Female Academic Career Development and Administrative Positions at Addis Ababa University: a Mixed-Method Study

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Abstract

Background: In Ethiopia, the number of female in academia in general and in administrative positions and higher university ranks in specific is very small as compared to men. A slight change has been seen in recent years, where a few women have come to male-dominated administrative positions as university presidents, vice presidents, deans and directors with still insignificant increase in the number of full professors.

Objective: This study assessed female faculty member's career development and involvement in administrative positions and explored challenges.

Method: We used a sequential mixed-method study starting with a cross-sectional quantitative study among 888 faculty members. The quantitate data were analysed using descriptive statistics and regression models to identify independent predictors of administrative involvement using SPSS version 25 software. An exploratory qualitative study was done among eight purposively selected female faculty. NVivo10 data management software was used to code and categorize the transcripts.

Result: We found that male faculty members were more likely to involve in administrative positions than their female counterparts [AOR (95%CI) 1.6(1.1, 2.4)]. Those who were provided housing facility by AAU [AOR (95%CI) 2.29 (1.61, 3.23)] and assistant professors and above [AOR (95%CI) 1.495 (1.01, 2.220)] were more likely to involve in an administrative position than their counterparts. The qualitative findings indicated that the low salary faculty earns, lack of networks and family responsibility have deterred females from taking administrative positions. **Conclusion:** Female faculty involvement in the university administrative position and career development is very low. Both structural and personal factors such as gender roles affected their professional enhancement in academic ranks and hence positions. Creating a conducive platform for female faculty development is recommended to increase their involvement in administrative positions. [*Ethiop. J. Health Dev.* 2021; 35(SI-2):30-39]

Keywords: Addis Ababa University, administrative positions, career development, female academician, female faculty

Background

In countries where gender equality is achieved, women's involvement in the development agenda has positively impacted all aspects of the country's wellbeing(1). However, half of the population are denied their rights to participate in the development of their country in low and middle-income countries(2). One of the areas where gender equality should be demonstrated is in academia, where men hold most academic administrative positions. Academia and research were deemed men's role by many even though women demonstrated their capacity as scientists and inventors from the past (3, 4).

Gender equality is at the center of the global development agenda, rolling from the Millennium Development Goals (MDGs) from 1995 to 2015. Moreover, it has emerged again as a component of the Sustainable Development Goals between 2015 and 2025. In spite of that, countries are struggling to bring gender equality in academics partly because of cultural and community held beliefs that academia and leadership is best served by men(5, 6)

Even though women can participate in research and innovation, the role of women in academia is usually limited to teaching and mentoring(7, 8). This lack of involvement in research among women in academia is also common in high-income countries (HIC) mainly

because of their involvement in domestic and reproductive and child care responsibilities as is the case in low and middle-income countries (LMIC) (4, 9, 10).

Promotion to higher academic ranks is dependent upon research outputs and participation in academic leadership. However, the burden to women in academics as mothers, homemakers, and workers put them in a vicious circle of serving universities at a lower position as lecturers and if they are lucky as assistant professors. Although university policies and concerned stakeholders have tried to address issues that affect women's development in academic ranks, the chances of getting there have not been realized (11, 12). Although female participation in primary and secondary education has improved in the past two decades from 0.87 and 0.69 in 2004/05 to 0.93 and 0.92 in 2008/2009 (13), the participation of female students in higher education and post-graduate programs is still quite limited which has resulted in a low representation of female instructors. The uneven representation subsequently affects getting role models for the next generation (3, 14) The absence of women in leadership positions makes academia less appealing to younger female faculty(15, 16).

Higher education institutions in Ethiopia are hierarchical and dominated by men. Furthermore, negative gender beliefs and assumptions at both individual and institutional levels push women to conform to unjust treatments(17).

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Concerned with the low representation of women in academia, the Education Sector Development Plan, ESDP IV aimed to bring the proportion of females in academia to reach 20% as well as 16% of females in higher academic positions (13). However, the number of females in academia is still low after five years. Only 11% of staff with a bachelor's degree were females, and among faculties with a master's degree or a Ph.D., only 7% were women in 2015[13, 18]. Even if most public universities tend to have women as gender office directors, heads of departments, chief librarians, and

This study aimed to assess career development of female academia in terms of involvement in administrative positions and academic ranks as well as explore their challenges.

registrars, this trend is almost negligible in science and

Methods

Study area and period

engineering areas (14).

The study was conducted at Addis Ababa University (AAU). The University has been the leading center in teaching-learning, research, and community services. Beginning with an enrollment capacity of 33 students in 1950, AAU has now 46,873 students undergraduates, 15748 Masters, and 2,344 Ph.D. students). There are 2,987 academic staff, where only 16% of academicians are females (19) Including 90 programs and various Health Ph.D. Sciences specializations, the University runs 76 undergraduate and 343 graduate programs, At present, the University has 12 institutes (two technology, seven research institutes that predominantly conduct research, and three that conduct both research and teaching). The University is led by a president who is assisted by four vice presidents of whom two are currently women for the first time in the history of the University (19).

While the quantitative assessment was done from October 2018 to March 2019, followed by the qualitative study was conducted from July to September 2019.

Study design

This study is part of a bigger study that has assessed the gender gap in research among faculty. We used sequential mixed-method research. First, the quantitative study was conducted among both male and female faculty and that was followed by exploratory qualitative research.

Sample size and selection:

Quantitative study: We used a simple population proportion formula using 95% confidence limits, 50 percent population, and a design effect of 2 and found a sample size of 682. Adding a 30 percent non-response rate, we calculated a sample size become 887. Staff members who were present on campus during the study period and were willing to take part in the study were included. On the other hand, lecturers who had less than one year of experience and faculty who were on a study leave outside the country or in fieldwork; and those who

were on sabbatical, maternity, or sick leave were excluded.

Qualitative: Using purposive sampling, we selected a total of eighty faculty members (five senior female faculty with a rank of an assistant professor above and three junior female faculty with a rank of lecturer) for the qualitative segment of the study. The number of the key informants for the in-depth interviews was determined depending on the level of information saturation. Female faculty members who participated in the quantitative study and 20 more female faculty who were in the study team were also excluded.

Data collection tools and procedures

Quantitative: Data were collected using a structured self-administered questionnaire. The questionnaire was developed in English based on the objectives of the study and reviewing relevant literature. Questionnaires were distributed to study participants by trained data collectors. Data collection was facilitated by ten M.Sc. degree holders and one supervisor trained for three days on research objectives, data collection tools, and data collection methods. The data collectors were assigned to each of the ten colleges along with support letters addressed to college deans and department heads. The data collectors approached individual informants in collaboration with the department secretaries who knew the staff's schedule. After providing a thorough explanation about the study, the data collectors distributed the information sheet and consent form to each participant. When the data collectors could not access the informants, department secretaries helped in reaching them.

For the qualitative: We used a semi-structured interview guide to collect data. Four members of the research team took part in collecting the qualitative data. In addition to having special training and experience in undertaking qualitative research, the four members of the team hold an MPH degree or M.D. plus specialty. Interviews were conducted in Amharic in a quiet environment, mostly in the participants' offices at their convenience. With the consent of the respondents, all interviews were recorded, and notes were taken After the self-introduction, participants were encouraged to talk about their personal work experience in terms of research, participation in administrative positions, their challenges, their suggestions, and recommendations on how to bring females at the forefront of research. And probing questions were posed, as necessary. By way of closing the interview sessions, the note taker would summarize their responses and read them back to the participants and any misunderstandings were corrected immediately. On average, a single in-depth interview took 30 minutes.

Data analysis and measurement:

While administrative involvement was the outcome variable, academic rank, years of experience, specialty degree, number of children, last child's age, part-time engagement, house ownership were independent variables of the quantitative study.

For the quantitative: Data were checked for completeness and coded on a hard copy of the questionnaire after data collection. Data were entered into a computer using Epidata version 3.1 software. The data were then exported to SPSS version 25 software for further cleaning and analysis. The data were summarized in texts, tables, graphs, and figures using descriptive statistics. Proportions were used and the Chisquare test was computed at analysis. Bivariate and multivariable logistic regression was done to identify factors associated with the academic promotion and administrative involvement. A significant association was declared if the P-value is <0.05. Both unadjusted and adjusted odds ratio with a 95% confidence interval was reported.

For the qualitative: All audio records were transcribed verbatim and translated into English by the research team who collected the data. Translated notes were read and re-read by the research team members with qualitative research experience to code and define categories and sub-categories guided by the objective of the study. A codebook was prepared after coding a third of the transcripts and was reviewed before continuing the coding. Data were coded and categorized using the qualitative data management software NVivo10.

Data quality control

For the quantitative: M.Sc. degree holder data collection facilitators and supervisors were assigned to ensure the quality of data. Data collectors and the **Results**

This study is presented using the quantitative findings supported by the findings from the qualitative research. We presented the general characteristics followed by their involvement in administrative positions, their engagement in part time jobs (as teaching, consultancy, and clinical work) and then the factors that affect their involvement in administrative positions. Finally, the challenges that deter female academia from participating in administrative positions and their suggestions to change the situation are presented.

General characteristics of the study participants (for the quantitative study)

supervisor were trained for three days about the objectives, scope of the research, and data collection technique before starting the study. The collected data were checked regularly for their completeness and clarity.

For the qualitative: Trustworthiness of the qualitative data was ensured following different approaches. For example, member check was used to test data and interpretation as they are derived from the participants. And to avoid bias, the expressions of respondents were narrated during the interpretation and analysis of results. Data were coded by two groups of coders to observe and compare the agreement with the coding using NVivo 10 software.

Ethical consideration: We secured ethical clearance from the College of Health Sciences Institutional Review Board, Addis Ababa University protocol number 035/18/SPH. Permission was obtained from each college and department. With a help of an information sheet, each respondent was informed about the purpose, scope, and benefits of the research. Prior to the participants' enrollment for the study, it was made sure that all their queries were answered, and their informed consents were obtained. Confidentiality of participants was assured throughout the study by keeping all relevant documents in a secured place after maintaining the anonymity of personal information.

A total of 888 faculty participated in this study. The large majority, 727(81.9%), were male; 365(41.1%) were between 31 and 40 years of age, and 633 (71.2%) were married. While nearly half of the respondents, (441, 49.7%) served the University between 1-10 years, nearly a third of them (279, 31.4%) had 11 or more years of service.

Most 381 (42.9%) of the respondents had a master's degree, while 334(37%) were Ph.D. holders. More than half of all respondents, 414 (50.49%), were living in rented houses, 267 (32.56%) were living in their privately owned houses, while only139 (16.95%) were living in AAU owned houses.

Table 1. Characteristics of study participants at Addis Ababa University (n=888) 2010

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Variable	Number (n)	Per cent (%)			
Sex					
Male	727	81.9			
Female	161	18.1			
Age					
20-30 years	140	15.8			
31-40 years	365	41.1			
41-60	316	45.6			
60+	67	7.5			
Marital status					
Married	633	71.2			
Never married.	216	24.3			
Divorced	24	2.7			
Widowed	15	1.7			
Have a child.					
Yes	596	67.1			
No	292	32.9			
Highest degree	28	3.2			
BA	28	3.2			
MD	117	13.2			
MD with specialty	381	42.9			
MSc	334	37.6			
PhD					
Academic rank	378	42.56			
Lecturer	326	36.7			
Assistant professor	112	12.6			
Associate professor	26	2.9			
Full Professor					
Service year					
1-10 years	441	46.47			
11 years and above	279	31.4			
Others	168	18. 9			
Residential ownership					
Own house	267	32.56			
Rented house	414	50.49			
AAU owned house	139	16. 95			

General characteristics of study participants (for the qualitative section): We were able to generate data from eight faculty members at five colleges/

institutes of AAU. The participants had served the University between 4 and 39 years. While three of the participants were lecturers, the rest had a rank of assistant professor and above.

Table 2: General characteristics of qualitative study participants, Addis Ababa University, 2019

Variable	Number
College /institute	
College of Health Sciences	3
College of Development Studies	2
College of Education and Behavioral studies	1
College of Performing and Visual Arts	1
College of Natural and Computational Sciences	1
Department	
Nursing and midwifery	2
Information Science	2
Radiology	1
Social Science and Language	2
Education	1
Social Anthropology	
Years of services at AAU	4
2-7 Years	2
14-21 Years	2
32-39 Years	
Rank	2
Associate Professor	3
Assistant Professor	3
Lecturer	

Administrative involvement

Half of the respondents, 440 (49.5%), never served in any AAU administrative positions. Among those who have experience in any of the AAU administrative positions, 185(20.8%) were department heads, while 87 of them (9.8 %) served as academic unit heads. The participation of female faculty administrative positions is quite grim. While only 15 (9.2 %) of female academicians served as department heads, the proportion of those who had positions as academic unit heads accounted for 11 (6.7%). Whereas only 2 female faculty (1.2%) have served as college deans, their participation as president5=or director in AAU was nil. During the in-depth interviews, most of the participants pointed out that it is difficult for females to be involved in administrative positions because they have more family responsibilities, unlike the male academia. In the words of a participant,

Women must nurture/breastfeed their children, and it will be a double burden to be involved in the administrative position since they do not get much support from husbands. (Respondent I)

Another senior participant has a related complaint:

Being a female by itself is also a challenge
because you are another

person out of this environment; you are a mother where there are many household chores, and you cannot think of an administrative position in such a condition. (Respondent VI)

One other respondent also has this to say concerning some stereotypes held by men, which deter women from taking leadership positions:

The first big challenge is we are taken for granted that we can't be leaders. Most of the time, men do not take us seriously that females deserve this. Whoever is the leader, thinks the same. (Respondent VI)

By way of explaining her case further, the same respondent recounts a personal experience on how the attitude of men to the maternity-related leaves could be a limiting factor for female academics in taking administrative and other important positions as follows:

The position was requiring a demographer and I was one of the few applicants who had the qualifications. They did not want to give me the position using my breastfeeding status as a pretext. The oppositions to waiver you in your back and you do not know when you fail. (Respondent IV)

Table-3. Involvement of Addis Ababa University's faculty in administrative position n=888, 2019

Variable	Male	Female
	n (%)	n (%)
Participation in AAU'S administrative position	Male	Female
Yes	386 (53.2)	62 (38.3)
No	340 (46.8)	100 (61.7)
Serve as department head		
Yes	170 (23.4)	15 (9.2)
No	555 (76)	148 (90.8)
Serve as academic unit head		
Yes	76 (10.5)	11 (6.7)
No	649 (89.5)	152 (93.3)
Serve as Dean		
Yes	20 (2.8)	2 (1.2)
No	705 (97.2)	161 (98.8)
Serve as Director		
Yes	4 (0.6)	0
No	721(99.4)	163 (100)
Serve as Vice president		
Yes	40 (58)	0
No	691 (94.2)	157 (100.0)
Serve as President		
Yes	3 (0.4)	0
No	722 (99.6)	163 00)

Part-time engagement: a dilemma between survival and carrier development

Although the involvement of men in part-time jobs is significantly higher by more than 50 % 1.54 (1.145-2.07). Nearly half,76 (46%) of the female respondents also reported that they were engaged in part-time work (Tables 4 and 5). Participants of the interviews also say they engage in part-time jobs to support their livelihood. One senior faculty elaborated that the amount of salary the faculty earn is not enough forcing them to look for a part-time job, which in turn makes

their life busy and hinders them from engaging in research and University affairs. Her remarks below are more telling:

My salary is 13,000 birr, and after 35% taxes I get around 6,000. How can I live with this salary at this time? Is it possible [to live with that income]? So, I do not have the luxury to research because I must work part-time as well. [Obviously] you cannot engage in research when you work part-time. When you are determined to engage in research, your pocket will be empty within a week of your

engagement. And you will be discouraged again. (Respondent V)

Explaining how the pressure resulting from part-time work hinders her research activity, which could pave the way for academic rank and hence administrative positions, another female academic also has this to say:

> First, it (conducting research) helps me to build my career, secondly it satisfies me and

third I get money for doing it. Money is a basic thing and since I work in a government institution my option to get money is to work for a private company which puts more stress on me. Plus, it is difficult to manage my time properly, so I prefer to settle here to work on *my research and get money.* (Respondent *II*)

Table 4. Engagement of Addis Ababa University's faculty in part-time job/projects n=888, 2019

Variable	Male	Female
Part-time engagement n= (888)		
Yes	389 (53.8)	76 (46)
No	334 (46.2)	89 (53.9)
Involvement in consultation		
Yes	194 (26.8)	29 (17.6)
No	529 (73.2)	136 (82.4)
Part-time teaching work		
Yes	174 (24.1)	28 (17)
No	549 (75.9)	137 (83)
Part-time clinical services		
Yes	67 (9.3)	21 (12.7)
No	656 (90.7)	144 (87.2)

Factors influencing female academia involvement in administrative position.

Male faculty were more likely to involve in administrative positions than female counterparts [AOR (95%CI) 1.6(1.0, 2.4)]. Faculty whose age lies between 40 and above were two times more likely to involve in an administrative position [AOR (95%CI)2.3 (1.6, 3.4)]. Those who had ever married were more likely to involve in administrative positions than those who were not

married [AOR (95%CI) 1.7(1.0, 2.8)]. Assistant professors and above were more likely to involve in administrative positions [AOR (95%CI) 1.5 (1.0, 2.2)]. Those who have AAU-owned house were two times more likely to involve in an administrative position [AOR (95%CI) 2.2 (1.6,3.2)]. Faculty who did not engage in part-time work were more likely to involve in an administrative position [AOR (95%CI) 1.5 (1.1, 2.0)] (Table 5)

Table5. Factors affecting administrative involvement among academic faculties at Addis Ababa University, Ethiopia, 2019

Variable	n (%)	COR (95% CI)	AOR (95% CI)
Sex	•		
Male	727 (81.9)	1.813 (1.278, 2.571)	1.604(1.085, 2.37)
Female	161 (18.1)	1	1
Age			
20-40	505 (56.9)	4.767 (3.574,6.359)	1
41 & above	383 (43.1)	1	2.329 (1.608, 3.37)
Marital status			
Ever Married	670 (75.6)	0.300(0.215, 0.419)	1.732(1.038, 2.89)
Not married	216 (24.4)	1	1
Having children			
Yes	594 (67.1)	0.381 (0.285,0510)	0.886 (0.553, 1.42)
No	291 (32.9)	1	1
Highest degree achieved*			
Masters, MD, MD with specialty			
PhD	554 (62.4)	2.481 (1.875,3.285)	0.922(0.609, 1.39)
	334 (37.6)	1	1
Academic rank**			
Lecturer	378 (43.9)	3.046 (2.313,4.011)	1
Assistant Professor and above	326 (36.7)	1	1.495(1.004, 2.22)*
Resident house			
Own house, Rented house	681 (83.05)	1	1
AAU owned house	13 139 (16.95)	0.232 (0.174-0.310)	2.285 (1.615,3.23)
Part time engagement			
Yes	419 (47.4)	1	1
No	465 (52.6)	1.725 (1.322-2.252)	1.541 (1.145, 2.07)

^{*}and ** were included in the model sequentially to avoid collinearity.

Suggested ways to improve female faculty involvement in administrative positions:

This study also explored female faculty's suggestions to improve female faculty's academic career development which is based on research undertakings and publications to go up the academic ladder and hence to administrative positions. Most participants suggested the need for organizing training in research and creating a platform for networking among female faculty as key strategies to bring their involvement in research, which will eventually take them to the next level.

Training and dedicated grant call for Female academia.

Being continuously empowered through training programs was mentioned as an important mechanism that could help females to involve in research. It was suggested that first, the area of empowerment must be identified, and training must be given for one or two weeks to motivate females to develop research projects. On top of that, participants also suggested the need to make a grant call dedicated to women only and female researchers' mandatory involvement in the research team as a requirement for approval. For example, a participant note,

I believe that more female faculty would get interested in engaging in research if the calls for research are made specific to women. (Respondent I)

Another respondent agrees,

I think putting a requirement can be helpful such as having women researchers in the research grant application as a mandatory requirement in grant calls. (Respondent VII)

Mentorship and dedicating a research presentation day.

Junior participants raised the importance of mentorship in bringing female faculty into research. Some participants also underlined the idea of organizing a summer camp for research as one way of maximizing women's research opportunities. In the eyes of a participant,

The most important thing is mentorship. Young girls need to have a role model, so I believe it would be great to work on it. I am not a fan of the gender narrative that is out there. I do not think it is constructive (Respondent III)

Assigning one day per week for a research day by the University was also suggested as an excellent mechanism to bring female faculty to be involved in the research.

...if the University plans to get more research done, it needs to show [some]commitment. According to the experiences of other institutions, there is a research day for staff who are working on research. In such a way, they [staff are made to] dedicate one day per week for research. So, I believe this method is good. (Respondent II)

Making research an interesting academic exercise

Instilling an interest in female academics was also raised as a way of boosting their involvement in research. A remark by a participant below is more telling:

To do research, you need to have an interest in the first place. Some say that they are not interested in doing research, but I think that emanates from the lack of know-how. Unless one knows the basics of research clearly and tries it, how can one develop an interest? I believe that the process of collecting data and preparing the document is what makes research interesting. Plus, it requires hard work. (Respondent II)

Support in special considerations for females in Academics

Respondents recommended that females give priority to research when taking study leaves. They are also of the opinion that daycares should be established in the University. Having daycare in the University helps, the respondents note, women to breastfeed their child during break time and that can give a breathing space for them to focus on research. Respondents believe that women preoccupied with house chores including taking care of children cannot be productive in their research. Talking from experience, one respondent recounts:

I have multiple responsibilities teaching and household responsibilities, once I get home, I will be occupied with household chores... when I finish, I will get tired and electric power is inconsistent which makes my life hard to undertake research... (Respondent IV)

Discussion

The study showed that female faculty's involvement in university administrative positions was very low. It was also found that no higher positions such as directorate, vice president, and president were held by the participants in this study. The study also revealed that women had a lot of strategies in mind that could boost women's research capacity thereby paving the way to bring more women into administrative positions. Strategies forwarded by participants include arranging training and dedicated grant calls for female academia; mentorship and dedicating a research day; making research an interesting academic exercise, and creating special conducive situations (e.g., establishing daycare) to support females in academics.

The fact that only a few women are participating in administrative positions does not reflect a lack of interest for most. Their limited participation is attributable to time constraints, burden at a household level, and gender stereotyping. Even though female faculties are well educated and earn more income than an average woman in the country, they still face the same challenge in spending more time in terms of caring for their children and household chores.

On the other hand, participants from the qualitative study had raised those structural issues expressed in patriarchal thinking that consider women academia incompetent for taking administrative positions. This issue has to be taken seriously as other studies also indicated that it is hard for female faculty to take administrative positions due to gender stereotyping which depicts administrative positions that require masculine character including strength, aggressiveness, and competitiveness (20).

In addition to the low number of women (less than a fifth of AAU's faculty) (19), the University could not bring equity in leadership when women have such an inability to have leadership positions because of structural issues. This finding is similar to that of other studies conducted at Addis Ababa University, in three colleges, in Hawassa and Amhara regions where women's academic leadership participation was found to be low mainly as a result of structural/systemic problems, stereotyping, patriarchy, and lack of support system at work (21-23). On the other hand, unlike what is found in the present study, a study conducted among three public universities indicated that female faculty reported that they were fairly treated at universities despite their very low number in academic leadership (24). This may be a misunderstanding about their perception of equal treatment. If treated fairly, how come they are not holding leadership positions, one might question. In the present study, we have observed that women were left behind for reasons related to their maternity roles such as breastfeeding and waved from administrative and other important academic positions. A typical quote from a senior participant from the qualitative study could explain the situation clearly," you do not know what they [the men in leadership] do openly but you know it when you fail".

Part-time teaching is a beneficial academic exercise that most academicians may want to be engaged in. The quantitative findings indicated that female faculty in this study were less involved in part-time teaching. However, the finding from the qualitative segment of the study indicated that even most of those who do not participate in consultancies and part-time work had indicated that they do not have time to peruse their career development both in academic ranks and holding administrative positions as part-time working is stressful and tiring. And those who do not work part-time reported that family responsibility affects in many ways. Some women often have fewer hours available to work in the office while others have difficulty working in the evening hours and working at home. They say their time at home coincides with their household responsibilities and the duty to care for their children. Female faculties have also complained about continuous power interruption as a deterrent to continue working from home in the evenings. These findings are consistent with other studies that found that women's career development is affected by household and family responsibilities. Their domestic responsibilities are also mentioned as one reason for their weak professional networks (4, 8, 13).

Women in this study were found to have less engagement in consultancy work as compared to their male counterparts. This may be because of a lack of access to calls for consultancy or due to a lack of social networks with colleagues. Unlike their male counterparts, female faculty members do not have time after work to exchange such information since they have household responsibilities. In addition, networking among males and females is limited. AAU legislation encourages staff to contribute to the country's development through consultancy (25). On the other hand, some female faculty indicated that they were engaged in consultancy work to augment their livelihood and put this as a deterrent to research activities. However, female participation in consultancy and research work is limited as can be understood from AAU records (26)

This mixed-method research further indicates that the long-standing gender stereotyping and structural issues deterred women academia from taking administrative positions. Though women blame themselves for not balancing work and life and for failing to take part in an administrative position, it is time to work on overriding gender stereotyping and structural issues that prevent women from taking this higher administrative position in the University(15). Instead of focusing on quantitative indicators of inequalities in higher education in Ethiopia, there is a need to pay more attention to institutionally embedded challenges experienced by female faculty themselves(15). These are structural factors of inequalities along gender and poverty lines(27).

To address the challenges of female faculty in research and leadership, gender differences must be considered in faculty recruitment, academic appointment and promotion, and scholarship opportunities. Furthermore, creating a woman-friendly institutional environment would encourage female faculty to take leadership roles(17). Female participants in the qualitative study suggested that mentorship and networking will improve female faculty participation in career development, leading them to higher-level leadership at the University. These findings are supported by a study done in 2011 at AAU, which amplifies networking opportunities both within and outside the University to capacitate and motivate females in research and related activities (28). Other studies elsewhere also recommend networking as a key for empowering women(22).

Limitation

The participants' selection was not random due to the nature of the study population. It was not, for example, possible to include some faculty because they were not in their office due to sabbatical leave, study leaves, or fieldwork. Although we were not able to randomly select our participants, we still managed to interview a proportionate number to the size of females (18%), which is higher than the real representation. Besides, since females who participated in the quantitative study were excluded from taking part in the interviews and 20 more females were part of the study team, we had problems getting a diversified number of female participants for the qualitative segment of the study. Admittedly, this might have affected the richness of the qualitative study.

Conclusion

Female faculty administrative engagement at Addis Ababa University is very low. Only a very few female faculties are involved in administrative positions as department heads, academic unit heads, and deans, and none as college deans and other higher positions. Structural issues both at workplaces and at home compounded by their low income had affected the participation of women at the University administrative positions. AAU should facilitate the participation of female academia in administrative positions by creating a conducive environment in terms of mentorship, availing special research grant offers, and making positions more attractive than seemingly challenging in the faces of balancing work and life for female academia.

Funding

Addis Ababa University (AAU) funded this study through the thematic research grant.

Acknowledgments

The authors would also like to thank the College of Health Sciences for its unreserved support, the data collectors and study participants for their time and contributing to the research.

References

- 1. Dilli S, Rijpma A, and Carmichael SG, *Achieving Gender Equality: Development versus Historical Legacies.* CESifo Economic Studies, 2015. 61(1): p. 301-334.
- 2. Ogato GS, The quest for gender equality and women's empowerment in the least developed countries: Policy and strategy implications for achieving millennium development goals in Ethiopia. International journal of sciology and antroplogy 2013. 5(9): p. 358-372.
- 3. Khan B, *Invisible Women: Entrepreneurship, Innovation, and Family Firms in Nineteenth-Century France. The Journal of Economic History,* The Journal of Economic History 2016. 76(1): p. 163-195.
- 4. Demartini P, *Innovative Female-Led Startups*. *Do Women in Business Underperform?* Adm. Sci., 2018. 8(4).
- 5. Boateng DA, Experiences of female academics in Ghana: Negotiation and strengths as strategies for successful careers. E. African J Soc Work 2018. 8(1): p. 21-30.
- 6. Yenllmez MI, Women in academia in Turkey: Challenges and opportunities. Yönetim Bilimleri Dergisi / Journal of Administrative Sciences, 2016. 14(28): p. 289-311.
- 7. Howe-Walsh L, T.S., *Barriers to women leaders in academia*. Tales from science and technology. Study high Education, 2016. 41(3): p. 415-28.
- 8. Ashencaen Crabtree S, S.C., "Playing Mother": Channeled Careers and the Construction of Gender in Academia. SAGE Open, 2019. 9(3).
- 9. Angervall P, The academic career: a study of subjectivity, gender, and movement among

- women university lecturers. Gend Educ, 2018. 30(1): p. 105-18.
- 10. Gasser CE and Shaffer KS, Career Development of Women in Academia: Traversing the Leaky Pipeline. Prof Couns, 2014. 4(4): p. 332-52.
- 11. Danell R and Hjerm M, Career prospects for female university researchers have not improved. Scientometrics. 2013. 94(3): p. 999-1006.
- 12. Cheung FM, H.D., Women at the Top: Powerful Leaders Define Success as Work + Family in a Culture of Gender. Am Psychol, 2010. 65(3): p. 182-93.
- 13. (MOE), M.o.E., ESDP IV Pap (2010/11-2014/15). 2010
- 14. Asmamaw AT, Women Participation in Higher Education Management in Ethiopia. J Humanit Soc Sci, 2017. 22(11): p. 55-64.
- 15. Molla T and Cuthbert D, *Qualitative* inequality: experiences of women in Ethiopian higher education. Gender and Education, 2014. 26(7): p. 759-775.
- 16. Mengesha EH, Female Voice in Academic Publications: The 'Female Voice' in Ethiopian Journal of Development Research. Ethiopian Journal of Development Research, 2017. 39(1).
- 17. Semela T, Bekele H, and Abraham H, Navigating the river Nile: the chronicle of female academics in Ethiopian higher education, Gender, and Education. Gender and Education, 2017.
- 18. Eerdewijk VE, et al., Female Faculty and Leadership: Affirmative Action and Gender Equality in 13 Universities in Ethiopia. 2015, Federal Democratic Government of Ethiopia, Higher Education Strategy Center: Addis Ababa. p. 1-16.
- Addis Ababa University, Addis Ababa University Annual Performance Report. 2019/2020, Addis Ababa University Addis Ababa.
- 20. Yousaf R and Schmiede R, Barriers to women's representation in academic excellence and positions of power. Asian j. Ger. Eur. stud., 2017. 2(2).
- 21. Abera M, Academic Women's Position in Leadership Management and Other Decision-Making Activities: The Case of Three Governmental Colleges in Awassa, in College of Development Studies. 2009, Addis Ababa University Addis Ababa
- 22. Ademe and Singh M, Factors Affecting Women's Participation in Leadership and Management in Selected Public Higher Education institutions in Amhara Region, Ethiopia. European Journal of Business and Management 2015. 7(31).
- 23. Seidmekiye Y, Academic Women's Participation in Leadership: The case of Addis Ababa University., in College of Development Studies. 2008, Addis Ababa University, Addis Ababa
- 24. Abebe G, Status of Women Academicians, and their Perceptions of Gender Bias vis-a-vis

- Some Organizational Variables: The Case of Three Public Universities in Ethiopia. The Ethiopian Journal of Education, 2013. 33(1).
- 25. Addis Ababa University, Addis Ababa University Senate Legislation, Addis Ababa University, Editor. 2019: Addis Ababa
- 26. Addis Ababa University. Converies 2016 [cited 2020; Available from: http://10.90.10.201/converis.
- 27. Molla T and Gale T, Inequality in Ethiopian higher education: reframing the problem as capability deprivation. Discourse: Studies in the Cultural Politics of Education, 2015. 36(3): p. 383-397.
- 28. Tigist T, Assessment of Female Instructors Participation and their Challenges in Research and Community Service Activities: The Case of Addis Ababa University. 2011.