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Study of efficacy of *Narikel Magaja Lepa* in management of *Mukhadushika*

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A B S T R A C T

In Ayurvedic texts skin is one of the five *Gyanindriyas*. *Mukhadushika* is one of the skin disorders. It is the disease that almost takes place in young age and affects the beauty as well as personality and it has a cosmetic importance. In Today's era due to the lifestyle of people, eating habits and late-night sleep *Mukhadushika* (acne) is the common disorder. In *Mukhadushika* there will be swelling, pain, redness, itching and there will be vitiation of Kapha, *Vata* and *Pitta Dosha* whereas according to modern science it is due to infection of certain organ. The features of *Mukhadushika* are similar to those of acne. It has been considered as one of the common skin disorders as well as the disease of adolescent. According to *Acharya Vagbhat Narikel Magaja Lepa* is useful.

Key words: *Mukhadushika, Acne, Narikel Magaja Lepa, Lifestyle.*

INTRODUCTION

Skin is one of the five *Gyanindriyas* as described in Ayurvedic text. *Mukhadushika* means the disease almost takes place in young age. Among the Ayurvedic amenities, *Acharya Sushruta* was the first and foremost to mention a whole group of such disease of the skin which have an adverse effect on the appearance and personality of an individual and having surgical or parasurgical measures as its cure. He named three ailments as *Kshudra Roga*.

Mukhadushika is one of them, which affects the beauty as well as personality and it has a cosmetic importance. This may be the reason behind the absence of such a category of diseases in *Charaka Samhita* as it deals with only medicinal measures.

The features of the disease *Mukhadushika* are similar to those of acne. It has been considered as one of the common skin disorders as well as the disease of adolescent and occurs to be a valuable degree almost in every individual. Vitiation of *Kapha*, *Pitta Dosha* along with *Dushya Rakta* gives rise to symptoms like swelling, pain, redness, itching in *Mukhadushika*.

Modern science believes that it is due to infection of certain organ., but the disease is no more a simple reaction to bacterial infection. It is complex nature of

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underlying stress, influencing of endocrine glands of the body, particularly the ovary & testis, race, age, nutritional status, temperature, excessive use of cosmetics also influences the etiology to a greater extent.

All these facts necessitate searching for a better remedy from the natural resources like herbs and minerals and other measures of Ayurveda.

Selection of *Narikel Magaja Lepa* is based on recommendation of Acharya *Vagbhata* on *Mukhadushika*. This disease is very stubborn in nature; perhaps this might be the reason that almost all the Acharyas have advocated such a difficult & critical procedure for the management of the disease.

MATERIALS AND METHODS

Selection of patients

Total 60 subjects have been randomly selected for study as per inclusion & Exclusion criteria.

Inclusion Criteria

- Voluntary willing subjects will be taken for study

- The subjects of any caste, income group, any occupation will be selected

- Age group will be 16-35 years, both the genders patients will be included

- Subjects having *Mukhadushika* and chronic cases of *Mukhdushika* who had not taken any local medications for last one month.

Exclusion Criteria

- The subjects not willing for trial study.

- Subjects below 16 yrs and above 35 yrs age.

- Having blood coagulopathies

- Benign or malignant growth in body.

- Immuno-compromised patients

- Associated with other local skin diseases and other systemic diseases like DM, HTN

Clinical Study

Grouping and Sampling

Total 60 patients of *Mukhadushika* were registered for the present study. They were randomly divided into two groups.

Control group (Diet and Activities)

The patients of this group were advised to avoid *Viruddha Ahara Vihara* and avoid irritable activities regarding *Mukhadushika*.

Study Group: (Diet, Activities and *Narikel Magaja Lepa*)

These patients were advised to avoid *Viruddha Ahara Vihara* and irritable activities as described in control group along with this they were advised to apply the *Narikel Magaja Lepa* twice daily for a month.

Drug, dose & duration of Therapy

Drug: *Narikel Magaja Lepa* in paste form.

Interventions

Drug: *Narikel Magaja* pulp

Dose: Local application

Duration: 28 days

Time: At morning and evening

Purva Karma:

Collection of essential material: *Narikel* (immature) *Magaja* pulp, *Khalvayantra* (mixer or grinder), bowl (for collecting paste), cotton, water (for cleaning of face)

Preparation of patients and *Pradhan Karma*

The entire patient was instructed to avoid application of any fragrant material on lesion at least before one day. Lesion was cleaned by water and dried with cotton. Patient was instructed for taking the paste of *Narikel Magaja Lepa* and then advised to apply it on pimples as the thickness said by *Acharyas* for *Varnya Lepa*. Keep it on pimples till it becomes dry. When it becomes dry then pour some water on dried *Lepa* then remove it by cotton.

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Pashchat Karma

After *Pradhan Karma*, patient was advised to be relax for sometimes. After application of *Narikel Magaja Lepa*, if there are some reactive symptoms like *Kandu*, *Shoth*, redness or rashes, then immediately remove the *Lepa* by cotton. But don't apply it again. And apply '*Siddha Tail*' or '*Ghrit*' at that site.

Criteria for Assessment

All the patients were examined by 15 days follow ups during the treatment. The improvement provided by the therapy was assessed on the basis of relief in the sign and symptoms of the disease *Mukhadushika*. All the sign and symptoms were assigned score depending upon their severity to assess the effect of the drugs objectively before and after treatment.

The assessment criteria are as follows:

1. *Shool* (pain)
2. *Shotha* (Swelling)
3. *Srava* (discharge)
4. *Daha* (burning sensation)
5. *Vivarnata* (discoloration of skin)
6. *Kandu* (Itching)
7. *Pitika Sankhya* (no. of pimples)

OBSERVATION

In the present study, 60 patients of *Mukhadushika* were registered. Out of which, 30 patients from control group were completed the full duration of treatment and while 9 patients left the treatment stages. All the 60 patients of *Mukhadushika* were randomly divided into two groups.

Table 1: Frequency distribution of patients according to Age

Age	Control group		Test group	
	Frequency	%	Frequency	%
15 to 20 yrs.	13	43.33	11	36.67
21 to 25	8	26.67	9	30.00
26 to 30	7	23.33	7	23.33
31 to 35	2	6.67	3	10.00
Total	30	100.00	30	100.00

Table 2: Frequency distribution of patients according to Sex

Sex	Control group		Test group	
	Frequency	%	Frequency	%
Male	14	46.67	15	50.00
Female	16	53.33	15	50.00
Total	30	100.00	30	100.00

Table 3: Frequency distribution of patients according to *Kandu*

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
No	2	2	1	20
%	6.67	6.67	3.33	66.67
Mild	6	9	9	9
%	20.00	30.00	30.00	30.00
Moderate	11	13	11	1
%	36.67	43.33	36.67	3.33
Severe	11	6	9	0
%	36.67	20.00	30.00	0.00
Grossly severe	0	0	0	0
Total	30	30	30	30
%	100	100	100	100

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Table 4: Frequency distribution of patients according to *Shotha*

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
No	1	2	1	20
%	3.33	6.67	3.33	66.67
Mild	10	7	9	9
%	33.33	23.33	30.00	30.00
Moderate	14	13	11	1
%	46.67	43.33	36.67	3.33
Severe	5	8	9	0
%	16.67	26.67	30.00	0.00
Grossly severe	0	0	0	0
%	0.00	0.00	0.00	0.00
Total	30	30	30	30
%	100	100	100	100

Table 5: Frequency distribution of patients according to *Vivarnata*

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
No	5	4	2	15
%	16.67	13.33	6.67	50.00
Mild	5	5	9	11
%	16.67	16.67	30.00	36.67
Moderate	7	14	19	4
%	23.33	46.67	63.33	13.33
Severe	13	7	0	0
%	43.33	23.33	0.00	0.00
Grossly	0	0	0	0

severe				
%	0.00	0.00	0.00	0.00
Total	30	30	30	30
%	100	100	100	100

Table 6: Frequency distribution of patients according to Sankhya

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
No	2	0	3	23
%	6.67	0.00	10.00	76.67
Mild	6	15	2	6
%	20.00	50.00	6.67	20.00
Moderate	9	12	14	1
%	30.00	40.00	46.67	3.33
Severe	11	3	9	0
%	36.67	10.00	30.00	0.00
Grossly severe	2	0	2	0
%	6.67	0.00	6.67	0.00
Total	30	30	30	30
%	100	100	100	100

Table 7: Frequency distribution of patients according to *Daha*

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
Absent	14	10	2	28
%	46.67	33.33	6.67	93.33
Present	16	20	28	2
%	53.33	66.67	93.33	6.67

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Total	30	30	30	30
%	100	100.00	100	100

Table 8: Frequency distribution of patients according to *Shool*

Severity	0th day		28th day	
	Control group	Test group	Control group	Test group
No	8	0	0	27
%	26.67	0.00	0.00	90.00
Mild	15	19	3	3
%	50.00	63.33	10.00	10.00
Moderate	7	11	27	0
%	23.33	36.67	90.00	0.00
Severe	0	0	0	0
%	0.00	0.00	0.00	0.00
Grossly severe	0	0	0	0
%	0.00	0.00	0.00	0.00
Total	30	30	30	30
%	100	100	100	100

Factors

To test whether there is significant difference in control group & study group on an average if factors difference in *Kandu* grades, difference in *Srava* grades, difference in *Shotha* grades, difference in *Vivarnata* grades, difference in *Sankhya* grades, difference in *Daha* grades, difference in *Shool* grades is considered.

To test the hypothesis

The null hypothesis H₀: There is no significant difference in control group & study group on an average if factors difference in *Kandu* grades, difference in *Srava* grades, difference in *Shotha*

grades, difference in *Vivarnata* grades, difference in *Sankhya* grades, difference in *Daha* grades, difference in *Shool* grades is considered.

Vs.

The alternative hypothesis Ha: There is significant difference in control group & Study group on an average if factors difference in *Kandu* grades, difference in *Srava* grades, difference in *Shotha* grades, difference in *Vivarnata* grades, Difference in *Sankhya* grades, Difference in *Daha* grades, and Difference in *Shool* grades are considered.

The test used is Mann Whitney test for two independent sample

Ranks	Groups	N	Mean Rank	Sum of Ranks
Difference in Kandu grades	Control group	30	21.70	651.00
	Study group	30	39.30	1179.00
	Total	60		
Difference in Srava grades	Control group	30	23.02	690.50
	Study group	30	37.98	1139.50
	Total	60		
Difference in Shotha grades	Control group	30	21.67	650.00
	Study group	30	39.33	1180.00
	Total	60		
Difference in Vivarnata grades	Control group	30	24.53	736.00
	Study group	30	36.47	1094..00
	Total	60		
Difference in	Control	30	20.10	603.00

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Sankhya grades	group			
	Study group	30	40.90	12227.00
	Total	60		
Difference in Daha grades	Control group	30	19.70	591.00
	Study group	30	41.30	1239.00
	Total	60		
Difference in Shool grades	Control group	30	16.00	480.00
	Study group	30	45.00	1350.00
	Total	60		

Factors	Mann-Whitney	Wilcoxon W	Z	P value
Difference in *Kandu* grades	186.000	651.000	-4.064	0.000
Difference in *Srava* grades	225.500	690.500	-3.500	0.000
Difference in *Shotha* grades	185.000	650.000	-4.078	0.000
Difference in *Vivarnata* grades	271.000	736.000	-2.764	0.006
Difference in *Sankhya* grades	138.000	603.000	-4.827	0.000
Difference in *Daha* grades	126.000	591.000	-5.138	0.000
Difference in *Shoola* grades	15.000	480.000	-6.640	0.000

Since p value <0.05, the level of significance for all factors; there is strong evidence to reject the null hypothesis for the factor stated above.

Statistical Conclusion

There is significant difference in control group & study group on an average if factors difference in *Kandu* grades, difference in *Srava* grades, difference in *Shotha* grades, difference in *Vivarnata* grades, difference in *Sankhya* grades, difference in *Daha* grades, difference in *Shool* grades is considered.

Looking at the mean rank values difference in *Kandu* grades, difference in *Srava* grades, difference in *Vivarnata* grades, difference in *Sankhya* grades, difference in *Daha* grades, difference in *Shool* grades in greater in study group than that in control group.

CONCLUSION

The prevalence of disease was found mostly among the age group of 15-25 years. The common site for *Mukhadushika* was found mostly on face and *Lalata* Pradesh. *Narikel Magaja Lepa* has the *Vatapittashamak*, *Shit Viryatmak* as well as *Varnya* karma properties hence is useful to reduce the symptoms like *Shoth*, *Shool*, *Srava*, *Vivarnata*, *Sankhya*, *Daha*. After authentication and standardization of *Narikel Magaj*a, it was found that there is presence of vitamin A (<1%) which might be useful for skin development and maintenance. There was significant difference in mean values of grades of assessment criteria of control group and study group. Hence study group results were found better than control group i.e., *Narikel Magaja Lepa* is effective and useful in *Mukhadushika*.

REFERENCES

1. Bramhanand Tripathi. Ashtang Hruday. Chaukhambha Sanskrit Pratishthan, Varanasi. Uttarardha, Ch 31, verse 5.

2. Dr Kaviraj Ambita Dutta Shastri. Sushruta Samhita of Maharsi Susruta Edited with Hindi Commentary Ayurved Tattva Sandipika. Chaukhamba Sanskrit Sansthan; Varanasi. Reprint 2010, Nidansthaan, Chapter 13, Verse 39.

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3. Aacharya Pt Radhakrishna Parashar. Sharangdhar Samhita. Baidyanath Ayurved Bhavan, Nagpur. Purvakhanda, Chapter 5, Shlok 25.

4. Vd Gangasahay Pandey. Bhavapraksha Nighantu of Shribhavamisra. Chaukhamba Bharati Academy Varanasi. reprint 2010, Guduchyadi Varga, verse 61/31.

5. Aacharya Pt Radhakrishna Parashar. Sharangdhar Samhita. Baidyanath Ayurved Bhavan, Nagpur. Purvakhanda, Chapter 5, Shlok 25.

6. KN Shastri, GN Chaturvedi. Charak Samhita, Vidyotini Hindi Commentary. Chaukhambha Bharti Academy, Varanasi. 16th edi, 1989, Sutrasthana, Chapter 27.

7. Dr Kaviraj Ambita Dutta Shastri. Sushruta samhita of Maharsi Susruta Edited with Hindi Commentary Ayurved Tattva Sandipika. Chaukhamba Sanskrit Sansthan; Varanasi. Reprint 2010, Sutrasthan, Chapter 46.

8. Vd Gangasahay Pandey. Bhavapraksha Nighantu of Shribhavamisra. Chaukhamba Bharati Academy Varanasi. reprint 2010, Guduchyadi Varga, verse 61/31.

9. Dr Indradeva Tripathi. Rajanighantu of Pandit Narhari edited with Dravyagunaprakashika hindi commentary. Chowkhamba Krishnadas Academy, Varanasi. Karveeradi Varga, verse 28.

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