaxseed- a review. *Indian journal of Applied research* .