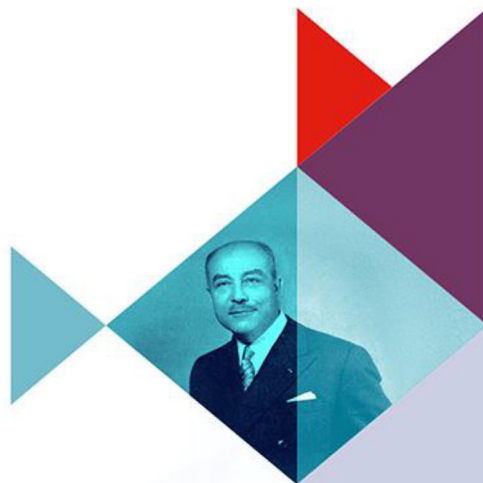


INSTITUT GASTON BERGER



Monitoring of applicants, entrants and graduates, with regard to gender – 2009-2021

Arnaud Trollé - Monitoring Unit, Institut Gaston Berger
Under the direction of Sonia Béchet - Director, Institut Gaston Berger

November 2022

Table of Contents

1	INSA Group applicants	1
1.1	Application rate among Bac S students.....	1
1.2	Rate of women among applicants to the INSA Group	2
2	INSA Group entrants	2
2.1	Entry rate of applicants	2
2.2	Rate of women among first-year entrants	3
3	INSA Lyon graduates	4

This summary sheet, produced by the Monitoring Unit of the Institut Gaston Berger¹, shows the tracking of applicants and entrants into the INSA Group and engineering graduates from INSA Lyon, with regard to gender and over the period 2009-2021.

The statistics presented in this document only cover students holding a French general science baccalaureate (Bac S) or a new French general baccalaureate (Bac Gen, from 2021) who applied to the INSA Group in the first year, as these students form the Group's main recruitment pool.

1 INSA Group applicants

1.1 Application rate among Bac S/Gen students

Figure 1 shows the change in the application rate for women and men, defined as the ratio of the number of applications to the INSA Group and the number of final-year Bac S/Gen² students.

Concerning final-year Bac Gen students, this application rate was computed by considering only the students with the doublets that include mathematics and another scientific special topic³.

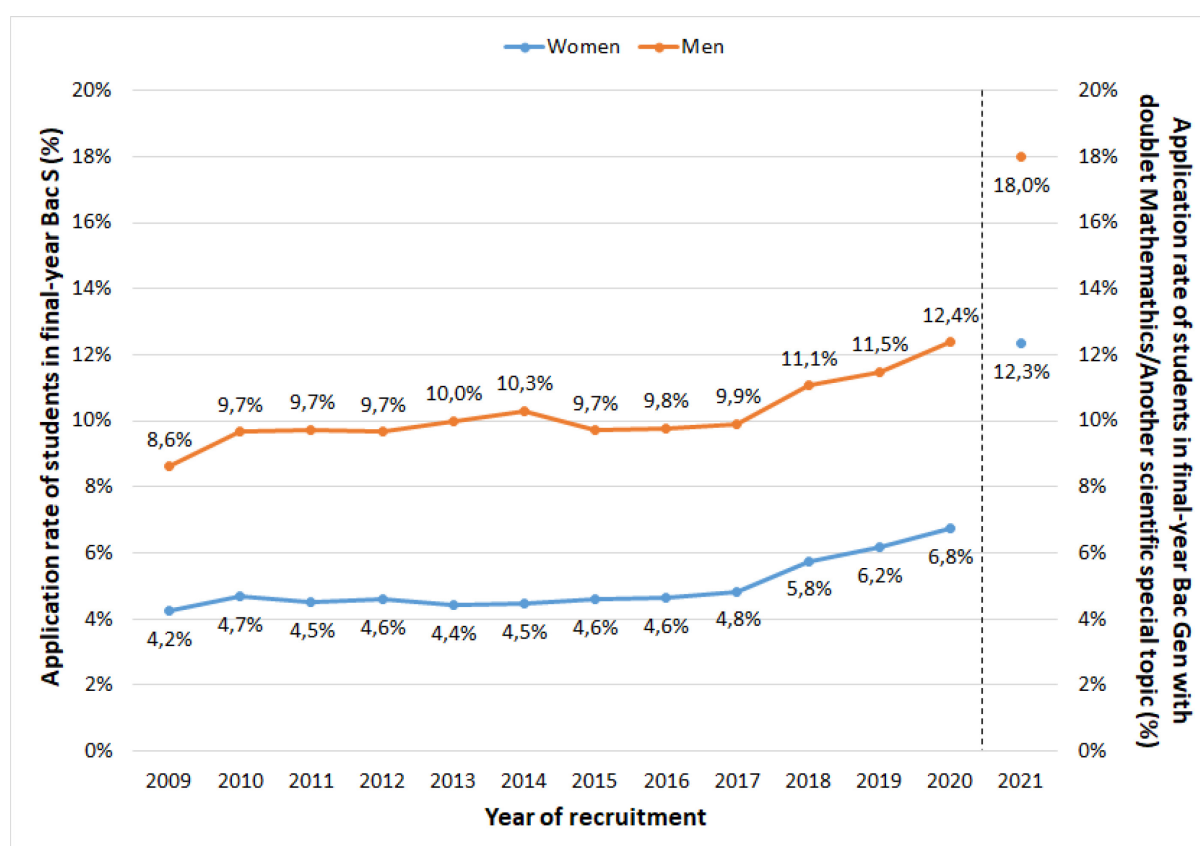


Figure 1: Change in the application rate for men and women, between 2009 and 2021 (at the beginning of academic year 2020/2021, final-year Bac Gen with doublets Mathematics / Another scientific special topic: 44,256 women, or 38.1%; 72,053 men, or 61.9%).

After stagnating over the period 2010-2017 for both women and men, the application rate for final-year Bac S students (Y-axis on the left side of figure 1) increased from 2018 onwards (between 2017

¹ <https://institut-gaston-berger.insa-lyon.fr/content/observatoire-de-linstitut-gaston-berger-0>.

² The numbers of final-year Bac Gen students (at the beginning of the academic year 2020/2021) are available from: <https://data.education.gouv.fr/explore/dataset/fr-en-effectifs-specialites-doublettes-terminale-generale/table/> (accessed 26/10/2022).

³ In the open dataset, the numbers of students are not available for several other doublets present among the applicants to the INSA Group. The students with the doublets that include mathematics and another scientific special topic represented 85% of the applicants in 2021.

and 2020: +2.5 points for men and +2 points for women). This increase came in the year in which the Parcoursup platform was set up to replace APB, which seems to have improved the visibility and attractiveness of the INSA Group. In all years (2009-2020), the application rate for final-year Bac S students is almost half as high among women as among men. Although the attractiveness of the INSA Group has increased sharply over the last two years, it still remains lower for women (-5.6 points). **In 2020, 12.4% of male final-year Bac S students and 6.8% of female final-year Bac S students applied to the INSA Group.**

The application rate for final-year Bac Gen students with the doublets Mathematics / Another scientific special topic (Y-axis on the right side of figure 1) in 2021 is not directly comparable to that for final-year Bac S students in previous years. **In 2021, 18.0% of male final-year Bac Gen students and 12.3% of female final-year Bac Gen students applied to the INSA Group.** The difference in application rate between male and female final-year Bac Gen students remained stable (5.7 points).

1.2 Rate of women among applicants to the INSA Group

Despite a lower attractiveness for women, Figure 2 shows that between 2014 and 2020, the rate of women among applicants to the INSA Group increased by 6.2 points. In 2021, this rate decreased by around 1 point. **In 2021, 32.0% of applicants to the INSA Group were women.**

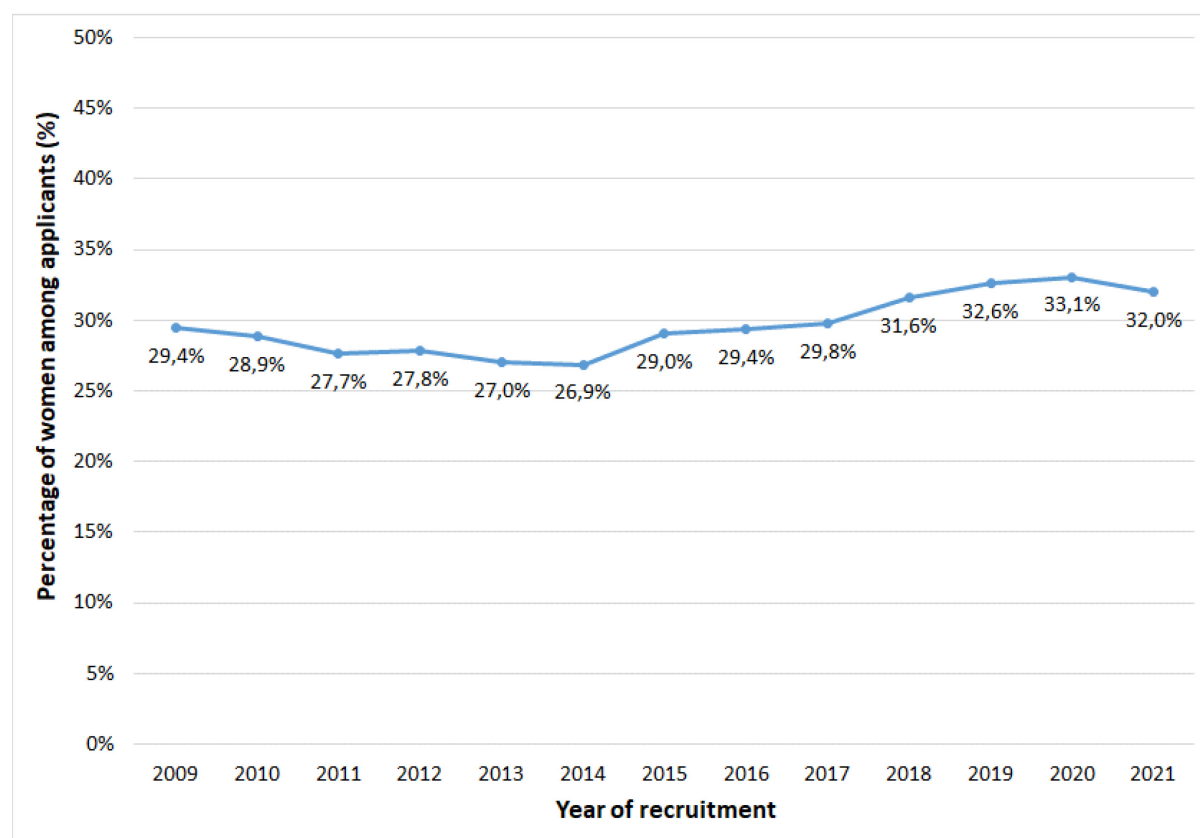


Figure 2: Change in the rate of women among applicants between 2009 and 2021.

2 INSA Group entrants

2.1 Entry rate of applicants

Figure 3 shows the change in the entry rate of applicants to the INSA Group, defined as the ratio of the number of entrants (i.e., admitted and present at the beginning of the academic year) and the number of applicants.

The entry rate for women is consistently higher than that of men, by 3 to 6 points since 2014, showing that the quality of women's applications is, on average, higher than that of men's applications.

While the change in the entry rate of women and men remained almost the same from 2009 to 2013, there was a sudden and strong increase in the entry rate of women in 2014 (+2.4 points) while that of men remained stable. The year 2014 coincided with a change in the INSA Group's recruitment procedure (abandonment of the B wave recruited on baccalaureate grades), which seems to have been favourable to women.

Then, starting in 2015, the entry rates for women and men again began to follow the same trends, with a slow decline and then a more pronounced one in 2018. This decrease is due to an increasingly high level of selectivity due to the continuous increase in the attractiveness of the INSA Group, and therefore the increase in the number of applications, for an almost constant number of places offered at INSA schools. This increase was exacerbated in 2018 with the opening of Parcoursup.

Finally, the entry rate of women continued to decline from 2018 onwards while that of men remained stable between 2018 and 2020 and then decreased in 2021.

In 2021, the entry rate was 11.4% for women and 8.4% for men.

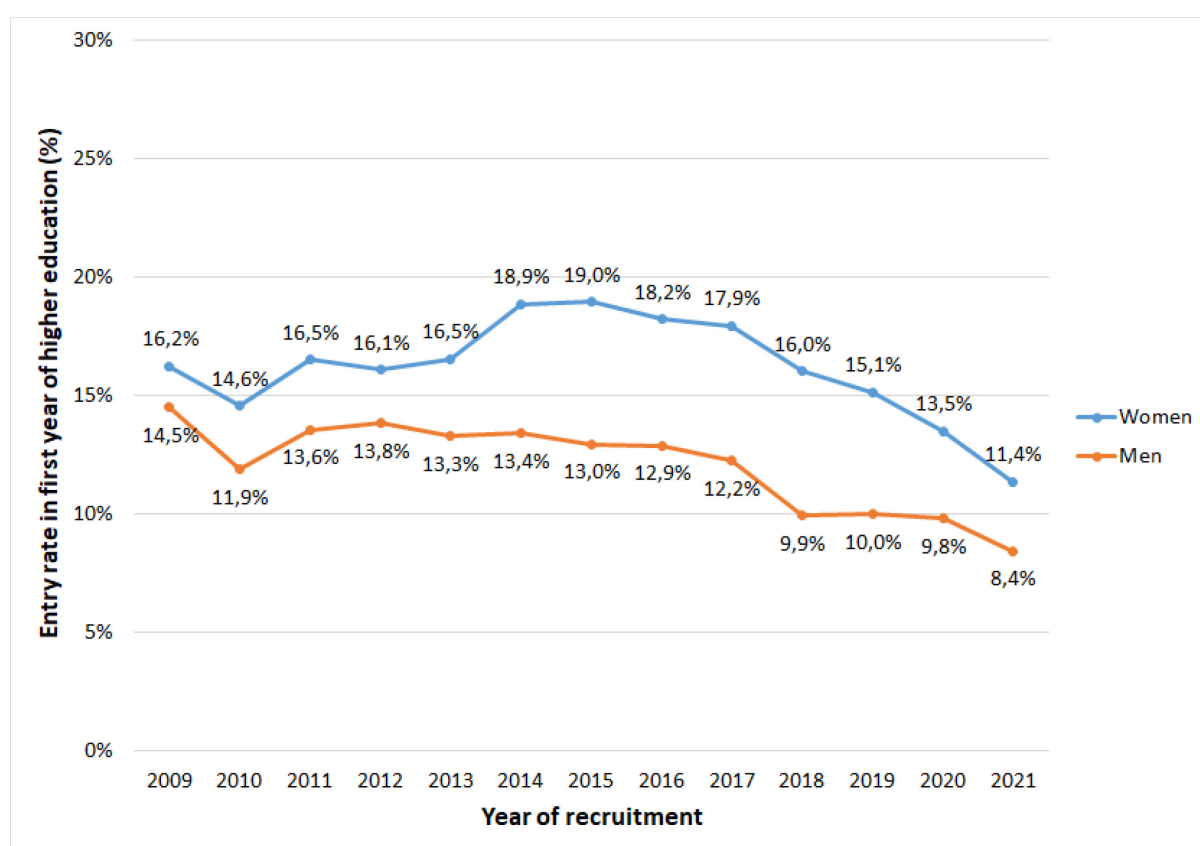


Figure 3: Change in the rate of entry into the INSA Group between 2009 and 2021.

2.2 Rate of women among first-year entrants

As shown in Figure 4, the rate of women among first-year entrants increased steadily between 2014 and 2018. In particular, there was an initial sharp increase in 2014, probably due to the widening gap in the entry rate in favour of women (see Figure 3) linked to the change in the recruitment procedure, then a second sharp increase in 2015, probably due to an increase in the number of applications from women (see Figure 2). A strong increase was again observed in 2018 with the appearance of Parcoursup. Finally, the rate of women among first-year entrants decreased slightly from 2018 onwards.

In 2021, 38.8% of Bac S/Gen holders starting their first year in the INSA Group were women, an increase of 7.8 points compared to 2012.

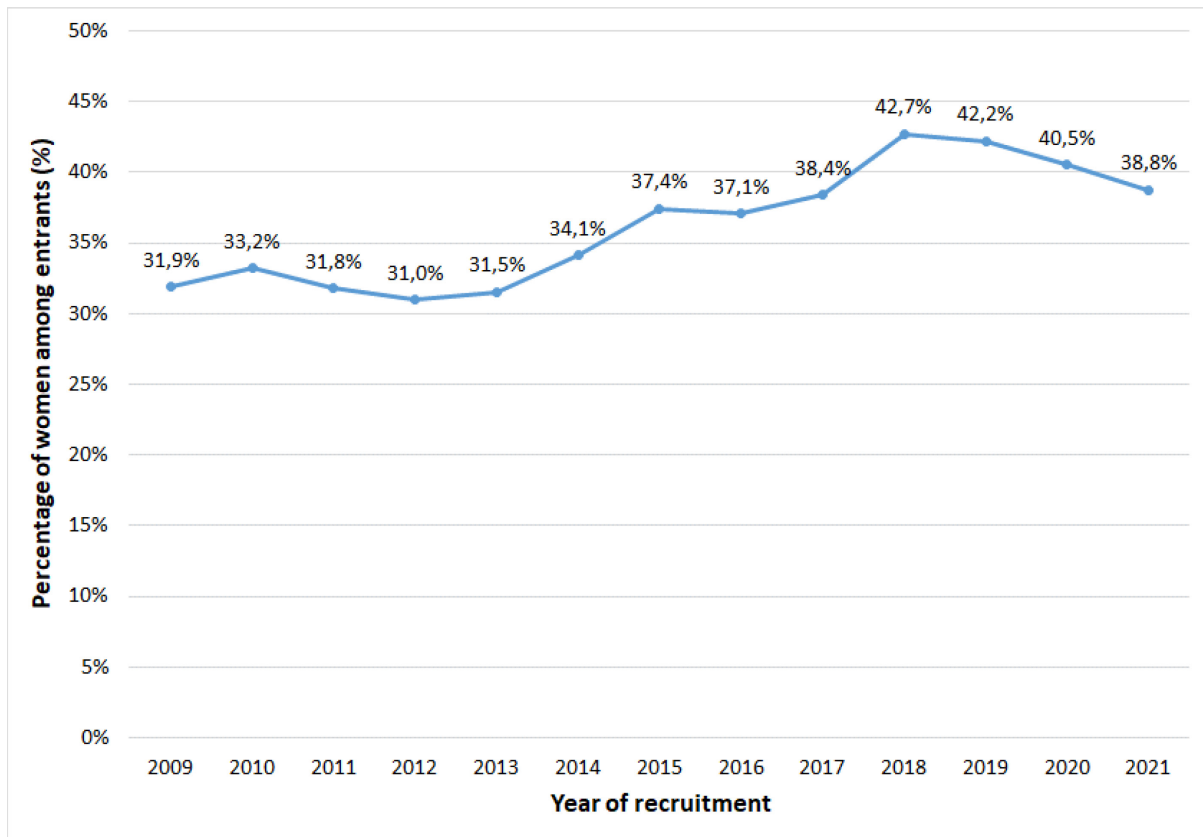


Figure 4: Change in the rate of women among entrants between 2009 and 2021.

3 INSA Lyon graduates

The graduation rate is determined through longitudinal analysis of the progress of INSA Lyon engineering students. This analysis was carried out for the cohorts of students starting in 2009, 2010, 2011, 2012, 2013 and 2014 (i.e. cohorts from which all students had left the school by the date of the analysis, i.e. November 2022).

Figure 5 shows the change in the graduation rate of women and men. It can be seen that, for the years 2009 to 2011, the change curves intersect, with fluctuations of a few points depending on the year, but with an average rate remaining relatively stable at around 84-85%. For the cohorts starting in 2012 and in 2013, the graduation rate for women and men is almost the same (about 87% and 85.5%, respectively). For the cohort starting in 2014, the graduation rate for men is slightly better (+2 points, compared to women).

Thus, over the six years of entry, no systematic trend emerges in terms of a better graduation rate for women or men.

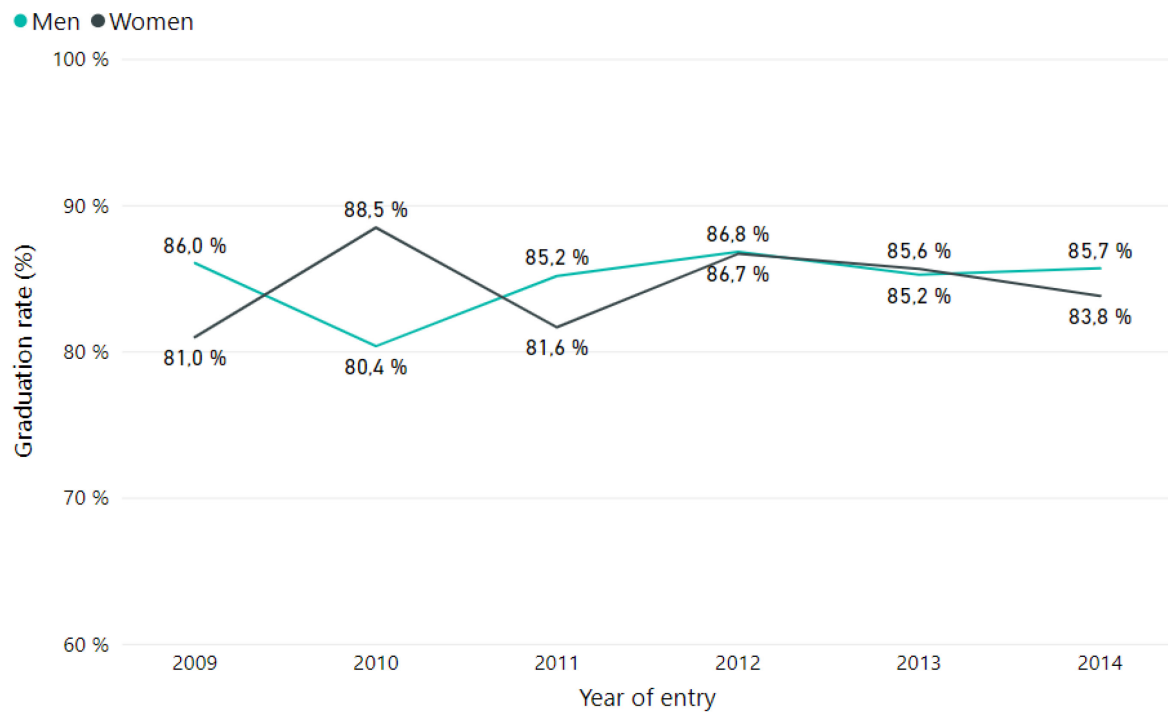


Figure 5: Change in the graduation rate of women and men from the 2009 to 2014 cohorts.