

Strategies for Potential Participation of Women in Sericulture: Issues and Options

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Introduction

In India, more than 65 per cent of rural people depend on agriculture for their livelihood. The rate of dependence on agriculture has not declined even after Economic Liberalization initiated in 1991. It is now recognized that poor employment generation has been a major casualty of the Indian neo-liberal economic reform process. The major loser in the economic liberation process is the resource poor farmer and gender, as they do not have direct access to benefits from the economic gain attained through the economic reform process. There has been a perceptible increase in participation of women in agriculture due to rise in seasonal demand for labour for operations traditionally performed by women, and due to increase in employment of men in non-agricultural activities. Women play a key role in crop husbandry, sericulture, fisheries, forestry and post harvest technology and have diverse responsibilities as head of farm household, farm manager, member of family work force and income generator. However research, extension and training agencies have often neglected women's productive role. Women's participation needs to be acknowledged and incorporated in planning agricultural development. Although agriculture has failed in economic and social empowerment of women to a great extent, there are sectors like sericulture, where women play an important role in decision-making and higher participation.

However, their participation and contribution is neither adequately recognized nor rewarded. This paper presents contribution of women in sericulture and issues to be addressed to empower women sericulturists in order to increase their efficiency in participation and decision making in sericulture.

Contribution of Women in Sericulture

Mulberry sericulture involves five major activities, such as egg production, mulberry cultivation, silkworm rearing; silk reeling, twisting, weaving, dyeing and finishing of silk

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fabric, which employ on an average 53 % of women folk. Micro-level studies (Lakshmanan, et al., 1998 and 2007) revealed that more than 65 per cent of total labour engaged in silk cocoon production were female. In cocoon production, women are involved from establishment of mulberry garden to silk cocoon harvesting and even marketing of cocoon to some extent. The relatively higher profitability of sericulture, its potential in generating additional employment etc. have been widely studied (Lakshmanan et al.,). Except for dairying, there is probably no other off-farm activity which would provide a higher scope for women's development as sericulture.

(a) Woman as a worker: Mulberry cocoon production involves many activities such as cultivation of mulberry involving land preparation, planting of mulberry saplings or cuttings, application of fertilizer, farm yard manure, irrigation and leaf harvesting. A considerable number of women are being employed to carry out such activities on a regular basis. It is estimated that 64.01 per cent of total labour engaged establishment of in mulberry garden were women labour force while it was 59.17 per cent for leaf production activities. In silkworm rearing, the activities such as disinfection of rearing house, chawki worm rearing, adult rearing, cleaning of rearing bed, keeping worms on mountages and harvesting of cocoon require the participation of female labour quite significantly. It is estimated that 58.20 per cent of female labour of the total labour engaged, is in silkworm rearing.

Silk reeling is one of the post-cocoon activities where involvement of women is noteworthy. Women are engaged in cocoon sorting, drying, cooking, reeling, re-reeling, lacing and skinning. It is estimated that an average of 75 women are engaged for reeling of every 300 kg of silk cocoon.

Silk weaving, a traditional art, is considered to be another segment where female labour employment is marginally high. The silk weaving activities consist of three segments viz., pre-warping, weaving and post-weaving. The pre-warping involves warping, winding the yarn on bobbins and jari warping. These are women oriented activities which employ around 20 per cent of total work force in pre-warping. In the case of silk weaving in rural areas, both male and female work on full time basis in handlooms while in urban areas, women prefer weaving through power looms. Like weaving, women also participate in printing and dyeing of silk fabrics. It is estimated that about 40 per cent of total work force in printing and dyeing activities are women.

(b) Women in decision making: Women play an important role in decision making in sericulture and are involved in decision making at various stages of silk cocoon

production. They contribute in taking important decisions during rearing of silkworms such as time of feeding, cleaning and applying bed disinfectants. Those activities are crucial to have quality and quantity of cocoon yield.

Existing Scenario

The existing sericulture scenario depicts women in a distinctly disadvantaged position, with the following characteristic features:

- (1) High level of participation
- (2) Gender biased division of labour
- (3) Low access to technology and extension
- (4) Low access to marketing and income
- (5) Low access to credit
- (6) Lack of women oriented approaches in research, planning, implementation and evaluation of schemes.
- (7) Lack of training programmes

Need for Women Empowerment in Sericulture

Although women contribute significantly in process of production and decision making in silk cocoon production, yet their participation and contribution is neither adequately recognized nor rewarded. Their access to technology, credit, market and income are limited. This is mainly due to their lack of awareness about their role in sericulture. They do not have knowledge about new technologies and availability of skill up-gradation technologies in mechanization and training in new sericulture technologies.

(a) Women Friendly Technologies in Sericulture

However, considering the important role played by women in sericulture, women friendly technologies for avoiding drudgery in sericulture have been developed and women are being trained to use such equipment, at CSRTI, Mysore. The tools and machines developed are aimed at improving working efficiency of women force besides reducing drudgery.

Table 1: Tools and Machines developed for Women's Empowerment and avoiding Drudgery in Sericulture

Sl. No.	Name of technology	Tools and machines developed
1	Weeding	Long handled weeding hoe, Peg tooth weeder, Grubber and Self- propelled weeder.
2	Harvesting of mulberry shoots	Pruning saw, Sickle and Looping shear
3	Spraying	Electrical sprayer and Foot operated sprayer
4	Silkworm rearing	Hand operated deflossing machine, Hand-cum-motorized deflossing machine, Chawki leaf operated machine, Leaf chopping machine
5	Silkworm egg production	Cocoon cutting machine

Source: Annual Report, CSRTI, 2005-06.

The tools and machines developed (Table 1) for avoiding drudgery in sericulture were popularized among women farmers by displaying and demonstrating them in exhibitions, field days etc., through extension units of different states in the country.

(b) Women Empowerment through Training in Sericulture

Apart from the development of women friendly tools and equipment in sericulture, there are a number of training programmes being organized, exclusively for women, at CSRTI, Mysore to improve their knowledge and for skill development in sericulture. The details of women empowerment programmes through training in sericulture are indicated in Table 2.

Table 2: Number of Women trained under Women Empowerment Programme in Sericulture during 2006-07

Sl. No.	Name of Training Programme	Duration (Days)	No. of women trained
1	Integrated nutrient and disease management in mulberry by eco-friendly approach	06	70
2	Young age silkworm rearing	08	192
3	Composite silkworm rearing	35	18
4	Integrated pest and disease management- an eco-friendly approach with bio-pesticides, bio-fungicides and Botanicals	10	88

5	Value addition to by-products of sericulture industry by better resource management	06	231
6	Drudgery reduction through Ergonomically sound appliances/hand tools	06	26
	Total	-	625
	Grand total (since 2003-04)	-	1395

Source: Annual Report, CSRTI, 2006-07

From a perusal of Table 2, it is clear that there were 1395 women sericulturists trained on different aspects of sericulture technologies to impart skills and knowledge in order to improve their participation in silk cocoon production.

Issues and Options

1. Credit Support

The important aspects for women's development are primarily knowledge cum skill development and viability. This has direct impact on women empowerment as well as reducing gender bias. The existing ground realities form a vicious circle. Women's disadvantaged situation arising out of their lack of access to resources, coexists with their low access to technology, non-recognition of their work, their low access to market, income and decision making. The credit support mechanism, as a means of strengthening the resource base of women has a potential of breaking this vicious circle and enabling a number of women to realize opportunities provided by sericulture. This can be addressed effectively through joint participation of lending institutions and sericulture development agencies. Currently, micro-credit is being given through banks for rehabilitating women self-help groups for income generating activities. Likewise, credit may be extended to women sericulturists as an intervention strategy to empower them.

2. Access to Technology and Extension

Formation of women's groups constitutes probably the most challenging but effective means of empowering women. To begin with, CSRTI, Mysore has made special emphasis on empowerment of women through training on new technologies in sericulture. This has had limited success and there is a great scope for accessing such technologies by women through state owned sericulture training schools. The sericulture training schools should organize regular skill up- gradation training programmes for women. Another concern is non-availability of extension support for women. Sericulture departments should recruit women extension workers to train women farmers and if required, counseling can also be made available for depressed women farmers in the event of crop failure and even domestic affairs.

3. Access to Marketing and Income

It is realized that women shoulder higher responsibilities right from cultivation of mulberry to cocoon harvesting. However, they are denied to access benefits such as marketing of cocoon and income earned from cocoon production. The prevailing social and economic condition in the rural areas and family customs prevent women from participating in marketing directly. It is high time to create cocoon marketing avenues for women to sell their produce directly. This will lead to both social transformation and empower the women workforce. To make a beginning, state sericulture departments need to organize women cocoon marketing involving a large number of women owned self-help groups operating sericulture activities.

4. Effective Women's Participation

There is need for a campaign approach for effective participation of women in the silk industry. In the early 1990s and the new millennium, NGOs and Govt. departments various campaigned on women's literacy, health and other social issues. Recurring droughts, industrialization and attractive opportunities in the urban areas and cities perhaps are attracting men to migrate in search of better opportunities. Women are compelled to stay back in the villages to care for the elderly and children. Work burden due to migration of husbands and male member of the families and increased drudgery due to depletion of natural resources like ground water and biomass have an adverse effect on women's health.

5. Women Oriented Projects/Programmes

There is no doubt that participation of women in sericulture is vital to increase yield and income. However, to increase their participation effectively, there is need to implement the following programmes exclusively for women.

1. Establishment of kisan nurseries in Government assigned lands by women self-help groups.
2. Organization of women technical service centers (TSCs) and sericulture technology parks and chawki rearing centers (CRCs).
3. Health insurance to women workers for promotion of bio-fertilizers and bio-pesticides and non-chlorine disinfectants.
4. Creation of women development fund in sericulture
5. Plan for long term projects for women's development in sericulture

Conclusion

Women contribute significantly to increasing production and productivity in silk cocoon production. However, the issue is, to what extent their role has been recognized in the wake of new technologies in sericulture. Women's active participation is vital for decision-making process for which more opportunities should be created in the form of training and utilization of women friendly technologies improving their knowledge and skills in sericulture. It is high time to motivate the women force to take a lead in sericulture. To achieve this, an integrated mechanism needs to be evolved by the joint efforts of Central Silk Board, Department of Sericulture and NGO's to educate the rural women on new technologies in sericulture for which periodic training programmes should be organized through women extension workers and special credit schemes devised exclusively for women sericulturists for utilization of eco-friendly women oriented technologies. Such measures would go a long way in empowering women sericulturists in the country.

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