

Moving Accounting Forward

Unchanging Element in a Changing World? Women in Accounting Academy

CAMILLA SOUENETA NASCIMENTO NGANGA

School of Economics, Business, and Accounting University of São Paulo

WILLIAM MARTINS DE GOUVEIA

School of Economics, Business, and Accounting University of São Paulo

SILVIA PEREIRA DE CASTRO CASA NOVA

School of Economics, Business, and Accounting University of São Paulo

Abstract

According to the studies about women and work relations, two different meanings of feminization have been contributing to the better comprehension of their presence and permanence. The first one is feminilization which refers to quantitative analysis related to the women presence in some occupations and professions. The second is the feminization, meaning all the social transformations inside one profession or occupation occurred due to the feminilization process (Yannoulas, 2011). Based on those concepts, this research aimed to analyze if the processes of feminization and vertical segmentation are occurring on accounting academy and its possible impacts, considering (and contrasting) Brazil and the United States. We question if the process of feminization is in place and if it has impacted the unchanging element, the participation of women in a male-dominated profession, in a changing world. If not, we want to raise awareness about the necessity to put in place policies and actions addressing the entering, the permanence, and the ascension of women in the accounting profession. Our research considered the collection of quantitative data from 2004 to 2016, in both countries. Our analysis shows that in the US, there has been a timid feminization of the PhD, starting in 2016. We can't affirm if it will be a tendency or it was just an atypical year, once in the last five years, from 2012 to 2016, only 43% of PhD degrees were granted to women. In the Brazilian context, it is possible to identify a vertical segmentation of the accounting academy, bearing in mind the inversion between men and women proportional participation, from bachelor's degrees to graduate programs' faculty. Thus, there a necessity of implementing actions and policies which could guarantee the attraction and retention of female talents in the Brazilian accounting academy.

Keywords: Feminization, Accounting Academy, Accounting Education, Women, Gender.

XVIII USP International Conference in Accounting

Moving Accounting Forward

1. Introduction

Globalization, new technologies and generational differences are example of social changes in the Western World, where there is an expected stability in the women's social role, even in a context of frequent changes. Is the social role of women in the West an unchanging element in a changing world? Considering the demands of women themselves and the needs of a dynamic society, permanently pressed by educational advancement of women, social roles of women should've not remained static. Women's education has presented significant implications for the whole society but educated women have still not achieved equal status of men either within or outside of the educational context (Solomon, 1985). Barbara Solomon wrote this statement in 1985 and it remains up to date, especially regarding the Academy.

According to The United Nations Educational, Scientific and Cultural Organization - UNESCO (2015), since the 1990s, more women than men complete tertiary education in most countries. Taking into account Brazil and United States of America (US), the similarities and differences that exist in these two countries over the last 15 years allow us to reflect about some issues, to analyze the higher education system and its transformations, highlighting the process of feminization of Higher Education.

There were more women than men graduating from higher education in 77% of the 124 countries with available data, including important American economies, like the US and Brazil (UNESCO, 2015). Despite improved access to higher education, women are less likely to conclude and continue into post-higher education levels, entering the doctoral education and pursuing an academic career in many research fields. For example, in the Science, Technology, Engineering and Mathematics area, the so-called STEM (Smith, 2017) and in other historical masculinized areas as Accounting, the scenario is even more challenging.

The trajectories and challenges faced by women in Accounting have been well documented, including discussions about the entry of women in the profession (Lehman, 1992; Roberts and Coutts, 1992), the glass ceiling process and the lack of role models in leadership positions (Gammie, Gammie, Matson & Ducan, 2007; Broadbent & Kirkham, 2008; Souza, Voese & Abas, 2015; Silva, 2016) and the interactions with motherhood and the work-life conflicts (Haynes & Fearfull, 2008; Casa Nova, 2014; Haynes, 2017). Despite of that, it is possible to identify a significant rise of women in Accounting profession.

In the US, according to the Bureau of Labor Statistics (2017), 60.3% of accountants and auditors are women. In Brazil, data from the Federal Accounting Council shows that women are 46% of the registered accountants and, compared to 2004, the number of women registered as accountants has raised around 161% (Federal Accounting Council, 2018). Even with the increase in the female membership, gender inequalities remain problematic in accounting profession (Haynes & Fearfull, 2008; Haynes, 2017).

According to the studies about women and work relations, two different meanings of feminization have been contributing to the better comprehension of this scenario. The feminilization is a process that refers to quantitative analysis of the women presence in some occupations and professions. On the other hand, the feminization is the social transformations inside one profession or occupation which occurred due to the feminilization process (Yannoulas, 2011).

In a revision considering 25 years of research about Gender and Accounting, Kathrin Haynes pointed studies reflecting about the feminization and segmentation in Accounting area (Roberts & Coutts, 1992; Bolton & Muzio, 2008; Komori, 2008; Almer, Lightbody & Single, 2012; Lupu, 2012; Khalifa, 2013; Nemoto, 2013; Joyce & Walker, 2015), but none of these examined specifically the Accounting Academy.



Moving Accounting Forward

Bringing these insights and reflections to Accounting Education, the goal of this study is to analyze if the processes of feminization and vertical segmentation is occurring on accounting academy and its possible impacts, considering (and contrasting) Brazil and the United States. Thus, if Accounting is a predominantly-male profession in Brazil and in the US, could the women's entry in the Accounting Academy modify the masculinized structure of the profession, and this feminization process can then address the challenges documented in previous studies?

In 1992, Jennifer Roberts and J. Andrew Coutts developed a research about the process of feminization and professionalization of Accounting in the United Kingdom, considering that "[a]n analysis of the feminization of the professions has much to contribute to the debate on women and work since there are many unique factors relating to this process" (Roberts & Coutts, 1992, p. 379). Based on this argument, we want to contribute with the discussion about the way how women are present on the Accounting Academy, trying to understand if the process of feminization is in place and has impacted the unchanging element in a changing world. If not, we want to raise awareness about the necessity of policies and actions addressing the entering and permanence of women in the accounting profession.

The remainder of this study is organized as follows: Sections 2 brings the theoretical discussion about Gender, Accounting and Academy. Section 3 presents our methodological trajectory. The analysis and discussion of the results are provided on Section 4. Lastly, section 5 concludes and reflects on opportunities and possibilities for future research.

2. Theoretical Discussion

First of all, the theory which outlines our study is the Feminist Theory as proposed by Joan Scott in 1986. The Feminist Theory affirms that gender is a constituent element of the social relations, based on the perceived sexual differences, and it considers gender as the primary form of giving meaning to the power relations. When we think about the difference in the concepts of Gender and Sex, as proposed by the Feminist Theory, we can estate that while sex can be understood as a stable biological condition, gender refers to the way how culture interprets and socially organize men and women, being characterized by instability, given the changes in the relations between men and women over the time (Yannoulas, 2011).

The gender conceptualization continues into considering gender as binary (male and female). In the mainstream Accounting research, even with the evidently distinctions within and between categories of men and women, as well as the understanding of gender concept as the effect of social definitions and internalizations of the meaning of being a man or a woman, a central part of our identity construction (Haynes, 2013; 2017), the binarism, with male and female constraining roles, is the rule and is considered a variable. The discursive construction of sexually differentiated identities is related to the establishment of new norms of conduct and specific spaces for each sex. Especially since the nineteenth century in Western societies there has been an effort to establish differentiated sexual identities for men and women in general (Yannoulas, 2011). "Based on this female identity, it has been legitimized the discrimination against women, into diverse dimensions - labor market, politics, culture, among others - even if, simultaneously, human being equality has been affirmed" (Yannoulas, 2011, p. 275).

An important discussion on this topic is the way the notion of work has been shaped and constructed by gender relations. On the societies organized by capitalism and patriarch, the traditional sexual division of labor makes men the primarily responsible for the wage work (public dimension) and the tasks related to the domestic production is assigned for the women (private dimension) (Hartmann, 1981; Connell, 2005; Crompton & Lyonette, 2006; Cantera, Cubells, Martínez & Blanch, 2009). The observable transformations on the female



Moving Accounting Forward

professional activity were not followed by changes on the way of distribution of the domestic work between men and women. In other words, the transformations on the sexual division of labor were not happen on the private dimension, so the management and execution of domestic and familiar work continue to be of women's responsibility (Hirata, 2004).

We could see two different meanings for the sexual division of labor. The first aspect is the differences on the distributions of women and men in the labor market, professions and occupations, as well as the spatial and temporal variations of this distribution. The second is the unequal division of the domestic work between men and women. In addition, is possible to perceive the separation principle (there are men work and women work) and the hierarchical principle (men's work is worthwhile than the women's work) (Hirata & Kergoat, 2007).

Connell (2005) points out the public world of work is a sphere ruled by market relations, profit calculation and accumulation, and the world of home and family is considered a sphere characterized by relations of gifts, affection, personal service and care. So, there was not only a separation, there was also an emerging relationship between these spheres - the domestic subordinate to the public sphere. Modern capitalist society is thus marked by a structural subordination of women and not by the direct personal power of men over women, individually (Connell, 2005).

Silvia Yannoulas brings important explanations and contributions about the process of feminization of the professions. There is an intense relationship between the massive access of women in a particular profession (feminilization) and the progressive qualitative transformation of the profession (feminization). In general, with the significant entry of women into a particular profession or occupation, one can perceive the decline in pay and social prestige. Thus, in analyzing the process of feminization of a profession, it is important to look for the reasons and the way in which this change took place, and its impacts (feminization) (Yannoulas, 2011; 2013).

Feminilization and feminization are perceived as interrelated categories. When analyzing the presence of men and women in a profession, quantitative and qualitative aspects should be considered, and feminization includes and expands the concept of feminilization, since it calls for a more complex and sophisticated understanding about the entry and permanence of women in a given profession. That is, "The feminization, as properly stated, refers to transformations into a specific type of occupation, tied to the symbolic image of the feminine predominant in an era or to a specific analyzed culture. This image could imply a change in the meaning of the profession." (Yannoulas, 2011, p. 283).

The feminization of professions may have important implications for the position of women in the labor market as a whole: (i) it may improve women's position by providing role models to other women; (ii) could help to eliminate some sex-role stereotypes which have contributed to the marginalization of women in the labor market; (iii) also, the increasing numbers of women entering professions may be perceived as a threat to the status of professions as a whole (Roberts and Coutts, 1992, p. 380).

Reflecting about the Accounting as a profession inside this environment of sexual division of labor, feminization and capitalism, is important to highlight two different aspects of Accounting. The role and conduct of the accounting profession in reflecting the norms of the societies in which it operates (Accounting as a gendered institutions), and the profession's role in shaping and influencing those societal norms, and the positions and practices of the accounting professionals (Accounting as a gendering institution) (Haynes, 2017).

Lehman (1992) developed an important study on the subject, proposing to explore two themes in relation to American women in the accounting profession between 1910 and 1990. First, mechanisms that restrict entry and obstacles that impede the advancement of women in



Moving Accounting Forward

accounting; and, second, how different theories emerged to try to understand women in social hierarchies, contextualizing the historical construction of accountants within these theories.

The author exalts three levels of discrimination against women, and how the accounting profession contributes to this context: by denying the right of entry of women in the area, Accounting contributes to female economic deprivation; differences in practices and treatment, indicating socioeconomic hierarchies (differences in career progression, salary discrepancies, among others); and, finally, on an ideological level, institutionalized norms and practices that support the naturalization of gender roles (Lehman, 1992).

Analyzing the work environment in Accounting and gender issues, Gammie and Whiting (2013) developed a study to examine whether the gendered work practices of accounting firms influence women to search for employment alternatives outside the professional accounting environment. In an attempt to understand whether women could find a more welcoming environment outside the accounting area, the authors applied a questionnaire to 370 women who were part of the Institute of Chartered Accountants of Scotland, where 27% were employed by accounting firms and 73% had jobs outside of the area. In addition, in order to deepen the proposed discussion, interviews were also conducted with partners from several firms and women who left the accounting area (Gammie & Whiting, 2013).

The findings of the study in question pointed out that the professional accounting environment continues to present gendered work practices, such as extensive hours of work, constant need for be available for the clients and inability to value flexible working practices (Gammie & Whiting, 2013). Also, the authors identified the main reason for the exit of women from the area was the search for more interesting work, as well as the search for a better work environment and greater flexibility (Gammie & Whiting, 2013).

In Brazil, the study of Lemos Júnior, Santini and Vieira (2015) aimed to identify and understand how the quantitative and qualitative feminization process of the accounting area is influenced by gender stereotypes, based on the perception of women who work at an office with a predominance of female employees. They did a qualitative research, interviewing 28 women inside the Accounting profession.

Through the analysis of women's interviews, the authors find out: (i) the interviewees incorporate the gender stereotypes and generalize them as predicates of their occupation (women as careful, delicate, weak, sensitive, etc.); (ii) they perceive the women as better prepared to attend to the public in the accounting area based on gender stereotypes too; (iii) it was possible to verify the association of the Accounting profession with characteristics considered as female; and (iv) the authors identified the gendered division of activities among trade for women (operational and administrative activities) and profession for men (analytical, intellectual, decision-making activities) (Lemos et al. 2015).

What could we think about these aspects on Accounting Academy? According to Haynes and Fearfull, the figures for Business and Management studies within academia reflect the wider social position of women within the broad discipline of management and the Accounting area (Haynes & Fearfull, 2008).

Many academics in the discipline of business and management have been drawn from, or have experienced, the actual practice of business. Although some staff may have left the practice of accounting and management to enter what is hoped to be a more liberal, egalitarian working environment, the male-dominated social and cultural norms within business and accounting may be reflected within academia (Haynes & Fearfull, 2008, p. 8).

In the Brazilian context, Casa Nova (2012) asserts that the female presence in Accounting Academy is small and discussions about the women at these spaces have been underexplored. For her, this scenario could be place for phenomena such as the lack of role model and the glass ceiling, and the changes for this reality can come from awareness and



Moving Accounting Forward

support policies. Aligned with this, Haynes and Fearfull (2008, p. 9) reflects that women academics within accounting, business and management are working in a sector with few representations and in a field with masculine social norms which may be imported into or reflected by their school and discipline.

For women academics, some of these facets of academic business and success may be more difficult to achieve, for while men may now play a larger role in the home, their adaptation towards this role tends to remain 'lagged'. That is, they have not, on the whole, absorbed a proportion of home work equal to that now undertaken by women academics in their workplaces. Thus, women continue to bear a disproportionate burden of caring and domestic responsibilities outside the work environment (Haynes & Fearfull, 2008, p. 9).

More recently, according to Bernd, Anzilago & Beuren (2017), the presence of the female gender among the graduate students in Accountancy in Brazil has increased, but a long road remains ahead to achieve gender equality at the national level. This is especially relevant if one considers that this may lead to later work opportunities, the female teaching career and less gender inequality in universities (Bernd et al. 2017, p. 413).

The study of Bernd et al. (2017) intended to verify the presence of the female gender among students in graduate Accounting programs in Brazil, considering the period from 2010 until 2016. Analyzing data provided by CAPES, the authors could verify that, although women increasingly choose graduate education and the teaching career, the number of women starting the graduate studies in Accounting is lower than the male students, and the programs have a majority of men as faculty members (around 74%).

3. Methodological Trajectory

Our research considered the data collection of the data from 2004 to 2016, because of the availability of data for both countries, US and Brazil. Data came from different sources, depending on the country and on its characteristic. So, in Brazil, data about bachelor's degree and faculty members on undergraduate programs were retrieved from the Educational Statistics Board (DEED) and the National Institute for Educational Studies and Research "Anísio Teixeira" (INEP), available in the e-SIC (Electronic Information System Service to the Citizen); data about Master and PhD degrees and also information about Faculty Members on Graduate Programs, from 2004-2012, from Coordination for the Improvement of Higher Education Personnel (CAPES), available also through the Electronic System of Information Service for the Citizen (e-SIC), from 2013-2016, from CAPES (Master and PhD Degrees) but available through Sucupira Platform; finally data about the number of Graduate Programs was retrieved on Sucupira Platform, considering assessed and accredited Graduate Programs.

In the case of the US, data about degrees attainment came from the Digest of Education Statistics Data - National Center for Education Statistics (NCES); data about the number of graduate programs, from the Hasselback Directory - A Directory of Accounting Faculty. Unfortunately, we didn't have open and easy access to information about Faculty Members in Accounting.

One of our challenges in this research is the data mining of two very distinct databases about higher education systems: US and Brazilian databases. The Brazilian law on access to information brought what is translated as transparency in Portuguese, meaning free availability to public data and information. It was favorable to our research data collection.



Moving Accounting Forward

However, CAPES did not make available data about the master and PhD titles granted in the period of 2000-2004. This is the reason to set our data range from 2004 to 2016.

In the US context, although the database about the higher education scenario maintained by the National Center for Education Statistics, it was not possible to obtain access to information regarding accounting faculty in undergraduate and graduate programs. We contacted the Program Director of the Annual Reports and Information do National Center, but he informed us that the Center did not collect data about accounting faculty segregated, advising us to search for this information in the accounting associations. The data was made available in two reports: "Trends in Non-Tenure-Eligible Accounting Faculty, 1993–2004" and "Accounting Faculty in U.S. Colleges and Universities: Status and Trends, 1993–2004" both published by the American Accounting Association (AAA) but related to a period previous to our data range period. The report "Trends in the Supply of Accounting Graduates and the Demand for Public Accounting Recruits", published by the American Institute of Certified Public Accountants (AICPA), led to information already available to us, and only about the accounting enrolled students in the US.

We collected and organized the data in order to study absolute numbers, percentages and to set trends. Our target is to determine if it is a similar tendency between US and Brazil in relation to accounting academy trends. But also, we wanted to form the big picture around the concepts of feminilization and feminization of accounting academy. It is important to justify our decision in selection US and Brazil. It is a Brazilian research but the comparison with US is justified because it is a reference when considering accounting academy. US accounting academy started first and has tradition in research.

For instance, American Accounting Association (AAA) celebrated in 2015 its centennial and put in place a discussion about accounting being a "learned profession". So, for Brazilian accounting academy, US academy is a reference and a benchmark. Our Brazilian AAA comparable association is the Brazilian Accounting Graduate Programs Association (standing for Associação Brasileira de Programas de Pós-Graduação em Contabilidade - ANPCONT), founded in 2005. It is a not-for-profit association which has the goal of supporting the area of education, congregating and representing Brazilian Higher Education Institutions that offers accounting master and Ph.D. programs. Comparing to the US, with the AAA founded in 1915, we conclude that took 90 years to Brazil accounting academy to implement a research and graduate programs association.

The same occurs when considering the accounting graduate programs offerings. In the US, the first PhD in Accounting was conferred in 1922 (Hasselback, 2016). In Brazil, the first PhD accounting program was implemented in 1978 and it has been the only program in the country until 2007. Therefore, the number of accounting PhD holders in both countries is quite different: While in Brazil, until 2008, we had 185 accounting PhD holders (Miranda. 2011), in the US, before 1960, there had been 286 PhD holders and in 2008 the PhDs in accounting summed up to 7,109 (Bouillon & Ravenscrof, 2010).

So, our aim is, based on quantitative historical official data, to analyze the processes of feminization and vertical segmentation in the accounting academy in Brazil and in the US and its possible impacts, considering (and contrasting) both national academies. Furthermore, and more importantly, as accounting has been a predominantly-male profession in Brazil and in the US, we aim to discuss if the women's entry at the Accounting Academy modified the masculinized structure of the profession and if this feminization process could somehow address the challenges documented in the previous studies about the women's presence and experience in Accounting. We tried to have a critical stance at a historical recollection of quantitative data. Because of that, in the end of the day and in our appraisal, we are conducting a critical quantitative research.

XVIII USP International Conference in Accounting

Moving Accounting Forward

4. Results

The number of graduate programs in Brazil and in the US offer a very different picture. We show in Table 1 the number of programs in Accounting from 2004 to 2016.

Table 1 – Number of Graduate Programs (PhD) in Accounting*

			2007								2015	2016
Brazil	0	1	2	3	4	4	4	4	7	10	12	14
United States	1	72	89	90	91	91	94	94	94	94	92	95

In the case of the US, the number is kept around 90 programs, varying from 89 (2007), to 95 in 2016. From that, we can say the offering is stable since the analysis made by Miranda (2011). Also, when the first Brazilian PhD Program in Accounting was created (1978), 72 programs already existed in the US. For Brazil, as a part of a policy that has been implemented, the scenario confirms a huge expansion from 2007. The 2000s beginning with 1 program and reaching 14 in 2016, but the number is still distant from the 95 programs in the US.

To have a better basis of comparison, we should acknowledge a relevant difference in the functioning of PhD programs in Brazil: usually, per year, a program enrolls from 10 to 20 applicants (CAPES, 2018). In the US, it is normal to enroll no more than six in each cohort.

Other dissimilarities to be taken into account: in Brazil, usually the bachelor's degree implies a four-year undergraduate program in Accounting. Mostly, the HEI are offering evening classes to non-traditional students, many of them already women, workers and entering the college older (25 years old) (INEP, 2015). After completing the bachelor's degree, it is necessary to apply to the professional certification exam, called "Exame de Suficiência", and held for the Brazilian Accounting Professional Body, in Portuguese Conselho Federal de Contabilidade (CFC).

Regarding the professional preparation, the analysis of the results of this professional certification exam indicate that, of 477,700 people who took the exam between 2011 and 2017, the approval rate is only 35.87% (Federal Council of Accounting, 2017). A similar situation is also detected in the National Student Performance Examination (ENADE). In 2012, the average performance of the 47,373 people who took this test was 34.5 points, on a scale of 0 to 100 (INEP, 2012). These two facts can exemplify the challenges still remaining for Accounting Education in Brazil.

In Accounting area, the master, in Brazil, is an academic research-based program, considered as a previous step to pursuing the PhD. Master programs are usually two-year programs, with the first year dedicated to the coursework and the second year, to the research. The PhD is a four-year research focus program, usually with two years of coursework, with almost all disciplines mandatory and with technical or professional emphasis. Brazil and US share the same characteristic: Few disciplines, many electives, are research or teaching based, although the PhD is considered as a degree that should be devoted to researchers and teachers instruction and qualification (Laffin & Gomes, 2016; Nganga, Botinha, Miranda & Leal, 2016; Farias & Araujo, 2016; Dunn, Hooks & Kohlbeck, 2016). Taking into account this difference in the functioning of the PhD programs, Table 2 exhibits the number of titles granted, bachelor, master and PhD, and the percentage of women, from 2004 to 2016, for Brazil and US.



Moving Accounting Forward

Table 2 - Degrees conferred in Accounting Education by Gender and Level

	I	Bachelor	•		Master					PhD				
	Brazil		US		Brazil		US		Brazil		US			
	n	%	n	%	n	%	n	%	n	%	n	%		
2004	12,367	51%	22,006	61%	30	23%	4,737	56%	2	29%	16	35%		
2005	14,838	52%	23,130	60%	48	27%	5,420	55%	1	6%	26	48%		
2006	15,285	52%	24,410	59%	60	40%	5,873	55%	0	0%	18	43%		
2007	14,856	53%	25,084	57%	32	26%	6,259	54%	2	29%	17	45%		
2008	17,604	54%	25,464	56%	53	32%	6,653	54%	2	15%	20	49%		
2009	19,177	55%	26,498	55%	51	35%	7,341	54%	6	33%	14	33%		
2010	20,949	56%	28,365	54%	60	33%	8,476	55%	9	50%	12	40%		
2011	22,434	58%	28,602	54%	57	31%	9,755	54%	3	17%	13	33%		
2012	24,815	59%	28,972	53%	64	38%	10,104	54%	10	30%	22	56%		
2013	25,163	60%	28,299	53%	92	38%	10,516	53%	6	29%	22	46%		
2014	27,460	60%	27,313	52%	110	45%	10,929	54%	6	24%	17	36%		
2015	33,451	61%	27,650	52%	120	48%	11,541	55%	15	38%	24	44%		
2016	34,023	62%	27,365	51%	143	49%	11,553	54%	17	33%	27	52%		

The highlights brought by the Table 2 analysis show that, in Brazil, in 2016, 62% of people pursuing the bachelor's degree in accounting were women. In 2006 no women had been granted the PhD degree in Accounting but, in 2010, 50% of the degrees granted were conferred to women (9 out of 18). There is a strong growing tendency of women in master's degrees: from 23% in 2004 to 49% in 2016. This growth might reflect in PhD granting for women in the future. Notwithstanding, the participation of women in PhD titles per year had reached an average of 30% since 2011.

From Casa Nova (2014) we learn that the first women with an accounting PhD in Brazil, was Cecilia Akemi Kobata Chinen, in 1987. The first female full professor was Ilse Maria Beuren in 1998. The first woman to be an advisor in a PhD Program was Maisa de Souza Ribeiro, in 1999. Professor Ribeiro was also the first full professor in Accounting at the University of São Paulo, in 2010.

Looking at the US related data, also in Table 2, only in 2012 and in 2016 the number of women being granted PhD degrees surpassed the number of men. Women were the majority of bachelor's degrees recipients in the whole period but with a decreasing participation (from 61% in 2004 to 51% in 2016). Figure 1 offer a graph with the women participation in the bachelor's degree, in Brazil and in the US, in three different time ranges, 2004-2007, 2008-2011 and 2012-2016.



Moving Accounting Forward

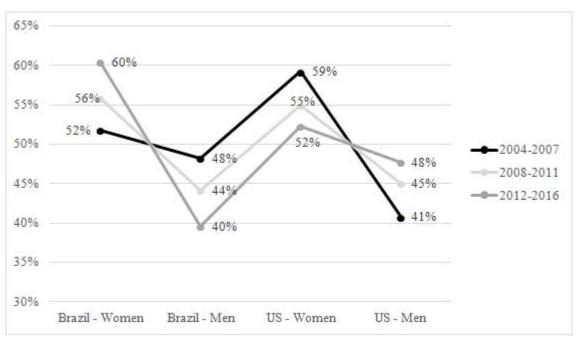


Figure 1 Degrees conferred - Bachelor's in accounting by Gender Source: National Center for Education Statistics (2018); INEP (2018).

Analyzing the graphic, we conclude that all the time ranges are marked by the feminization on bachelor's degree both for Brazil and for US. So, in quantitative terms, accounting became a predominantly female area. In 2016, 62% of bachelor's titles were granted to Brazilian women (see Table 2). The expansion of higher education system in Brazil could be an influencing factor? According to INEP (2001; 2017), in 2000 there was 235 undergraduate courses in Accounting and, in 2016, these number increased to 1247 courses. In the US, in the same year (2016), 51% bachelor's degree were conferred to women (see Table 2), although, as mentioned before, there is a decrease since 2004. Thus, we conclude that there was a feminization of the accounting bachelor's degree in both countries, but with steady decrease of the number of degrees given to women in the US.

Regarding the master's degree, Figure 2 delineates a bar chart, for the same periods, 2004-2007, 2008-2011 and 2012-2016 with the participation of women and men, considering degrees granted in accounting.

São Paulo, 25 a 27 de julho de 2018.

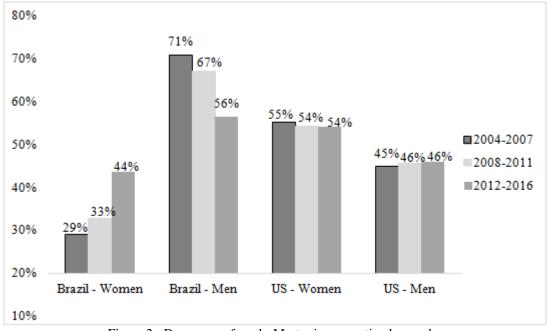


Figure 2 - Degrees conferred - Master in accounting by gender Source: National Center for Education Statistics (2018); CAPES (2018)

We can foresee a very diverse scenario, with a dominance of men in Brazil, and an almost equal participation of women and men in the US, with the first slightly outnumbering the second. In spite of the men dominance in Brazil, there was a significant increase of women participation, rising from 29% and reaching to 44%, leading to supposition of a tendency towards feminization of this educational level in the near future. Concerning PhD titles, Figure 3 depicts a graph, also with the timeframes of 2004-2007, 2008-2011 and 2012-2016, with the participation of women and men, considering degrees granted in accounting.

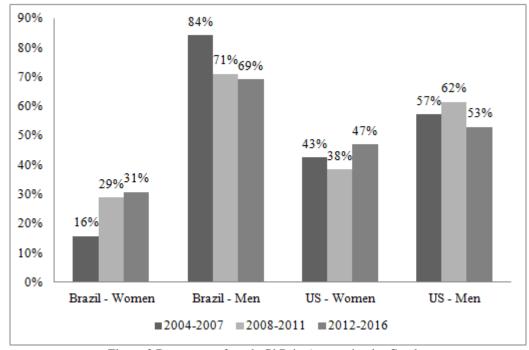


Figure 3 Degrees conferred - PhD in Accounting by Gender Source: National Center for Education Statistics (2018); CAPES (2018)



Moving Accounting Forward

The two first bars are representing the Brazilian data, showing, again a male dominance, with a decreasing path, while the last bars are tracing US data, prompting to a much more equally distributed relative participation. But, we can see that, for both countries, on PhD level, there is a male predominance. For the Brazilian reality, the study of Bernd et al. (2017) shows that, of the 451 people enrolled in PhD programs in Accounting, between 2010 and 2016, about 42% were female and 58% male. Have we reached the glass ceiling, without assuring a critical mass that could bring qualitative changes? Or is this a signal of vertical segmentation? Figure 4 intends to offer an overview of the US Accounting Academy in 2016.

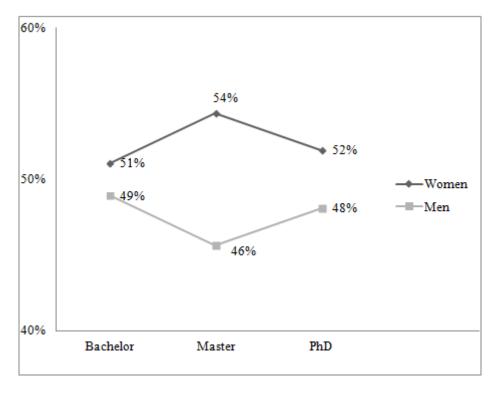


Figure 4 Overview - US Accounting Academy in 2016 Source: National Center for Education Statistics (2018); INEP (2018); CAPES (2018)

It is a balance sheet, a portrait, for tertiary education levels in accounting in the US. Looking at it, in all three levels, women are predominant to men but with very close margins. And in Brazil? Figure 5 provides the same data for Brazil Accounting Academy, adding the women participation in the accounting undergraduate and graduate programs faculty.



Moving Accounting Forward

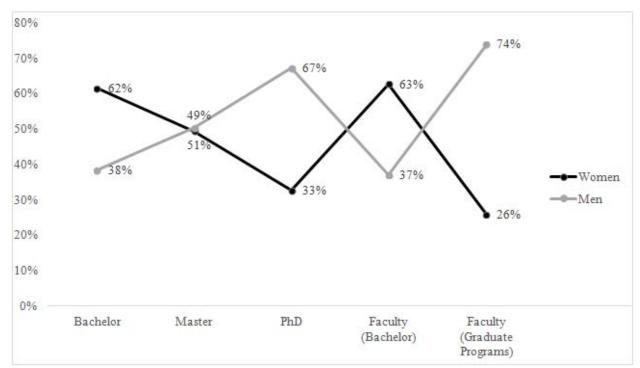


Figure 5 Overview - Brazilian Accounting Academy in 2016 Source: National Center for Education Statistics (2018); INEP (2018); CAPES (2018)

With ups and downs, we see that, although women are the majority in the bachelor's degree, almost equal to men in master's degree, they are majority among the faculty only in bachelor's degree, they were close to 30% in the PhD degree and in the graduate faculty. This scenario have similarities with the information available on "eAtlas of Gender Inequality in Education" report published by UNESCO (2015). According to this report,

Despite improved access, women are less likely to continue into higher education levels and research fields. Globally, women outnumber men at the level of the Bachelor's degree, with men accounting for about 47% of graduates and women accounting for 53% in countries with available data. Women also represent a higher share (54%) of Master's degree graduates. Yet beyond this level, the opposite is true – men account for 55% of graduates from PhD programmes and 71% of all researchers (2015, p.1).

So, some important questions need to be addressed: Are women with master's degree applying for more positions as undergraduate programs' faculty? Why is PhD program's faculty predominantly male? Is it still the impact of having men as the majority of PhD students, so they are the ones who are hired to work in Graduate Programs? Is a problem of pipeline or a question of glass ceiling? Why so few women are enrolled in the PhD programs and are faculty members at the Graduate Programs? Our possible answers are provided by the theoretical background we discussed previously in this article. With few women as faculty in the PhD programs, PhD potential candidates are lacking role models. Could I, a woman who just obtained her accounting bachelor, see myself as a master or a PhD candidate? Furthermore, can I see myself, in the future as an accounting scholar, a faculty or even as a full professor? Being a PhD candidate already, can I see myself as a professor even without women faculty at the Graduate Programs? How my challenges in terms of the sexual division of labor on domestic work and in terms of the consequent work life conflicts, as mother, a

XVIII USP International Conference in Accounting

Moving Accounting Forward

wife, a daughter, a domestic worker (without any compensatory payment or recognition), will be acknowledged by a male advisor, or a male Program Director? So, dreaming about being a PhD student? Better no!

5. Concluding Remarks

The proposed discussion and the critical analysis of quantitative historical data show that, considering the Solomon's (1985) statement, the presence of women in accounting academy could be indicating the presence of a changing element in a changing world, despite the remaining challenges. The goal of this study was to analyze if the processes of feminization and vertical segmentation have been occurring in the accounting academy and, if so, what are their possible impacts, considering (and contrasting) Brazil and the United States.

Our analysis indicated that we have signs of feminilization in the accounting academy, however in Brazil only considering bachelor and master levels. So, we are facing, in Brazil, a change in the students' profile, bringing more diversity to the classrooms. Nevertheless, we need more: we need a feminization, a qualitative change, due to social transformation, if the accounting academy wants to welcome those women and guarantee their permanence and ascension. In the US, there has been a timid feminization of the PhD, starting in 2016. We can't affirm if it will be a tendency or just an atypical year, once in the last five years, from 2012 to 2016, only 43% of PhD degrees were granted to women.

In the Brazilian context, it is possible to identify a vertical segmentation of the accounting academy, bearing in mind the inversion between men and women proportional participation, from bachelor's degrees to graduate programs' faculty. There is a call for actions and policies which could guarantee the attraction and retention of female talents to accounting academy.

As limitations of our study, the availability of official data only presenting information about women and men, so tied to sexual binarism (female and male) and focusing on biological aspects. We agreed with Haynes' (2017) definition of gender: "Gender is the organisation and social construction of sexual difference, and studies which explore this difference tend to address the relational position of men and women, or relations between different types of women and men themselves" (p. 112). Furthermore, the data analysis was made possible only to account for of quantitative (or numerical) aspects of feminization and feminilization. So, for future research, it will be important bring the richness of the qualitative analysis, that could lead to a better comprehension of the impacts, in terms of experiences, of the process of feminization and feminilization of the Accounting Academy, in Brazil and in the US.

References

- Almer, E. D., Lightbody, M. G., & Single, L. E. (2012). Successful promotion or segregation from partnership? An examination of the "post-senior manager" position in public accounting and the implications for women's careers. *Accounting Forum*, *36*(2), 122-133). https://doi.org/10.1016/j.accfor.2011.06.002
- Bernd, D. C., Anzilago, M., & Beuren, I. M. (2017). Presence of Female Gender among Students in Graduate Accountancy Programs in Brazil. *Journal of Education and Research in Accounting*, 11(4), 396-417. http://dx.doi.org/10.17524/repec.v11i4.1487
- Bouillon, M., & Ravenscroft, S. (2010). Undergraduate preparation and dissertation methodologies of accounting Phds over the past 40 years. *Global Perspectives on Accounting Education*, 7, 19-29. Retrieved from

International Conference in Accounting

São Paulo, 25 a 27 de julho de 2018.

XVIII USP International Conference in Accounting

Moving Accounting Forward

- https://www.questia.com/library/journal/1P3-2314642331/undergraduate-preparation-and-dissertation-methodologies
- Bolton, S., & Muzio, D. (2008). The paradoxical processes of feminization in the professions: the case of established, aspiring and semi-professions. *Work, employment and society*, 22(2), 281-299. https://doi.org/10.1177/0950017008089105
- Broadbent, J., & Kirkham, L. (2008). Glass ceilings, glass cliffs or new worlds? Revisiting gender and accounting. *Accounting, Auditing & Accountability Journal*, 21(4), 465-473. https://doi.org/10.1108/09513570810872888
- Cantera, L. M., Cubells, M. E., Martínez, L. M., & Blanch, J. M. (2009). Work, family, and gender: Elements for a theory of work-family balance. *The Spanish Journal of Psychology*, *12*(2), 641-647. https://doi.org/10.1017/S1138741600002006
- Casa Nova, S. P. de C. (2012). Impactos de mestrados especiais em Contabilidade na trajetória de seus egressos: um olhar especial para gênero. *Revista Contabilidade e Controladoria*, 4(3), 37-62. http://dx.doi.org/10.5380/rcc.v4i3.29952
- Casa Nova, S. P. de C. (2014). *Contabilidade das mulheres na universidade brasileira: lucros e perdas, ingresso e permanência.* Tese de Livre-Docência, Faculdade de Economia, Administração e Contabilidade, Universidade de São Paulo, SP, Brasil.
- Connell, R. W. (2005). A Really Good Husband Work/Life Balance, Gender Equity and Social Change. *Australian Journal of Social Issues*, 40(3), p. 369-383. http://dx.doi.org/10.1002/j.1839-4655.2005.tb00978.x
- Coordination for the Improvement of Higher Education Personnel (CAPES). (2018). *Sucupira Platform*. Retrieved from https://sucupira.capes.gov.br/sucupira/
- Crompton, R., & Lyonette, C. (2006). Work-life 'balance' in Europe. *Acta sociologica*, 49(4), 379-393. https://doi.org/10.1177/0001699306071680
- Dunn, K. A., Hooks, K. L., & Kohlbeck, M. J. (2014). Preparing future accounting faculty members to teach. *Issues in Accounting Education*, *31*(2), 155-170. https://doi.org/10.2308/iace-50989
- Electronic Information System Service to the Citizen (e-SIC). (2018). *Access to Information*. Retrieved from https://esic.cgu.gov.br
- Farias, R., S., & Araujo, A., M., P. (2016). Percepção dos professores de contabilidade quanto aos espaços formativos para o ofício da docência no Brasil. *Revista de Contabilidade e Organizações*, 10(28), 58-70.http://dx.doi.org/10.11606/rco.v10i28.124789.
- Federal Accounting Council. (2017). *Exame de Suficiência Relatórios Estatísticos*. Retrieved from http://cfc.org.br/wp-content/uploads/2017/11/Resultadofinalporexame.pdf
- Federal Accounting Council. (2018). *Quantos Somos?*. Retrieved from http://cfc.org.br/registro/quantos-somos-2/.
- Gammie, E., & Whiting, R. (2013). Women accountants: Is the grass greener outside the profession?. *The British Accounting Review*, 45(2), 83-98. https://doi.org/10.1016/j.bar.2013.03.005
- Gammie, E., Gammie, B., Matson, M., & Duncan, F. (2007). Women of ICAS Reaching the Top: The Demise of the Glass Ceiling. The Institute of Chartered Accountants of Scotland. Retrieved from https://www.icas.com/technical-resources/women-of-icas-reaching-the-top-the-demise-of-the-glass-ceiling
- Hartmann, H. I. (1981). The family as the locus of gender, class, and political struggle: The example of housework. *Signs: Journal of Women in Culture and Society*. *6*(3), 366-394. https://doi.org/10.1086/493813
- Hasselback, J. R. (2016). *Chart of Accounting Doctorates*. Retrieved from: http://www.jrhasselback.com/AtgDoct/XDocChrt.pdf.

XVIII USP International Conference in Accounting

Moving Accounting Forward

- Haynes, K. (2013). Sexuality and sexual symbolism as processes of gendered identity formation: An autoethnography of an accounting firm. *Accounting, Auditing & Accountability Journal*, 26(3), 374-398. https://doi.org/10.1108/09513571311311865
- Haynes, K. (2017). Accounting as gendering and gendered: A review of 25 years of critical accounting research on gender. *Critical Perspectives on Accounting*, 43, 110-124. https://doi.org/10.1016/j.cpa.2016.06.004
- Haynes, K., & Fearfull, A. (2008). Exploring ourselves: exploiting and resisting gendered identities of women academics in accounting and management. *Pacific Accounting Review*, 20(2), 185-204. https://doi.org/10.1108/01140580810892508
- Hirata, H. (2004). Trabalho doméstico: uma servidão "voluntária"?. In: Godinho, T., & Silveira, M. L. (Eds.). (2004). *Políticas públicas e igualdade de gênero*. Prefeitura do Munícipio de São Paulo, Coordenadoria Especial da Mulher.
- Hirata, H., & Kergoat, D. (2007). Novas configurações da divisão sexual do trabalho. *Cadernos de pesquisa*, *37*(132), 595-609. http://dx.doi.org/10.1590/S0100-15742007000300005
- Joyce, Y., & Walker, S. P. (2015). Gender essentialism and occupational segregation in insolvency practice. *Accounting, Organizations and Society*, *40*, 41-60. https://doi.org/10.1016/j.aos.2014.12.001
- Khalifa, R. (2013). Intra-professional hierarchies: the gendering of accounting specialisms in UK accountancy. *Accounting, Auditing & Accountability Journal*, 26(8), 1212-1245. https://doi.org/10.1108/AAAJ-05-2013-1358
- Komori, N. (2008). Towards the feminization of accounting practice: Lessons from the experiences of Japanese women in the accounting profession. *Accounting, Auditing & Accountability Journal*, 21(4), 507-538. https://doi.org/10.1108/09513570810872905
- Laffin, M., & Gomes, S. M. S. da. (2016). Formação pedagógica do professor de Contabilidade: o tema em debate. *Arquivos Analíticos de Políticas Educativas*, 24(77), 1-27. http://dx.doi.org/10.14507/epaa.24.2372
- Lehman, C. R. (1992). "Herstory" in accounting: The first eighty years. *Accounting, Organizations and Society*, 17(3-4), 261-285. https://doi.org/10.1016/0361-3682(92)90024-M
- Lemos Júnior, L. C., Santini, R. B., & Silveira, N. S. P. da. (2015). The Feminization of the Accounting Area: A Basic Qualitative Study. *Journal of Education and Research in Accounting*, 9(1), 64-83. http://dx.doi.org/10.17524/repec.v9i1.1159
- Lupu, I. (2012). Approved routes and alternative paths: The construction of women's careers in large accounting firms. Evidence from the French Big Four. *Critical Perspectives on Accounting*, 23(4-5), 351-369. https://doi.org/10.1016/j.cpa.2012.01.003
- Miranda, G. J. (2011). Relações entre as qualificações do professor e o desempenho discente nos cursos de graduação em contabilidade no Brasil. PhD Dissertation, Faculdade de Economia, Administração e Contabilidade, University of São Paulo, São Paulo.
- National Center for Educational Statistics. *Digests of Education Statistics*. Retrieved from https://nces.ed.gov/programs/digest/
- National Institute for Educational Studies and Research "Anísio Teixeira" (INEP). (2001). Sinopse da Educação Superior, 2000. Retrieved from
- http://download.inep.gov.br/download/censo/2000/Superior/sinopse_superior-2000.pdf National Institute for Educational Studies and Research "Anísio Teixeira" (INEP). (2012).
- Exame Nacional de Desempenho dos Estudantes Relatório Síntese Ciências Contábeis 2012. Retrieved from
 - $http://download.inep.gov.br/educacao_superior/enade/relatorio_sintese/2012/2012_rel_ciencias_contabeis.pdf$



Moving Accounting Forward

- National Institute for Educational Studies and Research "Anísio Teixeira" (INEP). (2015). *Censo da Educação Superior 2013*. Retrieved from http://download.inep.gov.br/download/superior/censo/2013/resumo_tecnico_censo_educ acao_superior_2013.pdf.
- National Institute for Educational Studies and Research "Anísio Teixeira" (INEP). (2017). Sinopse da Educação Superior, 2016. Retrieved from http://inep.gov.br/sinopses-estatisticas-da-educacao-superior
- Nemoto, K. (2013). When culture resists progress: masculine organizational culture and its impacts on the vertical segregation of women in Japanese companies. *Work, employment and society*, 27(1), 153-169. https://doi.org/10.1177/0950017012460324
- Nganga, C., S., N., Botinha, R., A., Miranda, G. J., & Leal, E., A. (2016). Mestres e doutores em contabilidade no Brasil: uma análise dos componentes pedagógicos de sua formação inicial. *REICE. Revista Iberoamericana sobre Calidad, Eficacia y Cambio en Educación*, *14*(1), 83-99. https://doi.org/10.15366/reice2016.14.1.005
- Roberts, J., & Coutts, J. A. (1992). Feminization and professionalization: a review of an emerging literature on the development of accounting in the United Kingdom. *Accounting, Organizations and Society*, *17*(3-4), 379-395. https://doi.org/10.1016/0361-3682(92)90030-V
- Scott, J. W. (1986). Gender: a useful category of historical analysis. *The American Historical Review*, *91*(5), 1053-1075. https://doi.org/10.2307/1864376
- de Souza, F. M., Bernardes Voese, S., & Abbas, K. (2015). Mulheres no topo: as contadoras paranaenses estão rompendo o glass ceiling?. *Advances in Scientific & Applied Accounting*, 8(2), 244-270. https://doi.org/10.14392/ASAA.2015080206
- Silva, S. M. C. D. (2016). *Tetos de vitrais: gênero e raça na contabilidade no Brasil*. PhD Dissertation, Faculdade de Economia, Administração e Contabilidade, University of São Paulo, São Paulo.
- Smith, D. G. (2017). Progress and paradox for women in US higher education. *Studies in Higher Education*, 42(4), 812-822. https://doi.org/10.1080/03075079.2017.1286813
- Solomon, B. M. (1985). In the company of educated women: A history of women and higher education in America. Yale: University Press.
- United Nations Educational, Scientific and Cultural Organization. (2015). *UNESCO eAtlas of gender inequality in education*. UNESCO Institute for Statistics. Retrieved from https://tellmaps.com/uis/gender/#!/tellmap/79054752/6.
- Yannoulas, S. C. (2011). Feminização ou feminilização?: apontamentos em torno de uma categoria. *Temporalis*, 2(22), 271-292. https://doi.org/10.22422/2238-1856.2011v11n22p271-292
- Yannoulas, S. C. (2013). Sobre o que nós, mulheres, fazemos. *Trabalhadoras: análise da feminilização das profissões e ocupações. Brasília: Editorial Abaré*, 31-68.

ⁱ In Portuguese, from the original: Com base nessa identidade feminina, foi legitimada a discriminação das mulheres, em diversos âmbitos – mercado de trabalho, política, cultura, entre outros –, ainda que, simultaneamente, tenha-se afirmado a igualdade dos seres humanos.

ii In Portuguese, from the original: A feminização propriamente dita refere-se às transformações em um determinado tipo de ocupação, vinculadas à imagem simbólica do feminino predominante na época ou na cultura especificamente analisadas. Essa imagem pode implicar uma mudança no significado da profissão.