

# WOMEN FOR SCIENCE CENSUS UPDATE 2014-2016



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## Women for Science Census Update 2014-16:

Frances Henry, April 2018

### **Introduction**

At our meeting in 2016 in Venezuela, the WfS decided that an update of our membership census, originally undertaken in 2013 was required. In fact, we decided that an update should be done every three years. Accordingly, a very short five question instrument was developed and discussed at length at our meeting in Irvine in 2017. The final questionnaire was sent by the IANAS office to the Academies in May 2017. Despite the very few number of questions, responses were slow in coming back even with repeated requests to the Academies to do so. Consequently, Frances Henry did not receive all the completed forms until December 2017.

The data on which this brief report is based therefore, does not represent the numerical status of the Academies membership today as it does not include any additions/changes made during the past year of 2017.

### **Membership Numbers**

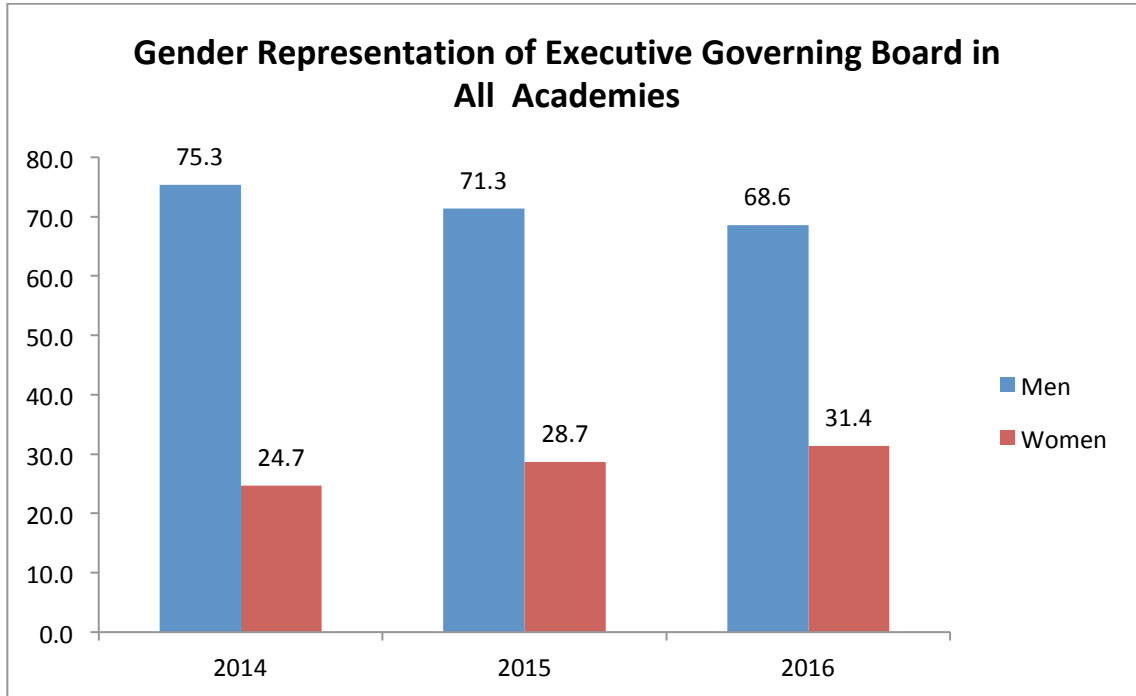
Table 1 indicates that all Academies increased their total membership and their number of women members over the three year period studied. In some instances the increases were substantial and in others, different regulations and policies influenced the degree of growth possible. For example, the member numbers increased substantially in Canada but the proportion of women members increased only slightly. In the Caribbean, however, both total membership and women members increased at about the same level. In Cuba meanwhile, numbers stayed more or less the same but women members increased. In Ecuador, a new and small Academy, membership levels rose as did the proportion of women. Nicaragua showed an increase in the proportion of women but a slight decrease in the total number of members. Panama also showed a significant increase in the number of women but it must be remembered that their members are chosen by application rather than selection. Other Academies remained at about the same levels.

Overall, the main conclusion that can be reached is that that there is some movement towards increasing the proportion of women in the Academies but substantial disparities between men and women are still very apparent.

**Table 1: Number of Women by Academy: By Numbers and Proportions**

Name of Academy	Total members			Number of women		
	2014	2015	2016	2014	2015	2016
Argentina	154	157	157	10 6.5%	10 6.4%	11 7.0%
Bolivia	50	49	48	5 10%	6 12.2%	6 12.5%
Brazil	500	522	543	64 12.8%	68 13.0%	73 13.4%
Canada	2173	2366	2472	400 18.4%	450 19.0%	517 20.9%
Caribbean	220	234	254	35 15.9%	40 17.1%	54 21.3%
Chile	72	77	80	8 11.1%	9 11.7%	11 13.8%
Columbia	184	198	201	27 14.7%	29 14.6%	29 14.4%
Cuba	310	313	308	66 21.3%	86 27.5%	85 27.6%
DR	175	170	170	19 10.9%	20 11.8%	20 11.8%
Ecuador	6	31	50	2 33.3%	6 19.4%	12 24.0%
Guatemala	68	73	79	12 17.6%	14 19.2%	16 20.3%
Honduras	22	25	27	8 36.4%	8 32.0%	8 29.6%
Mexico	2570	2657	2708	615 23.9%	642 24.2%	663 24.5%
Nicaragua	33	39	37	6 18.2%	6 15.4%	10 27.0%
Panama	108	124	119	45 41.7%	50 40.3%	62 52.1%
Peru	115	115	119	23 20%	23 20.0%	23 19.3%
Uruguay	22	22	25	5 22.7%	5 22.7%	6 24.0%
USA	2277	2305	2336	308 13.5%	330 14.3%	354 15.2%
Venezuela	44	44	44	9 20.5%	9 20.5%	9 20.5%

**Table 2: Gender Representation of Presidents/Executive Governing Board in All Academies In %**



**Table 4 - Gender Representation of Presidents/Executive Governing Board in All Academies In Numbers:**

Name of Academy	Men - Women Presidents			Men - Women Executive Board		
	2014	2015	2016	2014	2015	2016
Argentina	1 - 0	1 - 0	1 - 0	8 - 1	8 - 2	8 - 2
Bolivia	1 - 0	1 - 0	1 - 0	5 - 6	5 - 6	5 - 6
Brazil	1 - 0	1 - 0	1 - 0	11 - 1	11 - 1	10 - 2
Canada	1 - 0	0 - 1	0 - 1	5 - 3	5 - 3	4 - 4
Caribbean	1 - 0	1 - 0	1 - 0	3 - 2	3 - 2	3 - 2
Chile	1 - 0	1 - 0	0 - 1	5 - 1	5 - 1	5 - 1
Columbia	1 - 0	1 - 0	1 - 0	4 - 2	4 - 2	4 - 1
Costa Rica	1 - 0	1 - 0	1 - 0	6 - 1	6 - 1	6 - 1
Cuba	1 - 0	1 - 0	1 - 0	6 - 4	6 - 4	5 - 5
DR	1 - 0	1 - 0	1 - 0	17 - 5	17 - 5	17 - 5
Ecuador	1 - 0	1 - 0	1 - 0	3 - 2	3 - 3	6 - 0
Guatemala	1 - 0	0 - 1	0 - 1	6 - 0	5 - 2	5 - 2
Honduras	1 - 0	1 - 0	1 - 0	3 - 1	3 - 1	3 - 1
Mexico	1 - 0	1 - 0	1 - 0	2 - 2	2 - 2	2 - 2
Nicaragua	1 - 0	1 - 0	1 - 0	5 - 2	5 - 2	5 - 2
Panama	1 - 0	1 - 0	1 - 0	5 - 2	5 - 2	5 - 2
Peru	1 - 0	1 - 0	1 - 0	5 - 1	4 - 2	4 - 2
Uruguay	1 - 0	1 - 0	1 - 0	9 - 1	9 - 1	7 - 3
USA	1 - 0	1 - 0	0 - 1	8 - 8	8 - 8	6 - 10
Venezuela	1 - 0	1 - 0	1 - 0	5 - 1	3 - 3	3 - 3
TOTAL	19 - 0	17 - 2	15 - 4	116 - 38	112 - 45	107 - 49

Table 2 indicates a steady increase in the proportion of women executive members from nearly one quarter to almost one third during the three year period surveyed. And, correspondingly there was a small decline in the proportion of male executive members. A few anomalies, presumably influenced by local circumstances can be seen. For example, Ecuador, a small relatively new academy declined in female executives from the same number of women as men in 2015 to only men in 2016. In the US, however, the number of executive women, beginning at parity, increased by 2 in 2016.

In regard to the role of President of the academy, the first year (2014) covered by our survey, there were no women presidents. In the following years, the highest number attained was four women presidents. In two academies, Canada and Guatemala, the same women served in 2015-16. It should be noted that Mexico was expected to have a women president in 2017. Overall, there was an increase in the number of women presidents.

## Responses to Open Ended Question

The open-ended question asked: "What is your Academy's Most Successful Initiative to Improve the Number of Women Members" Responses were somewhat varied but several key themes emerged from them.

1. Proactive measures are needed to find and indentify potential women members was mentioned by several, particularly the larger academies. Strategies used included for some simply meant exploring ways of finding new women but for others, more active strategies have already been undertaken or are in planning stages. For example, the development of decentralized workshops designed to provide forums of interaction between academy members and women at various stages of their career increases the awareness that women scholars can and should think about academies of science.
2. Similarly the creation of prizes, awards and grants should be established by academies and publicized widely in educational environments. They provide a means of consciousness raising and help in publicizing the work of women in science.
3. Changing or diversifying nomination procedures in academies was also mentioned in order to make the process more relevant and open to women. Putting more emphasis on women and diversity in the selection committees that create the short list of potential member was also noted. Even creating a temporary nominating group to diversity Women could be prioritized through a quota system was also proposed as was creating a gender policy.
4. Providing interactive or public spaces to publicize the opportunities for women to meet and engage. These include workshops, meetings, community group organizations. In one case creating a commission on women in science some years ago has helped with funding science projects and promoting women.
5. Increasing contact with leaders in scientific and university communities such as Presidents, Deans, lecturers to promote women in science programs and also helps in identifying and encouraging women in these to be proposed for academy membership.

One of the most constant themes that ran through many of the answers was the need to find and identify potential women, to publicize the important role of women in science and to help in providing a social and educational environment that supports women.

## Recommendations

1. The census update should continue to be taken every two or three years as it provides useful information on the changing nature of Academy membership and the progress of women members.
2. WfS focal points must make a more concerted effort to persuade their Presidents or persons in charge to complete the survey quickly as its questions are time oriented. This

could be one of the ways that Academies demonstrate their commitment to women members and their increase.

3. Even creating a temporary nominating group where women could be prioritized through a quota system was also proposed as was creating a gender policy.