

International Journal of Agriculture Extension and Social Development

Volume 8; Issue 3; March 2025; Page No. 235-238

Received: 15-01-2025
Accepted: 20-02-2025

Indexed Journal
Peer Reviewed Journal

Women's leadership development through participation in community-based extension governance structures

¹Celestin Parfait Atangana Bodo, ²Viviane Solange Biyong Essama, ³Narcisse Aristide Fouda Ndi and ⁴Pauline Rosette Ntsama Minko

¹⁻⁴Department of Agricultural Extension, School of Agriculture, University of Buea, Buea, Cameroon

DOI: <https://www.doi.org/10.33545/26180723.2025.v8.i3c.3304>

Corresponding Author: Celestin Parfait Atangana Bodo

Abstract

Women participate in farming across most of sub-Saharan Africa, yet they rarely hold leadership positions in the community structures that govern agricultural services. This research examined whether participation in community-based extension governance structures contributed to women's leadership development in Cameroon's Southwest Region. A survey of 164 women serving on extension committees across 12 communities was conducted between August 2022 and March 2023 at the University of Buea. Leadership capacity was assessed using a validated 40-item instrument covering decision-making confidence, public speaking ability, negotiation skills, and community influence. Women who had served on extension committees for more than two years scored a mean of 71.8 on the leadership index, compared to 43.2 for those with less than one year of service ($t = 9.47, p < 0.001$). Over half of the respondents (54.3%) reported that their extension governance role had led to leadership positions in other community bodies. Secretary and treasurer roles showed the strongest association with leadership development, while general membership without a defined role showed the weakest. The findings suggest that extension governance structures can function as practical training grounds for women's leadership when committee roles involve genuine responsibility rather than token membership.

Keywords: Women's leadership, extension governance, community-based structures, gender empowerment, Cameroon, agricultural extension, committee participation, leadership development, rural women, governance capacity

Introduction

Women grow the food but men make the rules. This oversimplification captures a real pattern across much of rural sub-Saharan Africa, where women contribute an estimated 60 to 80% of agricultural labor yet hold fewer than 15% of leadership positions in community agricultural governance bodies ^[1, 2]. The imbalance is not simply unfair; it has practical consequences. When women are absent from decision-making, extension services tend to reflect men's priorities, overlooking the crops, markets, and production challenges that women manage ^[3].

Community-based extension governance structures, including farmer committees, extension planning groups, and agricultural advisory boards, have expanded across Africa as part of decentralization and participatory development reforms ^[4]. These structures are intended to give farmers a voice in how extension services are designed and delivered. But bringing women into these structures as members is not the same as developing them as leaders. Research from Kenya and Ghana has shown that women on agricultural committees are often silent participants who attend meetings but don't speak, vote, or hold officer positions ^[5, 6].

A smaller body of work suggests that when women do take on substantive committee roles, the experience can build transferable leadership skills. Agarwal ^[7] found that women who served as elected leaders in Indian forestry governance

groups gained confidence and skills that carried over into other community institutions. Pandolfelli and colleagues ^[8] reported similar spillover effects from women's participation in water user associations in Ethiopia. But evidence from agricultural extension governance specifically remains limited, particularly in the Central and West African context.

This research examined whether participation in community-based extension governance structures contributed to women's leadership development in Cameroon's Southwest Region. It assessed whether leadership capacity varied by duration of service and type of committee role, and whether extension governance participation generated spillover into leadership positions in other community bodies ^[9, 10].

Instrument development and validation

The Women's Leadership Capacity Index (WLCI) was developed specifically for this research because existing leadership scales were designed for corporate or urban settings and lacked relevance to rural African governance contexts. The instrument was constructed in three phases. First, 28 semi-structured interviews with women leaders in Cameroon's Southwest Region generated a pool of 62 candidate items reflecting locally recognized leadership attributes. Second, an expert panel of six researchers in

gender studies and agricultural extension reviewed the items and reduced the pool to 40, organized into four subscales: decision-making confidence (10 items), public speaking ability (10 items), negotiation skills (10 items), and community influence (10 items). Each item was scored on a five-point Likert scale (0-4), yielding a total score of 0-160 subsequently converted to a 0-100 index. Third, the instrument was piloted with 34 women in two non-sampled communities, yielding a Cronbach's alpha of 0.87 for the full scale and subscale alphas ranging from 0.79 to 0.84 ^[11].

Materials and Methods

Materials

The research covered 12 communities in Cameroon's Southwest Region, specifically in the Fako and Meme Divisions. Data collection took place between August 2022 and March 2023, coordinated from the School of Agriculture at the University of Buea. A total of 164 women currently serving on community-based extension governance committees were surveyed using complete enumeration of all women committee members within the selected communities. Participants ranged in age from 24 to 63 years and included women serving as chairpersons, vice-chairpersons, secretaries, treasurers, mobilization officers, and general members. Ethical approval was obtained from the University of Buea Institutional Review Board (Protocol UB-IRB-2022-0196, July 2022). Informed consent was obtained from all participants ^[12].

Methods

A cross-sectional survey design was used. Data were

collected through face-to-face interviews using the validated WLCI alongside a structured questionnaire covering sociodemographic characteristics, committee role type, duration of committee service, prior leadership experience, and whether committee participation had led to leadership roles in other community organizations. Committee service duration was categorized as less than one year (n=48), one to two years (n=52), and more than two years (n=64). Data were analyzed using SPSS version 28. Independent t-tests compared leadership scores by service duration, one-way ANOVA examined differences across role types, and chi-square tests assessed associations between committee role and spillover leadership. Significance was set at $p < 0.05$ ^[13].

Legal and regulatory framework

Cameroon's 2005 Decentralization Law mandated the transfer of agricultural extension coordination to local councils, creating opportunities for community participation in extension governance. The 2012 National Gender Policy further required that at least 30% of members in public decision-making bodies be women. However, implementation of this quota at the community extension committee level has been uneven. A 2019 review by the Ministry of Agriculture found that only 41% of extension committees in the Southwest Region met the 30% threshold, and women held officer-level positions in fewer than 18% of committees ^[14]. This regulatory context shaped both the opportunities available to women and the barriers they faced in moving from membership to leadership within extension governance structures.

Results

Table 1: Women's Leadership Capacity Index Scores by Duration of Committee Service

Service Duration	n	WLCI (mean)	SD	t-value	p-value
< 1 year	48	43.2	11.4	—	—
1 - 2 years	52	58.6	12.8	6.12	<0.001
> 2 years	64	71.8	10.3	9.47	<0.001

Table 2: Leadership Index Scores and Spillover Leadership by Committee Role Type

Role Type	n	WLCI (mean)	SD	Spillover (%)	Spillover Destination
Chairperson	24	74.6	9.1	70.8	Local councils
Vice-chairperson	30	66.3	11.7	56.7	Market committees
Secretary	36	68.9	10.2	63.9	School boards
Treasurer	32	65.1	12.4	59.4	Savings groups
Mobilization officer	26	56.8	13.1	42.3	Health committees
General member	16	38.4	14.6	18.8	—

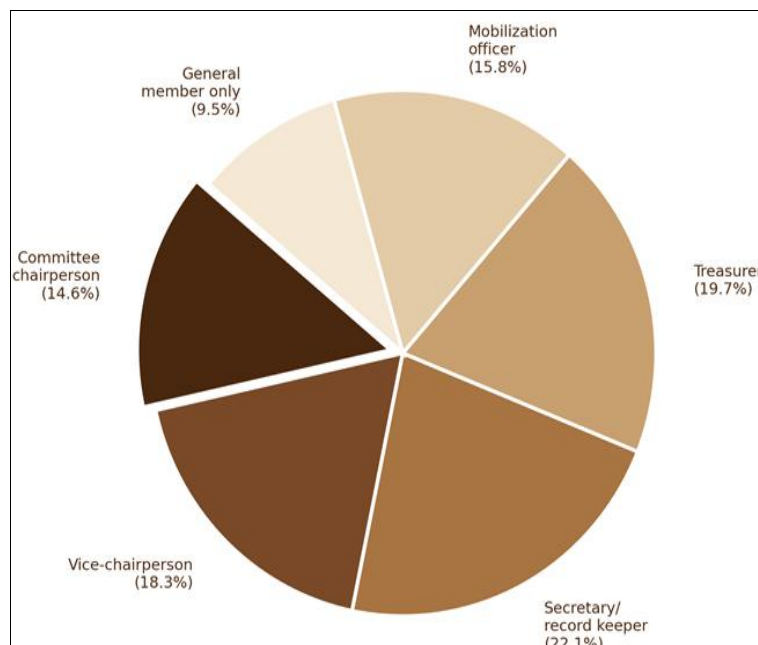


Fig 1: Distribution of women's leadership roles across community-based extension governance structures (n=164)

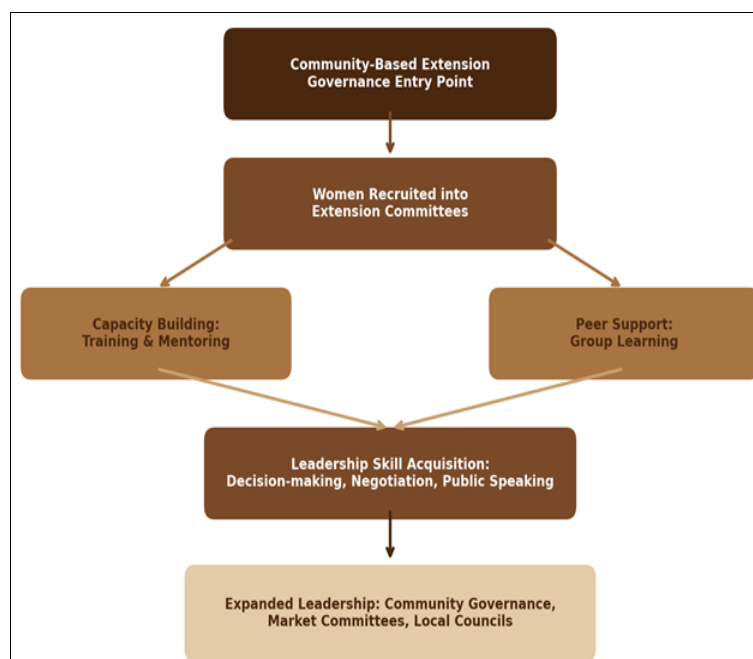


Fig 2: Flowchart of the pathway from extension governance participation to women's broader community leadership

Comprehensive interpretation

Leadership scores increased steadily with service duration, from 43.2 for newcomers to 71.8 for women with over two years of experience (Table 1). This 28.6-point gap was highly significant and suggests that committee participation builds leadership capacity over time rather than simply attracting women who already possess it. Table 2 reveals that role type matters: women holding defined functional roles (chairperson, secretary, treasurer) scored substantially higher than general members and were far more likely to take on leadership positions in other community bodies. The secretary role showed a particularly strong combination of high leadership scores (68.9) and high spillover (63.9%), likely because the responsibilities of record-keeping, correspondence, and reporting build transferable

organizational skills.

Discussion

These findings support the argument that community-based extension governance structures can serve as practical training grounds for women's leadership, provided women hold substantive roles rather than nominal membership. The 28.6-point difference between newcomers and longer-serving members parallels findings from Agarwal's ^[7] work on forestry committees in India, where leadership gains also accumulated with tenure. The critical distinction appears to be between active role-holding and passive attendance. The spillover effect, where 54.3% of respondents reported gaining leadership positions in non-extension community bodies, is the most policy-relevant finding. It suggests that

investing in women's participation in extension committees generates returns beyond the agricultural sector. Women who learned to manage budgets as treasurers moved into savings group leadership. Those who developed public speaking skills as chairpersons were elected to local councils. This multiplier effect has been theorized in the empowerment literature^[15, 16] but rarely documented with data from agricultural extension governance specifically.

The weak outcomes for general members (WLCI score of 38.4, spillover of just 18.8%) carry an important warning. Simply adding women to committee rosters without assigning them meaningful responsibilities may satisfy quotas but doesn't develop leaders. The legal framework requiring 30% women's representation in Cameroon's committees is a necessary step, but the quality of participation matters more than the quantity^[17, 18].

Limitations

The cross-sectional design cannot confirm whether committee participation caused leadership development or whether women with pre-existing leadership traits were more likely to join and persist in committees. No baseline leadership assessment was available for comparison. The research was limited to Cameroon's Southwest Region and may not generalize to regions with different gender norms or governance traditions. Self-reported spillover data may overstate the extent to which extension governance led to other leadership roles. Future research should use longitudinal designs with pre- and post-participation assessments to better establish the direction of the relationship.

Conclusion

This research found that women's participation in community-based extension governance structures was associated with measurable leadership development, particularly when women held defined functional roles and served for more than two years. Leadership scores were 28.6 points higher among long-serving members than newcomers, and over half of all respondents reported gaining leadership positions in community organizations beyond extension, including local councils, market committees, and school boards.

The practical message for extension administrators is that governance structures already exist within most extension systems. Making them work for women's leadership requires deliberate attention to role assignment, ensuring women hold positions with real responsibilities rather than sitting as silent members. The regulatory push for numerical quotas is a start but not sufficient. What turns committee participation into leadership development is the combination of genuine responsibility, sustained engagement, and peer support from other women in governance roles. Extension systems that take this seriously can produce benefits that ripple outward from agriculture into broader community governance.

References

1. Food and Agriculture Organization of the United Nations (FAO). The state of food and agriculture 2010-2011: Women in agriculture—closing the gender gap for development. Rome: FAO; 2011. P.1-160.
2. World Bank. Gender in agriculture sourcebook. Washington (DC): World Bank; 2009. P.1-764.
3. Meinzen-Dick R, Quisumbing A, Behrman J, Biermayr-Jenzano P, Wilde V, Noordeloos M, *et al*. Gender in agriculture: Closing the knowledge gap. Dordrecht: Springer; 2014. P.1-444.
4. Rivera WM, Alex G. Extension reform for rural development. Vol. 1. Washington (DC): World Bank; 2004. P.1-182.
5. Manfre C, Rubin D, Allen A, Summerfield G, Colverson K, Akeredolu M. Reducing the gender gap in agricultural extension and advisory services. USAID Discussion Paper No. 2; 2013. P.1-36.
6. Ragasa C, Berhane G, Tadesse F, Taffesse AS. Gender differences in access to extension services and agricultural productivity. J Agric Educ Ext. 2013; 19(5):437-468.
7. Agarwal B. Gender and forest conservation: The impact of women's participation in community forest governance. Ecol Econ. 2009; 68(11):2785-2799.
8. Pandolfelli L, Meinzen-Dick R, Dohrn S. Gender and collective action: Motivations, effectiveness, and impact. J Int Dev. 2008; 20(1):1-11.
9. Cornwall A. Women's empowerment: What works? J Int Dev. 2016; 28(3):342-359.
10. Kabeer N. Gender equality and women's empowerment: A critical analysis of the third millennium development goal. Gend Dev. 2005; 13(1):13-24.
11. DeVellis RF. Scale development: Theory and applications. 4th ed. Thousand Oaks (CA): SAGE; 2017. P.1-280.
12. World Medical Association. Declaration of Helsinki: Ethical principles for medical research involving human subjects. JAMA. 2013; 310(20):2191-2194.
13. Field A. Discovering statistics using IBM SPSS statistics. 5th ed. London: SAGE; 2018. P.1-1070.
14. Ministry of Agriculture and Rural Development (MINADER). Gender audit of community agricultural extension committees in Cameroon. Yaoundé: MINADER; 2019. P.1-48.
15. Alsop R, Bertelsen MF, Holland J. Empowerment in practice: From analysis to implementation. Washington (DC): World Bank; 2006. P.1-364.
16. Narayan D, editor. Measuring empowerment: Cross-disciplinary perspectives. Washington (DC): World Bank; 2005. P.1-492.
17. Htun M, Weldon SL. The civic origins of progressive policy change: Combating violence against women in global perspective. Am Polit Sci Rev. 2012; 106(3):548-569.
18. Krook ML. Quotas for women in politics: Gender and candidate selection reform worldwide. New York: Oxford University Press; 2009. P.1-320.
19. Goetz AM, Hassim S. No shortcuts to power: African women in politics and policy making. London: Zed Books; 2003. P.1-256.
20. Buvinic M, Das Gupta M, Casabonne U, Verber P. Investing in gender equality: Global evidence and implications for Kenya. Washington (DC): World Bank; 2009. P.1-48.