

# **The challenge of ownership in the communal management of natural resources by the local political decision makers and of gender mainstreaming: the case of protected areas in Senegal**

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## **ABSTRACT**

To cope with ecological, socio- economical and demographical changes, the rural populations in Senegal have tried to combat the degradation of their environment by promoting some local adaptation strategies. Indeed, in several areas, the populations have taken the initiative of restricting some inter-village forestry and pastoral land ranges to exploitation, so as to protect, conserve and use them to cater to their various needs. These local management measures are not, in most cases, taken into account by the rural council which is the local institution mandated for the management of the natural resources by virtue of Decree No. 96-1134 as of December 27<sup>th</sup> 1996. The Decree addresses the implementation of the act of law relative to the transfer of authority to the provinces, communes and rural communities with respect to the management of the environment and of natural resources. Most of the local representatives are more concerned with the other functions rather than those related to natural resource management. Yet, the populations they represent earn their livelihood mainly from the exploitation of the available natural resources. This work examines the difficulties the populations face so as to succeed socially and above all benefit properly from the favorable socio-economic consequences of these protected areas in the absence of any external support. On the basis of a socio-economic, organizational, and institutional evaluation as well as gender-based studies that considered situations with or without any external support, we pay close attention to local mechanisms of support to the populations with communal local initiatives; to empowerment of the local decision-making representatives in charge of the environment; to dialogue between communities and local stakeholders; and to the level of creativity in mobilizing the required financial resources.

**KEY WORDS:** *communal management, natural resource, local political decision makers, gender, protected area*

## ABBREVIATIONS

CAC	Cellule d'Animation et de Concertation (Counselling and dialogue body)
C I V	Comité Inter-Villageois (Inter – village committee)
CNRF	Centre national de Recherches Forestières (National Center for Forestry Research)
CRDI	Centre de Recherche pour le développement international (IDRC)
CSE	Centre de suivi écologique ( Ecological monitoring center )
CV	Comité Villageois (Village Committee)
DGL/FELO	Décentralisation et Gouvernance Locale (Decentralization and local governance)
ESPIV	Espace sylvo-pastoral inter-villageois (Inter – village forest and pastoral lands)
ENSA	Ecole Nationale des Sciences appliquées (National school of applied sciences)
GDRN	Gestion Durable des Ressources Naturelles (Sustainable management of Natural Resources)
GRN	Gestion des Ressources Naturelles (Natural resources management)
ISRA	Institut sénégalais de Recherches Agricoles (Senegalese Institute for agricultural research)
ISFAR	(Higher Institute for Agricultural and Rural Training)
PAGERNA	Projet d'Autopromotion et de Gestion des Ressources Naturelles au Sine-Saloum (Self-promotion and management project for the natural resources in the Sine-Saloum )
RSL/GESPIV	Renforcement des Stratégies Locales de Gestion des Espaces Sylvo-Pastoraux inter-villageois (Local strategies enhancement for the Management of Inter-village forest and pastoral Lands)
UCAD	Université Cheikh Anta Diop de Dakar (Cheikh Anta Diop University)

## **INTRODUCTION**

Within the framework of sustainable development, the social dimension is a priority in most projects aiming at the conservation of biodiversity (The UN Conference on Environment and Development, 1992; the Convention on biological diversity, 1992). Consequently, the involvement of the local populations in the management of the natural resources turns out to be a key factor (Hulme and Murphree 2001, Adams et al. 2004). In the Sahel, empowerment experiments of the populations promoting local development through decentralization are being carried out in most countries.

Accordingly, the State of Senegal made a great step forward in 1996 with decree n° 96-1134 of December 27th, 1996 concerning the implementation of the act of law relative to the transfer of authority to the provinces, the communes and the rural communities regarding the management of the environment and of natural resources. Such process of decentralization or transfer of authority is aiming at letting the grass-roots communities decide on the definition of development strategies. In the context of the Sahel, the implementation of this decentralization policy causes much trouble. Especially, when it comes to implementing this law, the local decision-makers are faced with huge problems with regard to the management of natural resources (Sanogo et al., 2009; Yatich et al., 2009). Such is the case of inter-village forest and pastoral lands (ESPIV) in Senegal, the communal reserves outside village land-use management and protected by the populations, which constitute a viable and necessary alternative for the conservation of degraded areas MMFT (2004). Unfortunately, local decision makers, especially the rural council and the commissions on environment are unable to get hold of these community reserves. They are generally hampered by their inability to cope with their roles and responsibilities, to grasp the rules of common management, and because of the insignificance of the means available to cater for natural resource management activities (Sanogo et al; Yatich et al., 2009). Therefore, the populations find it hard to succeed and especially to take advantage of the socio-economic benefits from these community reserves under protection (Dieng, 2008; Diop 2009 and Kabatou 2009). Consequently, the local community initiatives which are not beneficiaries of external support fail to break through. The outcome is that poverty is getting worse at local level. This is a real issue in the context of the Sahel, where the populations mainly live on the use of natural resources. In this article, we seek to highlight the key factors which determine successful community management of inter-village forest and pastoral land within the Groundnut Basin of Senegal. Our argument will be based on two cases of communal management in Senegal (a case of management that relies on external support and a case of management which does not) to stress the fact that without external support, the communities cannot fully profit from the economic benefits of the ESPIV. Finally, we recommend local support mechanisms to the populations who have initiatives relevant to the community, for the empowerment of local decision makers dealing with the commission on environment, for dialogue between the local and regional stakeholders, for creativity by raising the necessary financial means.

## **MATERIALS AND METHODS**

The results hereby are based on a summary of participatory diagnosis, perception investigations, student surveys, and discussions resulting from the training workshops of decision makers organized as part of the enhancement project of local management strategies for inter-village forest and pastoral lands in the Groundnut

Basin. This project funded by the Canadian International Development Research Center (IDRC) is an effort of collaboration between research institutes (ISRA), universities (UCAD, ENSA, ISFAR), technical services and of political dialogue between the decision makers of the province (regional council), the districts (rural council) and the populations neighbouring the ESPIV.

The original data for this document were collected from two sites or community reserves of Senegal through participation, cartography and interviews: the Mbedapp site is located in the Thiès province and the Paccathiar Secco site in the Kaolack province.

Community reserves are inter - village forest and pastoral areas located outside the village land management, and protected by the populations. Each site corresponds to an area polarizing 7 to 9 villages (Fig1a and figure1b).

### *The biophysical and socio-economic context of the study area*

#### a. The biophysical context

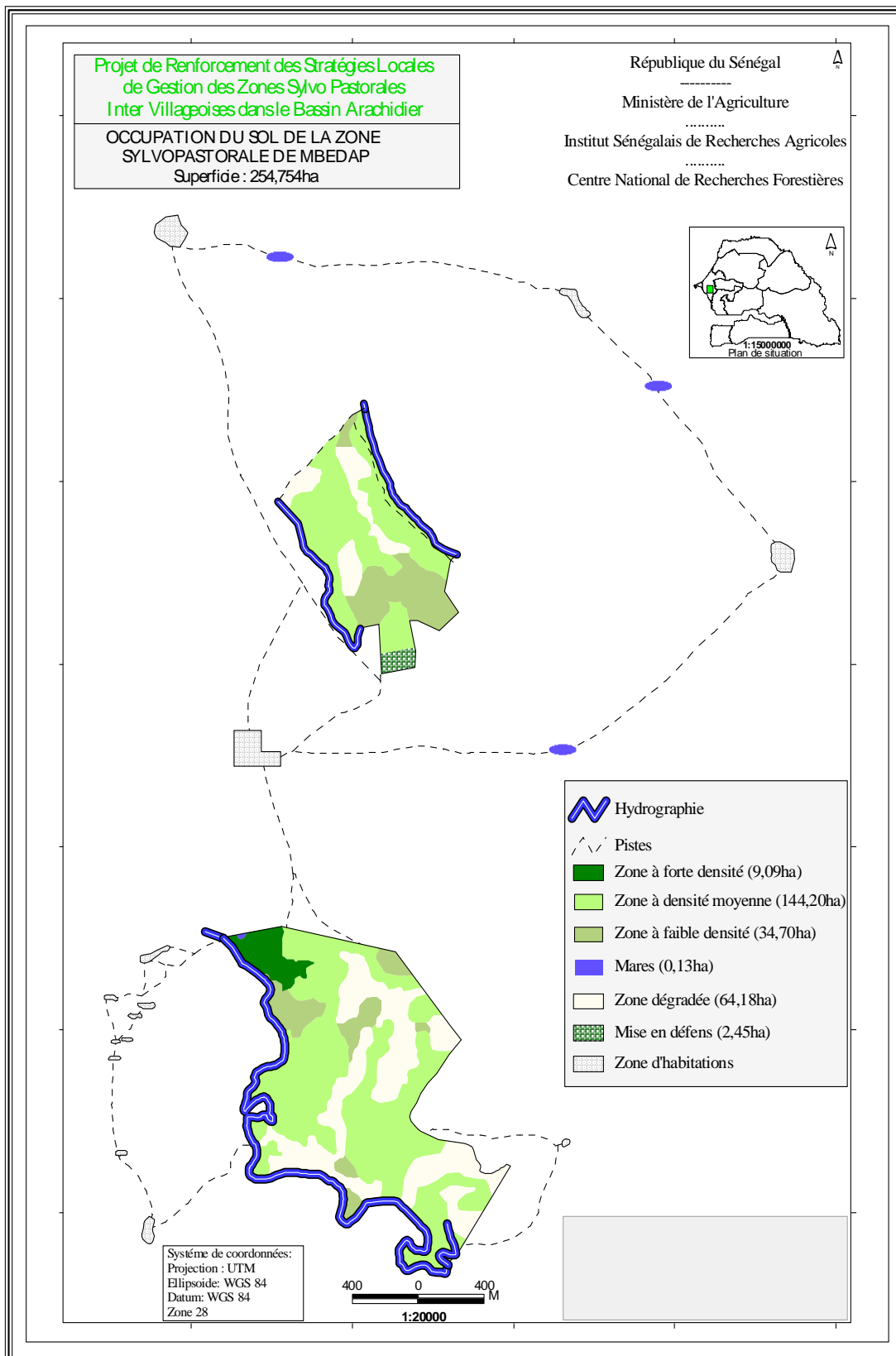
The study area corresponds to two provinces (Thiès and Kaolack) of the Groundnut Basin of Senegal, a West African country. The province of Thiès is characterized by a climate affected by ocean currents. It is located in the transitional zone, swept by the maritime trade winds and the harmattan, with an average temperature of 32°C, one rainy season (400 – 700 mm rainfall) spread over 4 months. The types of soils range from clay to sandy clay. The most current plant species in the area are: *Andersonia digitata*, *Borassus aethiopicum*, *Faidherbia albida*, *Acacia seyal*, *Acacia tortilis* and *Acacia ataxacantha*. The woody resources of the area include forest reserves, communal land reserves and man-made plantations.

Kaolack is characterized by a Sudan-Sahel climate with two alternating seasons: the rainy season (hivernage) and the dry season. The temperatures are often high with annual averages which little vary, about 29°C. Rain falls are variable over the years, very often between 500 and 700mm; at times, they can reach more than 1000 mm. The surface water mainly consists of Baobolong, an almost perennial river which dries up downstream in the middle of the dry season. The types of soils in the area are: sandy ground, argillaceous ground, clay, halomorphic ground, hydromorphic ground. The types of vegetation are: shrubby savannah and shrubby steppe. The most usual plant species in the area are: *Guiera senegalensis*, *Combretum micranthum*, *Combretum glutinosum*, *Cordyla pinnata*, *Acacia seyal*, *combretum*. *Sp Andersonia digitata*, *Faidherbia albida*. The forest consists of forest reserves and communal land reserves.

#### b. The socio-economic context

The province of Thiès comprises two sea strips; one in north spread along the Great Coast which host the market-gardening zone of the Niayes (interdunal area), the other in the south with the Small Coast, which is the most famous the tourist zone of Senegal. As for Kaolack, the main economic activities are: agriculture, truck farming, cattle breeding, artisanal fishing, industry, craft industry, trade. The biophysical and socio-economic contexts of the study sites of Mbedap and Paccathiar Secco are mentioned in the Table1. Two types communal management are compared: Type 1, management without support and Type 2 management with support





**Figure 1a:** Map of the Mbedap site (type 1)

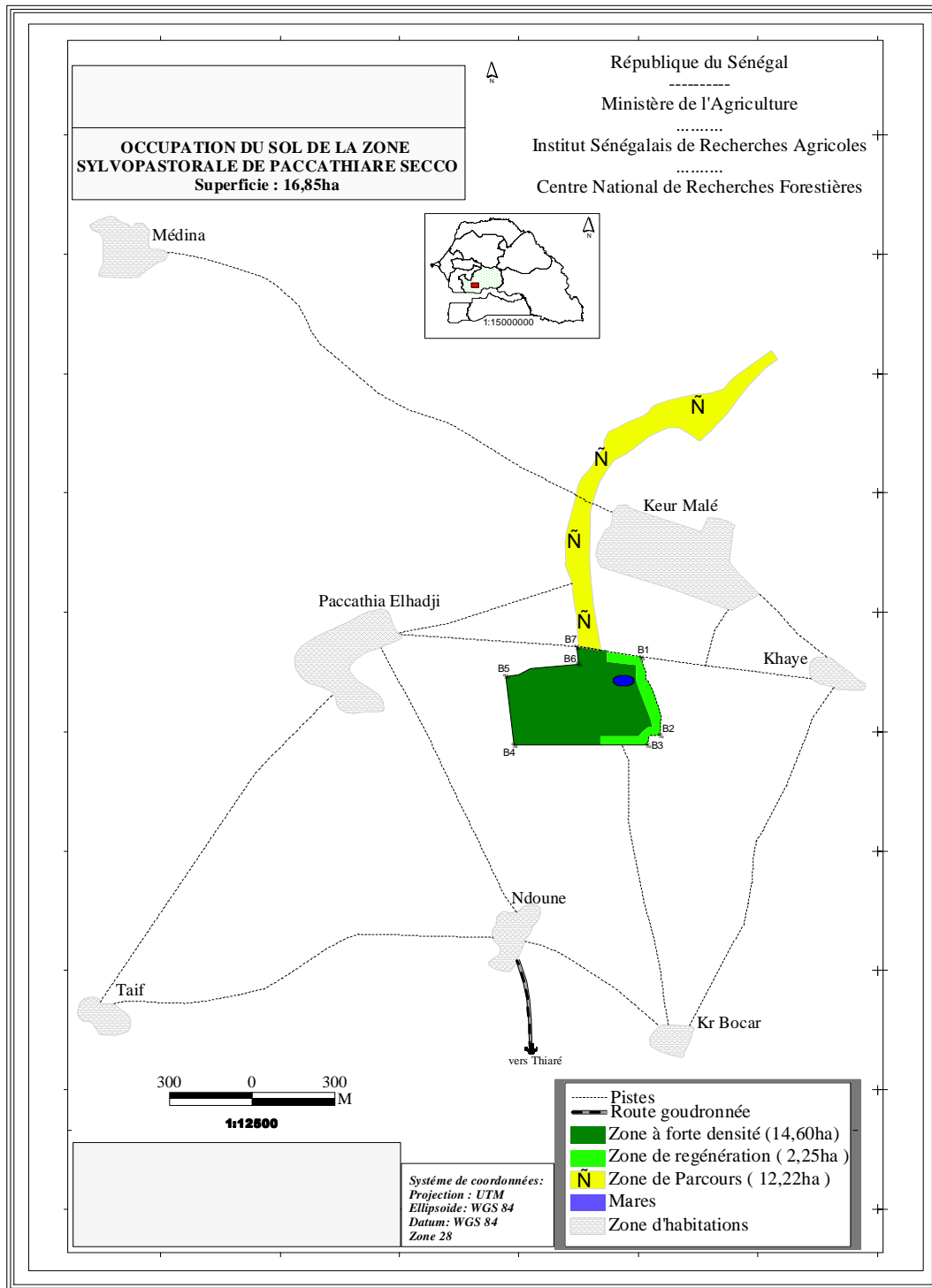
**Legend fig 1a:**

Local strategies enhancement project  
for the management of inter-village  
forest and pastoral lands in the  
Groundnut Basin

Land use in the forest and pastoral  
area of MBEDAP  
Surface area: 254.754 ha

Republic of Senegal  
Ministry of Agriculture  
Institut Sénégalais de Recherches  
Agricoles – ISRA (Senegalese  
Institute for Agricultural Research)  
National Centre for Forestry  
Research

Water system  
Paths  
Densely occupied area (9.09  
ha)  
Rather densely occupied area  
(34.70 ha)  
Ponds (0.13 ha)  
Degraded area (64.18)  
Protected area (2.45 ha)  
Populated area



**Figure 1b:** Map of the site of PaccaThiar Secco (type 2)



**Legend fig 1b:**

Local strategies enhancement project  
for the management of inter-village  
forest and pastoral lands in the  
Groundnut Basin

Land use in the forest and pastoral  
area of PACCATHIARE SECCO  
Surface area: 16.85 ha

Republic of Senegal  
Ministry of Agriculture  
Institut Sénégalais de Recherches  
Agricoles – ISRA (Senegalese  
Institute for Agricultural Research)  
National Centre for Forestry  
Research

Paths  
Tarred roads  
Densely occupied area (14.60  
ha)  
revegetation area (2.25 ha)  
Livestock rangelands (12.22)  
Ponds  
Dwelling area

**Table 1:** Characteristics of the study sites

<b>Charateristics</b>	<b>Site of Mbédap (type 1)</b>	<b>Site of Pakathiare Secco (type 2)</b>
<b>Province</b>	Thiès	Kaolack
<b>Rural Council (CR)</b>	Fissel	Thiare
<b>AGE/ Protection period and year of initiation</b>	17 years / 1992	10 years / 1998
<b>Forest revegetation</b>	Good state	Good state
<b>Exploitation</b>	Cutting prohibited, no development plan	Cutting organised by an ordinary management plan (PSG)
<b>Management body</b>	Village committee (CV)	inter-village committee (CIV)
<b>Formalisation</b>	Informal	Formal
<b>External support</b>	None	The PAGERNA Project and the Department of Forestry and Water
<b>Activities carried out</b>	Pasture, picking, hunting	Pasture, picking, hunting
<b>Size of the protected area</b>	254.754 ha	17ha
<b>Number polarised villages</b>	7 villages : Mbedapp, Ndoffane, Nguirane, Ndoyombour, Nguefere 1, Nguefere 2, Nguefere, 2 hamlets : Peul hamlet, Nguefere hamlet	7 villages : Pakathiare, Keur Malle, Médina Ndeury, Keur Bocar, Ndoune, Taif, Pakathiare Khaye
<b>Number of households</b>	-	231
<b>Number of people involved</b>	-	1666
<b>Dominant ethnic groups</b>	Serere/wolof	Wolof / Peulh



## RESULTS AND DISCUSSIONS

### *Constraints related to the taking over of ESPIV management by the political decision makers*

The interpretation of the results of the diagnostic study, of the perception surveys made it possible to identify the constraints which the political decision makers were faced with in the process of taking over the ESPIV management. Those are related, in most cases, to the difficulties encountered in the implementation of decentralized management of natural resources. The major constraints are: inconsistency of the laws, ignorance of the laws by political decision makers, the absence of legal support and unsafe conditions of the communal reserves supervisors and finally because of failure to mainstream gender issues.

- **Law inconsistency:** The numerous laws and their inconsistency do not facilitate good governance in the management of natural resources. For example in Senegal, with regard to the issuance of cutting permits of green trees, Article 46, decree 96 - 1134 of December 27th, 1996 specifies that it is the president of the rural council who is competent to deliver prior approvals for any cutting of trees within the perimeter of the rural community; on the other hand Article R 20 of the 1998 forest code stipulates that “all exploitation permits are delivered by the service of National Forestry Commission”. The use of the terms “prior approval of cutting” and “cutting permit” can be misleading. This situation could be a source of latent conflict between the foresters and the political decision makers. These contradictions in the laws were also underlined by other authors like (Boutinot, 2005 Yatich et al 2009).
- **Ignorance of the laws by the local political decision makers:** Most rural counselors and especially those of the environmental commission do not grasp the legal texts relating to natural resources management, the forest Code and decree 96 - 1134 of December 27th, 1996, in particular. Their academic and awareness level is very low. This is in line with the comments made beforehand by Program DGL Felo, (2002), Kremer (2003) and Touré and Kremer (2002). Moreover, most rural councils tend to invest the levies on the natural resources to other sectors considered to be priority like education, health, and religious infrastructures.
- **Absence of legal support and unsafe conditions for communal reserves supervisors:** In Senegal, law 96-06 of March 22nd, 1996 about the Code of Local communities and law 96-07 of March 22nd, 1996 about the transfer of authority to the provinces, communes and rural communities specify that the rural community can set up protected areas (Communal Reserves or Forests) the management of which can be entrusted to a local body set up by the populations concerned (DGL-Felo, 2003). Yet, in practice, the populations' commitment remains limited to the decision makings affecting the method of management and of exploitation of these resources. It has been noticed that the existing monitoring bodies are confronted with constraints related to their identification and their insecurity (BENZAF et al., 2000). Indeed the results of the diagnosis and the perception surveys have revealed that the issue of the supervisors suffering from unsafe conditions is linked to an absence of legal support in the performance of their duty (ISRA-CNRF, 2008; SANOGO et al. 2009 in press).

- **Failure to mainstream gender in the ESPIV management:** In the execution of the ESPIV implementation and management activities, men provide for 91% of the total value against only 9% for women. This means that women do not take part in decision making with regard to the management of forest and pastoral lands. They are affected by the degradation of these areas, in spite of that, they do not intervene in decision making concerning these zones. This is a limit for the effectiveness of these strategies; indeed, women establish the link between the setting up of the protected areas and the households. The unequal character of men/women ratios in management set a limit to a sustainable management of forest pastoral lands. The exclusion of other social categories especially the young people, the children and the migrants can be explained by the tradition which discards them from the issues of land and the common management of natural resources. Women and the migrants, however the main users of the resources, are generally isolated (ISRA-CNRF, 2008; DIENG, 2008; KABATOU, 2009 ; GOMIS, 2009 ; SANOGO in press).

*Comparative analysis of ecologic, organizational and institutional socio-economic evaluation, of gender mainstreaming with or without external support regarding the ESPIV*

a. Comparative analysis of ecologic and socio-economic evaluation

Table 2 compares type 1 (site without external support) and type 2 (site with external support) with regard to the types of resources available, the level of availability, the type of exploitation as well as the economic benefits for each type of sites. The analysis of the resources available shows that both sites contain woody, foodstuff, fodder and medicinal resources even though their number and availability vary relatively. Indeed diversity in the reported species is the same (17) for the 2 sites, despite the fact that the number of foodstuff resources is relatively higher in type 1. The frequency of the foodstuff resources in this site can be explained by the existence of a waterway in the protected area. As for the site of Mbedapp (type 1, without external support) the number reported, reveals that such protected space has a real potential in terms of exploitation after seventeen years. However, these woody resources are not exploited. The foodstuffs, medicinal and fodder resources are intended for subsistence farming respectively for the households and the cattle belonging to the native stockbreeders and the migrants. Although this protected area has all these potentials, the neighbouring populations cannot really enjoy these benefits because of a lack of straightforward management and exploitation plan. The fact of leaving the wood in the protected area unexploited has resulted in an increased deficit in firewood and has made its picking up by women harder. The forest code of Senegal authorizes the collection of dead wood and fruits in the protected area for local consumption. Contrary to type 1 site, in Pakathiare Secco (type 2, with support) the woody resources are exploited after only five years protection. In this site, the supply of the populations in woodfire is done through a straightforward management or exploitation plan. This plan was worked out and implemented with the support of a development project (PAGERNA) and the Forest department. The amount of wood sold to various households is measured in an equitable way. In the sale operation, cart load or stere are used as units of measurement. This load is sold at \$US 4.5 and the stake at 5 cents. The protected

area has been exploited since 2003. From 2003 to 2008 the marketing of woodfire and service wood has made up on average an annual profit of \$US 555. Generally, the protected area constitutes an important potential in terms socio-economic advantages for the populations. These benefits can be is direct (collecting of picking up products, leaves and roots....), or indirect (marketing, transformation of the woody and non-woody products, leasing...). Thanks to observance of the regulation of access, control and use of the forest products as part of the protection of the areas, the local populations can draw huge financial benefit from the marketing of the products picked up.

b. Comparative analysis of organisational, institutional evaluation, and of gender mainstreaming with or without support for the ESPIV

The analysis of the table gives an insight of the relationships between the organisational and institutional aspects and gender mainstreaming; yet, they are different in view of the results obtained in the two types of site.

The analysis of organisational evaluation (Table 3) shows that Type 1 site, (Mbedapp without external support) has no formal organization. The Village Committee (CV) had a board which was not decided by the rural council, it was operational either. Only one portion of the people in the neighbouring villages was involved, as a result the local management body was not formalised.

On the other hand in Type 2 (Paccathiare Cecco, a site benefiting from external support), the protected area was headed by a formal management structure called CAC (Counselling and dialogue body). Such management structure was set up by the populations of the villages in the vicinity of the protected area, with the PAGERNA project's backing. This came out of the rural council's deliberation.

On the institutional plan, table 3 shows that in Type 1, a verbal code of conduct was worked out by the neighbouring populations themselves. This code of conduct was not yet validated by the service forest and decided by the rural council. Non-institutionalization has caused the constraints related to monitoring (Frequent illegal tree cuttings in the protected area, clashes). On the other hand, Type 2 site has been provided with a local convention and a straightforward management/exploitation plan deliberated by the rural council and approved of by the sub-prefect. Moreover, it appears that the survey showed that the people respect the local convention, therefore the rural council does not record conflicts related to the management of the protected area any more.

As for gender mainstreaming within the framework of the activities related to the protected area (table 3), it appears that both men and women are involved in the setting up, management and exploitation of the two types of site at various stages. In Type 1, men contribute up to 91.3 %, women with 08.69 % in the setting up and management. On the other hand, in Type 2, women attain 40% compared to 60% for men. In the site which has benefited from external support (Type 2) it was noted that women's involvement is higher than men's during the exploitation phase (53% against 47%).

**Table 2:** Comparative analysis of the development of the resources available in the two types of ESPIV

Type 1 (Site without external support)				Type 2 (Site benefitting from external support)			
Types of resources available	Level of availability	Type of exploitation	Economic benefits	Types of resources available	Level of availability	Type of exploitation	Economic benefits
<b>Woody resources:</b> (woodfire)  <i>Guiera senegalensis</i> , <i>Faidherbia albida</i>	High Average	Unexploited	None	<b>Woody resources:</b> (woodfire) <i>Anogeissus leiocarpus</i> <i>Combretum glutinosum</i> <i>Guiera senegalensis</i>	High High Limited	Organised sale (straightforward management plan)	Average annual return: \$ US5
<b>Foodstuff resources:</b> <i>Parinari macrophylla</i> <i>Balanites aegyptiaca</i> <i>Leptadenia hastata</i> <i>Combretum micranthum</i> , <i>Diospiros mespiliformis</i> <i>Adansonia digitata</i>	High High High Limited Limited Limited	Subsistence farming	Improved household food	<b>Food resources:</b> <i>Diospiros mespiliformis</i> <i>Cordyla pinnata</i> <i>Tamarindus indica</i> <i>Ziziphus mauritiana</i> <i>Adansonia digitata</i>	High High Limited Limited Limited	Subsistence farming	Improved household food
<b>Fodder resources</b> <i>Zornia glochidiata</i> <i>Guiera senegalensis</i> <i>Faidherbia albida</i> <i>Balanites aegyptiaca</i> <i>Celtis integrifolia</i>	High High Average Average Limited	Subsistence farming	Improved livestock feeding stuff	<b>Fodder resources</b> <i>Anogeissus leiocarpus</i> <i>Feretia apodanthera</i> <i>Acacia seyal</i> <i>Guiera senegalensis</i>	High High Limited Limited	Subsistence farming	Improved livestock feeding stuff
<b>Medicinal resources</b> (traditional pharmacopoeia) : <i>Guiera sengaensis</i> <i>Combretum glutinosum</i>	High High Limited	Subsistence farming	Lower health expenses	<b>Medicinal resources:</b> <i>Anogeissus leiocarpus</i> <i>Combretum glutinosum</i> ) <i>Grevia bicolor</i> <i>Ozoroa insignis</i> <i>Cassia sieberiana</i>	High High High Average Average	Subsistence farming	Lower health expenses

**Table 3:** Comparative analysis of the organisation, management and gender mainstreaming in both types of ESPIV

Type 1 (Site without external support)					Type 2 (Site without external support)						
Management board	Gender mainstreaming				Method of management/institutional	Management board	Gender mainstreaming				Method of management/institutional
	Setting up / Management		Exploitation				Setting up / Management		Exploitation		
	M	W	M	W			M	W	H	F	
Village committee (CV)	91,3%	08,69%	*---	*---	<ul style="list-style-type: none"> <li>• Informal organisation (CV chosen without deliberation of the rural council).</li> <li>• Unoperational organisation</li> <li>• Existence of an informal verbal code of conduct or of a verbal regulation</li> <li>• Constraints related to monitoring (frequent wood cutting, clashes)</li> <li>• Ignorance of GRN rules and regulations</li> </ul>	Inter-village Committee (CIV) / Counselling and Dialogue body (CAC)	60%	40%	47%	53%	<ul style="list-style-type: none"> <li>• Formal organisation, result from deliberation of forest people and rural council.</li> <li>• An operational management body (CIV...)</li> <li>• A code of conduct approved by the council, and by the prefect.</li> <li>• A straightforward management plan (P...)</li> <li>• Respect of formal code, of the code of conduct and of the (straightforward management plan)</li> </ul>

\*--- : No exploitation



## *Ownership strategies for communal management of natural resources by local authorities and gender mainstreaming*

### a. Monitoring

The constraint related to unsafe monitoring of the ESPIV has always been expressed by the neighbouring populations (KREMER, W., 2002, KREMER, 2003 and BOUTINOT, 2008). To solve this constraint, they propose to provide the supervisors with cards/badges. Indeed, in some areas of Senegal, the forest service has initiated the use of badges by the supervisors. Yet, until then, such practice has not been adopted at the national level. The reason is, to a few, the use of cards might bring the supervisors to claim for the position of sworn forest agents. Now, it appears that there is a need to find a lasting solution and in harmony with this recurrent issue of the supervisors' unsafe conditions, which has been raised almost everywhere by the populations in charge of managing the ESPIV. We recommend that the supervisors are given cards/badges bearing the signatures of the President of the rural council and the forest agent. This recommendation is the result of a study carried out by Sanogo and Thior (in press) within the framework of the Enhancement project of the Local Strategies for the Management of inter-village forest and pastoral lands. To these authors, the most stakeholders are in favour of this model of card. The double signature enables the rural council to take over community management of natural resources in the area and guarantees legal assistance to the ESPIV supervisors.

This measure, use of cards/badges, is here to supplement the ESPIV monitoring system suggested by Sanogo (in press):

1. Setting up of an inter-village management committee that integrates gender issues
2. Appointment of supervisors (men/women) coming from the polarized villages by the ESPIV
3. Legal recognition of the inter-village committee and the supervisors by deliberation of the rural council
4. Periodic organization of meeting

### b. Enhancing capacities of the Members of the Commission on environment.

To solve the constraints related to the ignorance of the environment commission's mission and of the laws and regulations on the management of natural resources, we recommend the organization of exchange or guided visits and training sessions for the political decision makers.

The interest of these exchange visits is to allow the rural councillors to witness real cases of successful management of communal lands in their ecological zone, to put them in learning situation within these sites and to create dialogue between the decision makers. The populations must be informed and trained to use the results of these exchange visits. Furthermore, the rural council must choose qualified resource persons within the team or among the collaborators and organize training sessions on decentralized management of the natural resources directed to members of the Commission on environment. At this stage, the interest is to develop local expertise and to cut down training expenses.

c. Endowment fund/ decentralized co-operation fund

The rural councils must be given enough means for a successful ownership of natural resources management. Indeed in Senegal, Article 5 of law 96-06 of March 22nd, 1996 about the Code local authorities specifies that “Any transfer of authority to a community must be accompanied by a concomitant transfer to the said by the State, of the resources and means necessary to the normal exercise of this authority”. However, today this will is not translated into action. Therefore, most rural communities are granted low budgets, which restrict their capacities to undertake actions for the purpose of natural resources management (CRDI-CSE, 2005). Consequently, environment issues are not a priority for many rural authorities with the result that they are little taken into account, or even not at all, in the budget of the rural council (ISRA-CNRF, 2009).

For better integration of the activities of natural resources management, we recommend to make advocacy via the ANCR (National Agency of the Rural Councillors) aiming to obtain an endowment fund for the environment and the management of natural resources . This will make it possible to seize the Ministry concerned and the National Assembly so that a fund on environment be inclusive in the budget allocated to the communities. This recommendation is the result of talks which were held jointly with the local authorities through dialogue workshops: (ISRA - CNRF, 2010). Table 4 summarizes the suggested methodology.

The decentralized co-operation fund at provincial council level can also be mobilized and placed at the disposal of rural councils and inter-village committees. Indeed, with the support of decentralized co-operation some provincial councils (Fatick Provincial council) have set up regional forest funds intended to implement activities for natural resources management in the province (ISRA-CNRF, 2010).

**Table 4:** Advocacy strategies seeking the allocation of an endowment fund for the environment and the management of natural resources

Strategy	Advocacy
a. inform and sensitize the population on the GRN (natural resources management)	✓ advocacy to use with the ANCR/AMES
b. choose a permanent officer in charge of the environment	✓ aiming at the Parliament and Government
c. include environment issues in the endowment funds	
d. insert a GRN budgetary heading in the listing to replace the term “reforestation”	✓ advocacy about the energy policy issue for the purpose of saving woody resources
e. request the partners’ support within the framework of decentralized co-operation to finance the GRN	✓ Advocacy toward the
f. Capacitation of the stakeholders to help understand the rules	
g. Adapt the laws to the GRN current context (codes)	✓ International institutions on environment to allow ownership of the programmes by the grass-roots communities.
h. slim down the procedures allowing the local authorities to have access to GRN funds	

d. Strategic partnership over communal management of natural resources

One of the main constraints of the communal management of natural resources is the lack of organization and coordination among the stakeholders; this, due to the absence of means and of a consultation forum. The work undertaken by Project RSL/GESPIV has facilitated the setting up of a strategic orientation committee composed of provincial councils, rural councils, inter-village committees, technical services and research institutes. The advantage of this committee is to allow rural councils and inter-village committees to access the decentralized co-operation funds available at the Provincial council. This dialogue must be initiated at local towards regional level and downward.

**CONCLUSION:**

This study has demonstrated that the populations toil to succeed, and above all, to draw properly the socio-economic benefits from the protected areas which are not accessible to external support. The town councillors must take their destiny in their hands in order to solve the degradation of their environment in a sustainable way. They will necessarily have to consider these recommendations: put the supervisors of the inter-village forest and pastoral lands in a safe condition, enhance the capacities of the members of the commissions on environment, lay down an endowment or a decentralized co-operation fund, and finally promote a strategic partnership for the communal management of natural resources

**ACKNOWLEDGMENTS:** The authors thank the populations of Mbedap and Pacca Thiar Secco. This work was completed with the financial and technical support of the IDRC/CRDI

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