



## Changing Landscape and Changing Gender Roles - Case of a Tribal Village in Assam

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### Abstract :

Developmental activities are indispensable for the growth and prosperity of the nation. Such activities, by way of land acquisition change the land use pattern of the place thereby changing the landscape. Landscapes on the other hand are also reflections of social values, beliefs and attitudes. A change in the physical landscape also changes the socio-cultural attitude of the landscape. Based on both quantitative and qualitative research methodologies, this study attempts to understand the relationship between a changing landscape and the changing gender roles of a tribal society. This study is based on a tribal village named Dulia Gaon, located in Dibrugarh district of Assam and inhabited by the Sonowal Kachari tribe. It is an attempt to understand as to how the construction of the NH 37 Dibrugarh-Tinsukia bypass and the rehabilitation of a new village in the grazing ground of Dulia Gaon, has altered the physical landscape of the village. It further attempts to understand as to how the changing physical landscape impacts the gender roles and relations of the Sonowal Kachari tribe of Dulia Gaon. Using both primary and secondary data, this paper seeks to contend that the changing landscape of the village has not only altered the economic opportunities of the village but has also impacted the economic participation of women. These changes in the economic participation of men and women have resulted in the public-private dichotomy of space thereby further resulting in a more gendered landscape.

**Keywords:** *landscape change, gender roles, developmental activities, Dulia Gaon, gendered landscape, public-private dichotomy.*

### Introduction

Landscape is a complex term. Depending on the subject and the multitude of perspectives, landscape may offer different definitions for different studies (Tkáčová, et. al. 66). However, there is no denying the fact that it is essentially a

geographical concept due to its connotations of space which can be physical as well as abstract (Mitchell 95); (Cosgrove 4). From the geographical perspective, landscape is the combination of both the physical or natural attributes of the environment as well as the socio-



cultural attributes of the human society. Both the natural and social attributes are so intertwined that alterations in one also calls for definite alterations in the other (Sauer 111); (Jones and Daugstad 271); (Jones 14); (Greider and Garkovich 7); (Jones 23); (Bujanda 19); (Crang 1972); (Enache & Craciun 310). The constant changes in the physical landscape subsequently alter the social attitude, cultural ethos and the collective identity of the community concerned. On the other hand, these social attributes of the human society also possess the potency of altering the physical landscape of a particular region. Hence it can be seen that there is an intrinsic reciprocal relationship between culture and landscape (Nassauer 89).

Gender is a social construct. It refers to the characteristics of masculinity and femininity. An individual's identity as a woman, man, boy or a girl is assigned by the society based on the roles that these sexes are expected to perform (Butler 21). It is the society that assigns various norms and behaviours to an individual based on the sex the individual is born with. It is thus deeply embedded in our institutions. However, gender as a social construct is not static. It changes over society, space and time.

The relationship between gender and landscape is complex and multidimensional (Villamor, G.B. et al. 64). Landscapes are not merely geographic spaces. In fact, landscapes are concrete public statements (Rapoport 86); (Nassauer 92) that reflects the cultural values of the society. Hence, like gender, landscapes are also socially constructed and are based on diverse cultural attitudes and individual perceptions of everyday life (Villamor, G.B. et al. 64).

However, landscapes are not always passive. Apart from providing a platform that reflects the socio-cultural values of a particular society, landscapes also play an active role in the construction of social identities. For instance, changing land use patterns, altering resource bases and transforming physical environments may play an active role in altering the existing social relations and cultural values. Thus, a changing physical landscape can act as an active agent responsible for changing the gender roles and relations of a society.

This paper is an attempt to understand how the changing physical landscape of a tribal village is altering the gender roles of that particular society. It attempts to explore the agents that are responsible in changing the physical landscape of the village and tries to analyze how the changing physical landscape in turn is changing the gender roles of the study area.

#### **Study area :**

This study is based on a tribal village named Dulia Gaon. It is located in Dibrugarh district of Assam, in the North Eastern region of India. This village is situated approximately 10 kms from the district headquarter of Dibrugarh and has a total area of 1.72 sq kms. It has a total population of 1400 persons. Housing a total of 212 households, Dulia Gaon is entirely inhabited by the Sonowal Kachari tribe. The rationale behind selecting this village as the study area is the fact that major developmental activities have been at play in this village. As such it provides a potent ground in understanding how the developmental activities are changing the landscape of this tribal village of Assam. Subsequently, the study area also provides



the platform in understanding how the changing landscape is responsible in altering the existing gender roles of the Sonowal Kacharis inhabiting the village.

#### **Sonowal Kachari Tribe of Assam :**

Sonowal kachari is a major tribal group of Assam. It is a branch of the Bodo Kachari tribe of Assam (Barooah 2). However, unlike the Bodo Kacharis, the Sonowal Kacharis are mostly concentrated in the upper parts of Assam. They are predominantly inhabitants of Dibrugarh, Tinsukia, Sibsagar, Jorhat, Golaghat, Dhemaji and North Lakhimpur districts of Assam (ibid). They are also found to inhabit parts of Arunachal Pradesh and Nagaland (Saikia et al. 130). Although agriculture is the primary economic activity of the Sonowal Kachari tribe, yet it is one of the largest tribal groups of Assam with a high literacy rate (ibid). Sonowal Kachari societies are often marked by their egalitarian status. Their social life is based on principles of co-operation and co-existence where class and gender disparities are non-existent (Barooah 8).

#### **Methodological approaches :**

This study is based on both quantitative and qualitative research methodologies. It is mostly based on primary data. However, secondary data sources were also consulted. Attempts have been made to correlate the qualitative outcomes with quantitative inputs so as to derive greater accuracy. In order to understand the experiences, attitudes and perspectives of the respondents, focus group discussions, in depth personal interviews and open ended interviews were organized.

In addition to these, questionnaires were also used to collect various data. In order to know the developmental activities in the study area, detailed field observation was conducted for this study. Besides, various secondary sources like Government documents and websites of various ministries were also looked upon to know about the developmental activities. Primary data collected from the Lot Mandal Office Dibrugarh, the village headman, from the respondents, and also the content analysis of the village map and the personal survey of the study area were used to explore the geographical changes brought about by the developmental activities.

#### **Changing Landscape :**

Post independence, India has been undertaking various developmental activities like the construction of roads, railways, bridges, industries, factories, dams, etc. These developmental activities are aimed for the development of the entire nation and are often termed as affirmative actions (Pandey and Rout 89). Developmental projects or activities have a direct relationship with landscape transformation. They are in fact one of the most important anthropogenic causes that initiate the process of landscape transformations. By way of land-acquisition, these developmental activities bring many changes in the land-use pattern of the place where such developmental activities are taking place. In addition to changes in the land-use pattern, the developmental activities also change the settlement pattern and the infrastructural layout of the affected area. As such, developmental activities directly change the physical features of the landscape (Tkáčová, et al. 72).





### Agents of Change :

The major developmental activity that has taken place in Dulia Gaon is the construction of the Dibrugarh-Tinsukia bypass road. This project forms the foremost agent of landscape transformation in the study area. The Dibrugarh-Tinsukia bypass is a part of the National Highway 37. It is 15.446 km long (Source: M/o Road Transport & Highways) and has been conceived to boost road connectivity for Dibrugarh – Tinsukia region. Tinsukia is the northernmost district of Assam and is a major industrial town of the state. This highway project has been constructed at a cost of rupees 96.84 crores (Source: M/o Road Transport & Highways). It has been constructed under the aegis of Special Accelerated Road Development Programme in North East (SARDP-NE).

With an objective of infrastructural development in the North Eastern Region of India, the Government of India has assigned the Ministry of Road Transport and Highways with the task of developing the road transport and highway system of the region and the responsibility of its supervision have been entrusted under the Ministry of DONER (Development of North Eastern Region). Special attention is being paid to the development of NHs in the North-Eastern Region. This is being done in order to open the region for a more balanced development at the backdrop of the region's underdeveloped and marginalized status. The Dibrugarh-Tinsukia road bypass is also one such project of the ministry.

In addition to the construction of road transport network, rehabilitation of a new village

in the study area's grazing ground has also acted as a major agent of landscape transformation in Dulia Gaon. The establishment of Brahmaputra Cracker and Polymer Limited (BCPL), a petrochemical industry, in a neighboring village of Dulia Gaon, has resulted in the rehabilitation of a new village in the study area. The new village has been rehabilitated on Dulia Gaon's grazing ground.

### Land acquisition & Change in land use pattern :

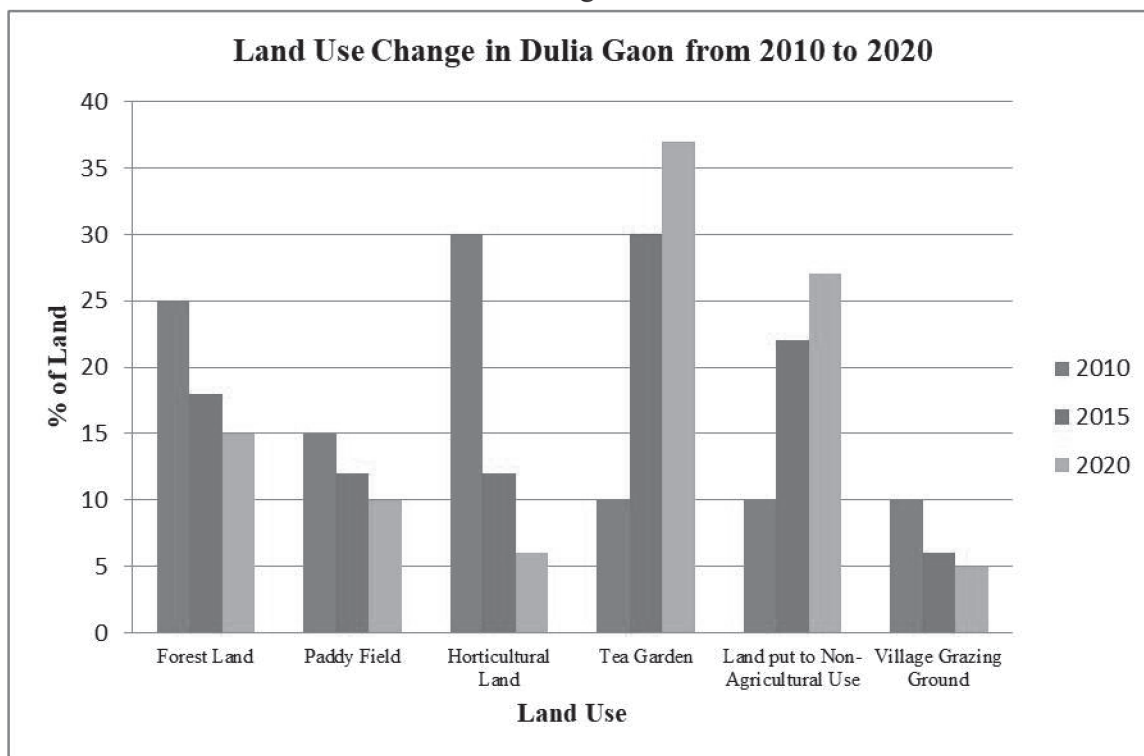
The aforementioned developmental activities, by way of land acquisition, have led to a major change in the land use pattern of Dulia Gaon. Land use is the varied utilization of all surface areas, both built up area and vacant land at a particular point of time and space (Mandal 42). It is an ever changing phenomenon. The following table shows land acquisition for the two projects in Dulia Gaon:

Land acquired for bypass construction	0.0709 sq. kms.
Land acquired for the rehabilitation of the new village	0.04016 sq. kms.
Total area of Dulia Gaon	1.72 Sq. kms.
Total land area acquired by the developmental activities	0.11106 Sq. kms.
Current area of Dulia Gaon	1.60894 sq. kms.

Source: Primary data collected from the field.

Due to the massive land acquisition in Dulia Gaon for the developmental projects, the land use pattern of the village has also undergone a major shift. The following figure shows the changing trend in land use pattern of Dulia Gaon:

Figure 1:



Source: Primary data

From the above figure it can be seen that the land use pattern of the study area has been changing in the given period. In the year 2010 the village had a total of 30% of the land under various horticultural use. These included the cultivation of various seasonal vegetables. However, this percentage has been reduced to just 6% in the year 2020. In 2020, the highest percentage of land use has been recorded in Tea Garden which is 37%. Similarly, forest land and paddy fields have been reduced from 25% and 15% respectively in 2010 to 15% and 10% respectively in 2020. The same trend can also be noticed in the case of the village grazing ground. In 2010 whereas the share of village grazing ground was 10% of the total land area of the village, in the year of 2020 the

share has been reduced to 5% only. The most important pattern that can be noticed from the above figure is the percentage of land put to various non-agricultural uses. In 2010 while the percentage of such land was only 10%, in 2020 this percentage has been increased to 27% of the total land area of the village.

The trend of land use pattern that can be noticed from the data reveals that there has been a steady shift from an agrarian to a more non-agrarian land use. This shift to a more non-agrarian land use pattern implies a subsequent change in the socio-economic practices of the community.

### Changing Gender roles

‘Gender roles’ refer to the different activities ascribed to individuals based on their sexual

differences. Woman, man, boy or a girl is expected to act, behave and conduct themselves in different ways. The society thus assigns different roles to different individuals based upon their sexes. Such social expectations are different from one culture to another. Hence, like gender, the concept of 'gender role' is also essentially a social construct. It is socially determined and is based on a society's values, beliefs and culture (Blackstone 335).

In addition to this, gender roles are also never static. As a society progresses with time, gender roles also change along with the society's progression. Gender roles thus, change over time and space and are a product of the interactions between individuals and the environment (ibid).

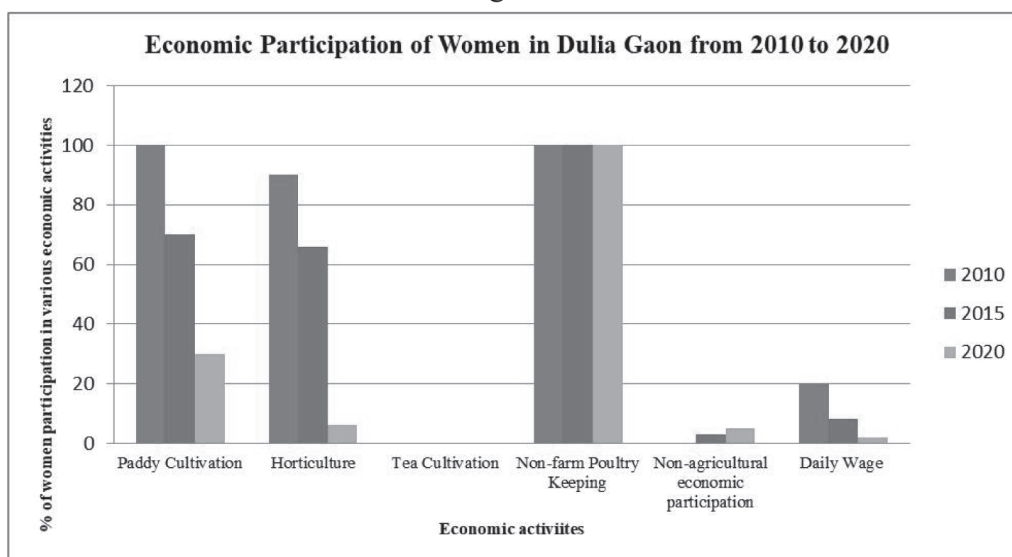
### Economic participation

The changing land use pattern of Dulia Gaon implies a changing pattern in the economic participation of the Sonowal Kacharis inhabiting the village. The reducing paddy fields and the diminishing horticultural lands in the village refers

to the fact that the indigenous economic practices of paddy and vegetable cultivation have been slowly replaced by more non-indigenous economic practices. Figure 1 reveals that tea cultivation in Dulia Gaon has seen a fast increase.

With 37% of the total land area of the village already being converted to tea cultivation, Dulia Gaon today is more engaged with the cultivation of this commercial crop. Tea is a cash crop and its cultivation requires an organized labour, higher dependence on technology which also implies more consumption of power, greater use of fertilizers and pesticides, a sophisticated industrial unit and a better availability of transport system. Naturally tea cultivation requires more capital than the cultivation of paddy or seasonal vegetables. The fast change in the economic practices of Dulia Gaon has also ushered in a change in the economic participation of men and women of the village. The following figure shows the economic participation of women in Dulia Gaon across times.

Figure 2:



Source: Primary data



Figure 2 reveals that there has been a change in the participation of women in Dulia Gaon under various economic activities from 2010 to 2020. It can be seen from the table that the percentage of women participation in paddy cultivation has been decreasing from 100% in 2010 to 30% in 2020. Focus group discussion with the women of the village revealed that their decreasing participation in paddy cultivation can be attributed to the decreasing paddy fields owing to land acquisition for the construction of the bypass. The rapid decrease of women participation in horticultural activities, from 90% in 2010 to as low as 6% in 2020, can also be attributed to the fact of decreasing land availability due to the developmental activities. However, it can be seen from the above figure that participation of women in non-farm poultry keeping, an economic activity that is practiced within the homestead land, has consistently remained the same. Focus group discussion with the women of the village revealed that the practice of keeping poultry was primarily for family consumption. However, with the larger demand for poultry, from the nearby town, it has slowly grown into a household business for many families. Data shows the active participation of women in rearing of such non-farm poultry in all the three years of 2010, 2015 and 2020.

From figure 1, it can be seen that tea cultivation in the village has seen a rapid increase. With 37% of the total land area being devoted to the cultivation of tea, it can be implied that tea cultivation is rapidly replacing the other agrarian activities. However, figure 2 reveals that 0% of women are engaged in tea cultivation across the

years. Personal interviews and focus group discussions with both men and women in the village revealed that since tea cultivation requires greater expertise in its production and maintenance, it is the male members of the family who are regarded efficient in generating more profit from tea cultivation.

Since tea cultivation is dependent on a larger and sophisticated infrastructural nexus, it requires greater mobility, larger market accessibility and advanced knowledge of institutional finance management. In-depth interviews with the women respondents revealed that their poor infrastructural accessibility like market and financial institutions, limits them in the active participation in tea cultivation.

In addition to the above economic activities, it can also be seen that in 2010 60% of the women in the village participated in various daily wage earning activities within the village. This percentage reduced to 12% in 2015 and in 2020 it further reduced to 2% only. The main factors attributed to the rapid decrease of women participation in daily wage earning activities were cited as higher family income generation from tea gardens and employment of the male members in BCPL as contractual labourers. Primary data also revealed that most men of the village worked as daily wage earners in Dibrugarh town.

From figure 2 it can be seen that the percentage of land put to non-agricultural use has been increasing in the village. On the contrary, percentage of women participation in non-agricultural activities has seen only a slow and negligible increase over the years. Figure 2 also shows that women participation in non-farm





economic activities in 2010 has been nil. Whereas, in 2015 a slight increase in the percentage of women participation in non-farm activities was recorded (03%). Finally in 2020 this percentage increased to 05%.

Therefore, the corollary between increasing non-agricultural land use and lesser women participation in non-farm activities reveal that women of the village are yet to adapt to the changing economic opportunities of the changing landscape.

#### **Findings: Public-private dichotomy and the production of a gendered landscape :**

From the above discussion it can be discerned that the changing landscape of Dulia Gaon has been changing the economic practices of the Sonowal kachari tribe inhabiting the village. The changing economic practices subsequently have been changing the economic participation of both men and women in the village. The new pattern of women economic participation reveals that they are mostly associated with work that does not involve greater and wider mobility. They are engaged in work that is either based on their neighborhood or that which can be done in their homestead land. Hence, they are mostly seen to be active in spaces that are more private.

On the other hand, work that demands greater mobility has been associated with the active participation of men. Greater participation of men can be seen in activities that are more public. These include working as daily wage earners in the nearby town, working in BCPL, engaging in various market based activities and in all other activities that require larger participation in public spaces.

The indigenous paddy cultivation and horticultural activities demanded the equal participation of both men and women in the village. In addition to this, Sonowal Kacharis are an egalitarian society where both men and women enjoy equal social status (Barooah 8). Their social structure and cultural practices are reflected on their landscapes. As a tribal society, they are often identified with landscapes that are gender egalitarian. Men and women in such societies have equal accessibility to resources and enjoy equal mobility and freedom. However, the changing landscape of the village has disrupted the gender egalitarian economic activities thereby producing a dichotomy in the spatiality of economic participation of men and women. Data reveals, while women of the village are increasingly involved with work in private spaces, men are largely involved with work that has to do with the public spaces. As a result, a rapid dichotomy of spaces has been constructed between public and private space.

Private denotes all activities that are related with the domestic sphere of everyday life. They are mostly associated with activities that are worked upon within the four walls of the house. Public on the other hand denotes all activities that are worked upon outside of the four walls of the house. Such activities include business, markets, politics, governance, etc. They denote power, patriarchy and dominance. Public-private dichotomies create hierarchical patterns in the society and are often responsible in assigning an inferior position to women. Drawing from the above discourse, it can be put forth that the creation of the public-private dichotomy has





altered the gender egalitarian landscape to a more gendered landscape.

### **Conclusion :**

Developmental activities are indispensable for the development of the nation. While there is an ever increasing demand for such activities, attention must also be drawn to the fact that the fruits of such activities do not fall equally on all sections of the society. In this case study it can be seen that such developmental activities, by way of land acquisition have altered the landscape of the study area. Changing landscape changes the socio-economic structure of the society. Such changes also change the gender roles and relations. Since activities form the essence of a place (Karacor, 2016), places are often identified by the everyday activities of life. As such, the shift in gender roles and relations are also symbolized and embedded on the landscape.

Tribal societies are often regarded as gender neutral and egalitarian societies. Their landscapes

reflect their cultural values and beliefs. Their landscapes are gender egalitarian landscapes where mobility and freedom in the access to resources are not inhibited on the basis of sexual differences. However, the changing landscape has been changing such equations to a more public-private dichotomy of space. Such dichotomies of space on the other hand can be held accountable in the production of a more gendered landscape. Gendered landscapes are often responsible in producing gender discrimination in both public and private spheres of life.

Therefore, policies of development should be supplemented by policies that foster gender equality and equal accessibility of resources. Planners should be sensitive while framing such policies so as to avoid disrupting the social fabric of the indigenous societies and must give special attention to the fact that developmental activities should bring prosperity and development to all sections of the society.

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