Local health wisdom of rural women using medicinal plants

Arti Verma^{1*}, Asha Singhal² & Dheeraj Singh³

¹Krishi Vighyan Kendra, Jhalawar, Rajasthan; ²Department of Home Science Extension Education, College of Home Science, Udaipur, Rajasthan; ³Post Harvest Technology, College of Horticulture and Forestry, Jhalawar 326 001, Rajasthan

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The health traditions in which much of the practices are local and community specific are known as Local Health Traditions (LHTs). For cold and cough, the traditional treatments included *ukaali* made of different ingredients like *dhania*, clove, *tulsi*, black pepper, *jaiphal*, ginger and *misri*. Whereas, for diarrhoea, the traditional treatment comprised of taking curd and *isab*, and mixture of *harad* and *jaiphal*. Dysentery is treated by various herbs and ingredient like *khejadi*, *maroda phali* and *isab*. Skin diseases are treated by taking bath with *neem* leaves and malaria is treated by *tulsi* leaves and cloves, chewing young leaves of *neem*.

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The traditional life styles in India are well acquainted with the secrets of herbal medicines. The health traditions in which much of the practices are local and community specific are known as Local Health Traditions (LHTs). The origin of traditional knowledge is deep-rooted in local people's age-old experimentation. It is local knowledge, unique to a given society, the importance of which cannot be neglected. One of the significant features of Local Health practices is that they use locally available and readily accessible resources. These traditions are alive as household practices and are referred to as Griha Vaidyam, Pattivaidyam and Manai Qushadi¹. Health is a state of complete physical, mental and social well being and not merely the absence of disease or infirmity². Efforts should be made to locate, document and disseminate traditional knowledge so that it becomes a part of development. Whatever traditional facilities are available in the respective rural areas and are still functioning, efforts should be made to rehabilitate and strengthen them³. Every social system has a rich store house of knowledge based on the sound beliefs, norms and culture. Rural people also have their own system of managing traditional knowledge, which they have acquired from their age old experiences. These can be the valuable resources for managing health, as these are being used from

generation, acceptable families. to rural environmentally sound and cost effective. Thus, there is an urgent need to safeguard and reaffirm the traditional knowledge by documenting them to amplify and accelerate research planning and development. Traditional knowledge can be harnessed by exploring these practices and reasons there of so that they could be scientifically validated to generate the location specific technologies sound in health perspective. Hence, an attempt is made to explore the richness of Local Health Traditions in district Jaisalmer so that suitable practices in various aspects of health, among rural women could be identified and encouraged for scientific validation.

Methodology

The study was conducted in rural area of two panchayat samities of Jaisalmer district, Jaisalmer and Sam. In order to get a representative sample of the selected panchayat samities, it was divided into 4 zones, North, South, East and West. One village from each zone was selected randomly. To select the sample, rural women above 40 yrs of age were taken, as older women can be assumed to have more knowledge and experience as compared to younger ones. Out of the eight selected villages, 20 rural women from each village were selected purposively, making a total sample of 160 rural women. For this, the interview schedule developedwas taken with

^{*}Corresponding author

slight modifications⁴. It was prepared on the basis of identical traditional practices from the respondents with their logic for following the practices. These practices were then analyzed by the experts as scientific, unscientific, not known and need further research. Efforts were also made to get the properties of identified indigenous practices analyzed by 20 experts. Interview method was used to collect data from the respondents. Along with this Participatory Rural Appraisal (PRA) with focus group discussion technique was also used to get the desired information from respondents by gathering a group of 6-10 people. Probing was done to get clear and complete information. To collect information about scientific validation, questionnaire was given to all the experts (20) and their responses were collected. On the basis of responses obtained from the respondents, the variables were classified into the different categories. The obtained data was classified, tabulated and quantified by calculating frequency and percentages.

Results and discussion

Findings of the study shows that rural families were using traditional practices for curing various ailments. An effort thus was made to study the scientific validity of these practices so that, the scientific practices can be further promoted to achieve health for all.

Cold and cough

Cold and cough is one of the most common health problems, which occur whenever there is a change in temperature. A majority of rural women (80%) do not take hot and cold drinks simultaneously or not consume water just after coming from hot sun believing that it causes cold and cough. About 84% rural women reported that soon after starting of dryness or itching in the throat, they start taking indigenous treatments for cold and cough. In general, they take ukaali (kadha), which is a mixture of various ingredients like dhania, clove, tulsi, black pepper, misri, jaiphal and ginger. About two third of the respondents (76.25%) take decoction of clove. Decoction of *ajwain* + *chandali* + *gur* was taken by half of the respondents (59.37%). It is their belief that all these things are hot in nature, hence can give relief during this disease. Powdered mixture of sonth, black pepper *peepal* and jaggery is used for curing cold and cough⁵. Among various aspects related to cure of cold and cough, viz. preventive measures used and indigenous treatment taken by the respondents,

65-100% experts judged a majority of practices as scientific. These included avoiding hot and cold drinks simultaneously, using *ukaali* made up of local ingredients like *dhania*, clove, *lahsun*, black pepper, *jaiphal*, ginger and herbs like *tulsi*, *chandali* as indigenous measures for the treatment of cold and cough. The experts too feel that these things have hot *taseer* and hence the recovery is faster. Regarding practice of taking *nosadar* the experts opined that it contains ammonium chloride (NH₄Cl), which helps in relieving cough and cold. Some of the practices were considered as unscientific by them (30-64%), which included the use of *imalee, javitri* and *ajwain*.

Diarrhoea

As preventive measure all the respondents drink buttermilk daily. Majority of the rural women (84.3%) consume raab and about two third of the respondent (63.7%) drink plenty of water, thinking that these drinks keeps the digestion proper and maintain water balance in the body. On occurrence of diarrhoea, rice with curd was given. Regarding the treatment, about two third of respondent (70-75%) mention about isab with curd; mixture of harad and jaiphal was reported by 60% respondents. Half of the respondents (45-50%) were also giving lemon water and pomegranate peel. Apart from these, use of afeem with water (18.7%) and curd with turmeric (25%) were also reported by rural women. As a preventive measure for control of diarrhoea, the practice of consuming additional liquids such as buttermilk, water and raab was considered as scientific by experts (100%) along with the logics that it balance the body water and keeps the hajma (appetite) good as reported by the respondents. Regarding traditional treatment, almost all the practices were considered as scientific (80-100%). These were use of afeem, isab, lemon water with salt and sugar, curd with turmeric, mixture of *harad* and *jaiphal* and pomegranate peel. The experts feel that due to property of mucilage and albumin of *isab* and narcotine and codeine of *afeem*, the water of the bowel is soaked and frequent expulsion of bowel is restricted.

Dysentery

All the respondents had the habit of drinking buttermilk daily. Nearly two third of the respondents (60.6%) reported to drink mint and lemon juice as these drinks balance water and nutrient and keeps digestion proper. Various herbs, which were given to the patient in dysentery, were *khejadi* leaves and

maroda phali with the logic that these herbs check the problem of dysentery immediately. All practices (drinking buttermilk and mint and lemon juice) were considered scientific by 100% experts. The practices which were considered as scientific by majority of the experts (75-100%) included use of turmeric, *isab*, *khejadi* and *maroda phalli*. *Khejadi* leaves has the property of *stambhan* (which controls bowel) and hence can be used for curing dysentery.

Constipation

In case of constipation, about three fourth of the respondents (77.5%) take more water and buttermilk as it helps in easy digestion of food and constipation is avoided. Most of the respondents (55-60%) reported to avoid fried, spicy food and rice, as these are main cause of constipation. As traditional treatment pudina tikki, mixture of salt and ajwain and decoction of chandali, harad, ajwain and gur was given as mentioned by 49.65% respondents. About 25-30% of them gave nosadar, paneer and decoction of sanamakki leaves for treating the disease. Harad rubbed with water was also given by rural women (18%) for treating constipation as it helps in easy digestion of food, reduce formation of gas and avoid constipation. Half teaspoon of harad powder if taken with water after both the meals helps in curing constipation. Decoction of chandali leaves with salt is recommended during constipation also and stomachache⁸. All the preventive measures like drinking of more liquids, taking less spicy and fried foods and avoiding rice were ranked scientific by 100% of experts. All practices were considered as scientific by the experts (75-100%) which included the use of nosadar, pudina tikki, harad, ajwain and decoction of herbs like sonamakki leaves and chandali leaves. The experts believe that sonamakki has glucoside, calcium oxalate and cathantic acid and is purgative in nature and *pudina* has the property of oleum marjoranae oil which helps in fast digestion so, they cure constipation.

Skin disease

About three fourth of total respondents (76.8%) take bath by boiling *neem* leaves in water at least once a fortnight. 55% of the respondent use mustard oil for massaging; *multani mitti* was applied on skin before bath by few respondents (15%) as it helps to control prickles of the body. Nearly 60-75% rural women followed the traditional practices of applying melted soap and old tablets (any) over the affected skin.

Rural women (30-45%) reported use of paste of neem leaves, crushed ber leaves, garlic cloves, neem and peepal bark, ajwain mixed with mustard oil and taking bath with water in which dhamasa leaves were boiled. Use of neem is still considered useful for the treatment of various skin diseases. Application of multani mitti on skin and then taking bath was also considered as scientific by experts (85%). Beside neem, various traditional treatments such as application of ajwain paste mixed in mustard oil, garlic paste, dhamasa, kher and peepal were judged as scientific by majority of the experts (65-100%). The practice of massaging with mustard oil as a preventive measure and application of ber leaves, kikar leaves, melted soap and old tablets (any) was ranked as unscientific by experts (55-100%).

Malaria

All rural women burnt cow dung to avoid mosquitoes. Three fourth of total respondents (75%) kept environment and house clean, and apply mustard oil on body to prevent mosquito biting; most of them (61%) avoid stagnation of dirty water around their houses by proper drainage. Majority of total respondents (71-80%) chew young leaves of neem and take decoction of tulsi leaves and cloves. About half of the rural women (50-55%) gave decoction of modeshi root and bui and decoction of sonth, black pepper and *jaiphal*. For control of malaria, respondents kept house and environment clean, avoiding stagnation of water and fumigation with their logics judged as scientific by 100% experts. Regarding traditional treatments like use of *neem*, decoction of tulsi leaves and cloves and of sonth, black pepper and *jaiphal*, 100% experts considered some practices as scientific as these things have hot taseer and hence the recovery is faster. The practice of applying mustard oil and using decoction of modeshi root and bhui were considered as unscientific by half of the experts (50-65%).

Jaundice

Majority of the respondents (80%) reported to avoid too much of turmeric and spices in food as a preventive measure with the logic that it gives rise to jaundice. Regarding traditional treatments, all the respondents followed practices like giving *mantra wale chane* and tying *aak* root on neck believing that as it dries, it soaks jaundice. Curd and buttermilk was given, while oil and spices were restricted to the jaundice patient⁶. As a preventive measure for control of jaundice the respondents do not take too much of spices in food. This practice was ranked as unscientific by a majority of experts (60%). Regarding traditional treatments like use of *mantra wale chane*, and tying *aak* root on neck, all the practices were considered as unscientific by all the experts.

Gastroenteritis problems

As a preventive measure majority of the respondents (86%) do not keep the stomach empty whereas three fourth of them (72%) avoids gas forming foods, viz. potato and besan. Their traditional treatment included powder of various ingredients like ajwain, dana methi, jeera with salt as reported by 27-57% respondents as these improves digestion while use of nosadar and pudina juice was reported by one third respondents (30-38%). Few respondents (26-28%) gave paneer (traditional herb) and churan made of *harad* and *amla* to the patient to control gastroenteritis problems. All ways of managing problems of gastroenteritis were ranked as scientific by all the experts like avoiding gas farming foods and keeping the stomach full with the logic that avoidance of these will prevent formation of acidity and gas. Similarly, most of the indigenous treatments were also ranked as scientific by 75-100% experts which included use of ajwain, dana methi, jeera, harad, amla, nosadar and pudina.

Pneumonia

The most common preventive measure followed by all the respondents were to protect body from cold as it may aggravate the problem and three fourth respondents (75%) took timely treatment of malaria fever as a preventive measure. The most effective treatment given by rural women (84%) was ground houseflies with water with the belief that pneumonia fever cures immediately with this practice. About 31-44% rural women reported use of decoction of neem leaves with black pepper, jaiphal and sugar, dhamasa and misri and of chandali leaves. All the practices undertaken by the respondents as preventive measures like protecting body from cold and taking timely treatment of malaria fever were considered scientific by all experts. The traditional treatments, like use of decoction of neem, dhamasa and chandali; massage with mustard oil in which garlic is mixed and use of nagar bel leaves were also reported as scientific by majority of experts (85-100%).

Fever

All the respondents eat onion daily in diet to prevent fever, more than three fourth of them (79.3%) protect their body from cold to avoid fever. About

71% respondents took bath with water filled in earthen pots kept for a day and night. Along with this, respondents (66%) gave ukaali made by mixing black pepper, tulsi, ajwain, chandali leaves and coriander with the belief that all these ingredients are hot in nature and cures fever immediately. Use of decoctions made from *tulsi* leaves with black pepper and of jaiphal, javitri, harad and tulsi leaves had been reported by half of the respondents (53-63%). Few of them (33%), take the patient to *bhopa* with the belief that the *jhada* done by *bhopa* would help in curing fever. Regarding indigenous treatment, most of the rural women (56%) give tea with tulsi leaves and black pepper in case of fever⁷. All the practices undertaken by the respondents as preventive measures like onion in diet and protecting body from cold were considered scientific by all the experts. The traditional treatments that were considered scientific by majority of experts (85-100%) were use of ukaali made of black pepper, tulsi, ajwain, chandali leaves and coriander; decoction made of tulsi leaves and of *jaiphal, javitri* and *harad*⁸⁻⁹.

Conclusion

In cold and cough, the traditional treatments included ukaali made of dhania, clove, tulsi, black pepper, jaiphal, ginger and misri (83.75%). All experts judged these as scientific. In diarrhoea, the traditional treatment comprised of taking curd and *isab* and mixture of *harad* and *jaiphal* as reported by 60-71% rural women. For treating dysentery, nearly half of the respondents (42.5-50.6%) mentioned about use of khejadi, maroda phali and isab, which were judged as scientific by 75-100% experts. For curing constipation the traditional treatment included *phanki* of ajwain and salt and decoction of chandali, ajwain, *harad* and gur (60.6%), which was unanimously considered as scientific by 75-100% experts. As a preventive measure for skin diseases, 76.8% respondents mentioned about taking bath with neem leaves, which was considered as scientific by all the experts. Majority of rural women reported about burning of cow dung cake in house, keeping house and surrounding clean to prevent occurrence of malaria. But on its occurrence, 70.5-82.5% respondents mentioned treatment with tulsi leaves and cloves, and chewing young neem leaves. For curing jaundice, all rural women mentioned about practices of tying aak root on neck and eating mantra wale chane, which were considered as unscientific by the experts. During gastroenteritis, about three fourth of the rural women (71.8-85.6%) mentioned avoiding gas forming foods and not keeping the stomach empty to safeguard from acidity and gas formation. But to get rid off this problem, use of *pudina* juice, *nosadar*, phanki of grounded dana methi and ajwain with black salt were considered as scientific by all the experts. The findings indicated that the practices like taking decoction of neem leaves, black pepper, jaiphal, sugar; dhamasa and misri; and chandali leaves; massage with garlic and mustard oil; tying of heated nagar bel leaves during pneumonia were considered as scientific by 85-100% experts. Fever: As a preventive measure, majority of the respondents use onion in their diet and protect the body from cold to avoid fever. The traditional treatment included use of decoction and ukaali made of black pepper, tulsi, ajwain, chandali leaves, dhania which were considered as scientific by 85-100% experts.

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