



A Clinical Study To Evaluate The Effect Of *Tamra Shalaka Agnikarma* In The Management Of *Kadara* W. S. R To Corn

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ABSTRACT: As we know every two in five persons suffer from *Kadara* once in their lifetime and people do not consider this seriously until and unless it starts abruption their daily activities and then reach a doctor when it needs to be seriously considered with the provoked signs and symptoms.^[1] *Acharya Sushruta* describes *Kadara* under *Kshudra roga* and its ayurvedic approach of *Ksharakarma*, *Agnikarma*, *Shastra karma*, *Lepana karma*.^[2] Amongst which *Agnikarma* is the most practiced karma amongst all the *karmas* due to its less chances to recur.^[3] **Aim:** To evaluate the effect of *Tamra Shalaka Agnikarma* in the management of *Kadara*. **Material & Method:** 30 subject's data was recorded in the case report form with complete history, examination and necessary assessment was done. Afterwards the subjects of *Kadara* were treated with *Tamra Shalaka Agnikarma* followed by proper post operative care and regular follow ups of the patients were done until the signs of healthy granulation was observed. **Results:** The results typically involve the removal of the corn, relieving pain, swelling, tenderness, discharge and discomfort associated with it. The area was initially tender or sore after the procedure, but with proper post-operative instructions care of the patients were taken and follow ups to ensure proper healing and prevent the recurrence of corn over time. **Interpretation and Conclusion:** From all the available treatment modalities of *Kadara*, it is clear that it may not have a complete cure, as a chance of recurrence may be there. Comparing all treatment procedures, *Agnikarma* can be considered the most appropriate management of *Kadara* (corn). It has a significant result, and the chance of recurrence is significantly lower.

Keywords: *Kadara*, Corn, *Tamra Shalaka Agnikarma*, *Kathina*

INTRODUCTION: In India where 80% of the population lives in the villages and engaged in mainly manual labour either for farming, construction and such other means of livelihood.^[4] Chances of trauma is common due to poor protective measures practiced by these people, due either to ignorance, negligence or poor economic status. Even in the urban population, wearing of defective footwear and negligence of foot care leads to various foot lesions. The common lesion seen in the foot is Corn. A corn is a localized hyperkeratosis with a hard centre caused by undue pressure. The management of Corn consists destruction of abnormal tissue by chemicals like salicylic acid or by total excision under local anaesthesia.^[5] Both these procedures are not giving good result and are not devoid of recurrences. Apart from recurrence, bleeding, pain and post excision infections are observed frequently.

In the present study the patients suffering from *Kadara* lesion over the sole are selected. Patients of the group were subjected for *Agnikarma* by specially designed *Tamra Shalaka* subjected for surgical excision. Results were compared after follow up of one month.

AIM: The aim is to evaluate the effect of *Tamra Shalaka Agnikarma* for the management of *Kadara* w.s.r to Corn.

MATERIALS & METHODS: Enrolment of the 30 subjects, for the trial was based on inclusion and Exclusion criteria.

TABLE NO. 1: PLAN OF STUDY:

Treatment Adopted	Local
Sample size	30
Instrument used	<i>Tamra Loha Shalaka</i>
Procedure	Excision with <i>Agnikarma</i>
Number of sittings	Excision on 0 th day.
Dressing	Regular dressing will be done for 5 consecutive Days.
Follow up	7 th , 14 th , 21 st , 30 th Day
Study Duration	90 Days

ASSESSMENT CRITERIA: A detailed proforma was prepared and an Assessment was done on the basis of subjective and objective parameters by grading them. The data was analysed statistically.

OBSERVATIONS & RESULTS: In this clinical study 30 subjects of *Kadara* were registered. This study was open labelled single group clinical trial. Here *Tamra Shalaka Agnikarma* was adopted as line of treatment in the management of *Kadara* and here in this section the obtained data pre and post study was Analysed using Wilcoxon Signed Rank test, Paired T Test, Cochran Q Test.

TABLE NO. 2. EFFECT OF TREATMENT ON PAIN

PAIN	BT(N)	%	AT(N)	%
Mild	12	40%	0	0%
Moderate	16	53.3%	0	0%
Severe	2	6.7%	0	0%

TABLE NO. 3 EFFECT OF TREATMENT ON SWELLING

SWELLING	BT(N)	%	AT(N)	%
Mild (Below 2 mm)	07	23.3%	0	0%
Moderate (Below 4 mm)	13	43.3%	0	0%
Severe (Above 4 mm)	10	33.3%	0	0%

TABLE NO. 4 EFFECT OF TREATMENT ON TENDERNESS

TENDERNESS	BT(N)	%	AT(N)	%
Mild (Pain & wincing)	12	40 %	0	0%
Moderate (Wincing & withdraws the joint)	18	60 %	0	0%
Severe (Unable to Touch)	0	0 %	0	0%
No Tenderness	0	0 %	30	100%

TABLE NO. 5 EFFECT OF TREATMENT ON DISCHARGE (POST AGNIKARMA)

DISCHARGE	FU(N)	%	AT(N)	%
Serous Discharge	10	33.33 %	0	0%
Purulent Discharge	05	16.67 %	0	0%
Muco Purulent Discharge	00	00 %	0	0%
No Discharge	00	00 %	30	100%

TABLE NO. 6 EFFECT OF TREATMENT ON SIZE OF WOUND (POST AGNIKARMA)

SIZE OF WOUND	D 0 (N)	%	AT(N)	%
Radius Measuring 0.5 - 1 Cm	2	6.67%	10	33.33%
Radius Measuring 1.1 - 2 Cm	13	43.3%	0	0%
Radius Measuring More Than 2 Cm	15	50 %	0	0%

TABLE NO. 7 EFFECT OF TREATMENT ON RECURRENCE

RECURRENCE	AT(N)	%
Absent	28	93.33 %
Present	02	6.67 %

TABLE NO. 8 EFFECT OF TREATMENT ON HARDNESS (POST AGNIKARMA)

HARDNESS	BT(N)	%	AT(N)	%
Absent	00	00 %	29	96.67%
Present	30	100 %	01	3.33%

TABEL NO. 9 OVERALL EFFECT OF TREATMENT ON KADARA

PARAMETER	AT	
	NO.	%
Pain	30	100%
Swelling	30	100%
Tenderness	30	100%
Discharge	30	100 %
Size Of Wound	20	66.67%
Recurrence	28	93.33%
Hardness	29	96.7%
Total	93.81%	

TABEL NO. 10 OVERALL RESPONSE OF TREATMENT

PERCENTAGE	INTERPRETATION
100 %	Complete Remission
76-99 %	Marked Improvement
51-75 %	Moderate Improvement
26-50 %	Mild Improvement
1-25 %	Minimal Improvement
0 %	No Improvement

Among 30 patients, the overall effect of treatment is **93.81 %**. So, this study confirms that **Marked Improvement** was noted during the Clinical Study.

DISCUSSION: This section analysis disease review, treatment review, observations and results, which helps in understanding the subject and guides to conclusion.

DISEASES REVIEW: All the clinical signs & symptoms of *Kadara* was relieved from the intervention. Pain was reduced *Agnikarma* with *Tamra Shalaka* applied over skin tissue, heat is transferred from *Tamra Shalaka* to skin tissue in the form of *Usna*, *Teekshna*, *Sukshma* and *Laghu guna*, neutralizes the *Sheeta Guna* of *Vata* and *Kapha* resulting in minimizing the severity of the pain.^[6]

OBSERVATIONS & RESULTS: In the present study most of the patients belonged to the age group of 15-30 years, Males were more affected due to the excessive physical activity seen in this age group, Upper Lower class were more affected reason behind it is that this class persons do more hard work, Urban area people were more affected, may be due to food pad atrophy due to wearing high heels and hard footwears

Vedana Samak properties of *Agnikarma* might be due to *Ushna Guna* of *Agni*, which Pacifies the *Vata dosha* and reduce the pain^[7]. these results indicate that copper can significantly attenuate activation and progression of inflammatory responses. Lipopolysaccharide driven inflammation can be attenuated following incubation with copper metal.^[8] *Agnikarma* restores the normal functioning of *Sheeta Guna* of *Vata* by nerve sensitization in the muscle tissue, thereby relieving the spasm. A decrease in discharge was also noted, suggesting that inflammation and infection was effectively managed, The size of wound was reduced as *Shalaka* having the property of *Dahana*, *Lekhana*, *Shodana*, *Vilayana*, it helps in wound healing, Excising the wound removes away the hyperkeratotic corn mass led to proper wound healing and no hardness, The recurrence may have resulted from the patient failing to follow the recommended post-operative care regimen, from the increased propensity of corn to recur following excision.

CONCLUSION: In the study conducted *Tamra Shalaka Agnikarma* in *Kadara*, revealed significant results regarding pain, tenderness, swelling and discharge, and on final follow up (30th day), 29 patients had complete regression of *Kadara* and 01 patients had developed Hardness. *Tamra Shalaka Agnikarma* showed significant results in all subjective criteria compared to objective criteria. During the observation 2 Patients had recurrence of *Kadara* on 90th day was found.

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