Equal opportunity in INFN

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Topics:
- INFN
- INFN statistics
- Affirmative Plans and Gender Equality Plan
- Best Practices
The INFN missions

Pushing the frontiers of knowledge.
The secrets of the Big Bang

Training the next generation of scientists and engineers

Developing new frontier technologies

Working together with researchers coming from all over the world
The Istituto Nazionale di Fisica Nucleare

The INFN is ...

a community of about 6,500 people

~2500 INFN staff +
~ 4000 associate personnel

25% of them have PhD grants, post-doc scholarships and research grants
Guarantee committee (CUG)

In 1999 INFN appointed its first Equal Opportunity Committee, currently this is the “Comitato Unico di Garanzia” (CUG).

The Garanteee Committee (Comitato Unico di Garanzia, CUG) has the task to propose actions to ensure gender equality, contrast job harassment and improve well-being at work. It analyses sex disaggregated data, produces public annual reports to monitor the time evolution of gender gap, reviews procedures and practices to highlight gender inequalities and gender biases, proposes gender equality strategies and action plans.
Identifying and removing structural barriers to enhance excellence, gender equality and efficiency in research and innovation

Structural change in research institutions

Essential elements of structural change:

• **Knowing the institutions** by gender distributions to understand the real state of parity and to monitor in time the dis-parity and the real effects of affirmative actions (**fix the numbers**);

• **Securing top-level support** (**fix the institutions**);

• **Generating effective management practices** originating from knowledge and awareness of gender issues (**fix the knowledge**);

Statistics of INFN staff at 31-12-2021

Analysis made by INFN-CUG and to be reported in “CUG Annual Report 2022”
Women in INFN

31-12-2021

<table>
<thead>
<tr>
<th>Permanent Contract</th>
<th>TOT</th>
<th>M</th>
<th>F</th>
<th>F/TOT (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Researchers</td>
<td>661</td>
<td>512</td>
<td>149</td>
<td>22</td>
</tr>
<tr>
<td>Technologists</td>
<td>392</td>
<td>316</td>
<td>76</td>
<td>19</td>
</tr>
<tr>
<td>Technicians</td>
<td>619</td>
<td>582</td>
<td>37</td>
<td>6</td>
</tr>
<tr>
<td>Administratives</td>
<td>328</td>
<td>68</td>
<td>260</td>
<td>79</td>
</tr>
<tr>
<td>TOTAL</td>
<td>2000</td>
<td>1478</td>
<td>522</td>
<td>26</td>
</tr>
</tbody>
</table>

- Excluding administrative staff, women are 12% of fixed term contract employees.
- All researcher with fixed-term contract have been selected with Fellini program, EU program, and are mainly theoreticians. No female researcher is present.
- Good fraction of female in technologist role.

Under-representantion of women in the roles of Researcher, Technologist and Technician. Administrative roles are traditionally considered female roles. Excluding administrative staff, women are 16% of permanent contract employees.
INFN people in training

112 Scholarship fellows (41F + 71M)

50% of scholarship fellows is older than 30 years. Five people are older than 40 years. These people have a research grant. In 2021 new INFN rules have been approved to give research fellow to experienced people.

334 post-doc research fellows (104F + 230M)

~ 11% of post-doc research fellows is older than 40 years
Age of INFN staff

The number of “young” female researchers is reduced respect to 2003. They are so few that in some INFN divisions there is none. This reduction is mainly connected to the results of recruitment procedures of last years.

<table>
<thead>
<tr>
<th>Role</th>
<th>Mean age (years)</th>
</tr>
</thead>
<tbody>
<tr>
<td>M</td>
<td>F</td>
</tr>
<tr>
<td>Researcher</td>
<td>53</td>
</tr>
<tr>
<td>Technologist</td>
<td>50</td>
</tr>
<tr>
<td>Technician</td>
<td>52</td>
</tr>
<tr>
<td>Administrative</td>
<td>50</td>
</tr>
</tbody>
</table>
Fraction of female in researcher or technologist role with permanent contract in the last 20 years

Researcher women: weak progress in 2002 - 2011. Technologist women: weak progress in recent years mainly connected to stabilization processes (change from fixed-term contract to permanent, imposed by law).
Large differences among the INFN facilities.

In few facilities/divisions, female in researcher and technologist roles are ≥ 30%.

In some facilities, even large ones, few women and no young woman: Minimum age ~ Mean age.
Fraction of male and female in Researcher and Technologist (R&T) career levels

Vertical segregation: fraction of women decreases at the highest career level

Women in the highest career level are older than men
Glass Ceiling Index (GCI) = total fraction female/ fraction female in first level

GCI = 1 means gender parity

Mean Italian University = 1.6
Glass ceiling index INFN
Researchers 1.34
Technologists 4.4
# Glass Ceiling in INFN

| Profile / Level | Researchers | | | | Technologists | | | |
|-----------------|-------------|---|---|---|----------------|---|---|
|                 | M | M/TOT_ M | F | F/TOT_F | M | M/TOT_M | F | F/TOT_F |
| I               | 94 | 18% | **19** | **13%** | 43 | 14% | **2** | **3%** |
| II              | 195 | 38% | 57 | 38% | 97 | 31% | 20 | 26% |
| III             | 223 | 44% | 73 | 49% | 176 | 56% | 54 | 71% |
| **Total**       | 512 | 149 |  |  | 316 |  | 76 |  |

**Researchers**
1 over 5 male arrive to the I (top) level
1 over 8 female arrive to the I (top) level

**Technologists**
1 over 7 male arrive to the I (top) level
1 over 33 female arrive to the I (top) level
The 5 research lines and the National Scientific Committee
Women in INFN National Scientific Committees

- Fraction of women with scientific responsibilities (national or local principal investigator or scientific coordinator) is larger or equal than the female fraction in the National Scientific Committees.

- **Orizontal segregation**: Fraction of women in Theoretical Physics Committee is lower than in other Scientific Committees.

- In the last years a decrease of the fraction of women with scientific responsibilities has been observed in NSC devoted to subnuclear physics.

- Fraction of female in post-doc positions is stable and it is > 30% (30% - 37%). In Theoretical Physics Committee it is lower than 10%.
In 2003 women were not present in the INFN governing body.

In 2021 about 20% of the components of the INFN board of Directors is a woman.
Only one woman is part of the INFN Executive Committee.
No woman has ever been President of the INFN.

A. Badalà

ICHEP2022 - Bologna - 6-13 July 2022

• Adoption of a specific Code of Conduct to prevent job harassment and in general behaviors which are against human dignity (2003). An external figure, the Confidential Counselor, ensures the application of the Code.

• Adoption of a Code of Ethics to which INFN people are required to comply in carrying out their work and of a Watchdog Committee of the Code

• Adoption of a first Gender Equality Plan (2022)
Affirmative Plans and GEP

General objectives:

- Increase transparency in decision-making processes and improve sharing of information
- Remove the apparently-neutral institutional practices that have a negative impact on women’s careers
- Promote excellence by supporting parity and diversity
- Adopt gender and generational perspectives in research activity
- Improve people’s life quality by acting on human-resources management and working atmosphere

The present INFN Affirmative Plan acts on the following areas:

1) Ensure basic components for structural changes (preparation of gender balance)

2) Training and outreach

3) Support maternity, ensuring parity and equal opportunity in recruitment and selection procedures, in appointment of decisional bodies, at every professional position and level

4) Adapt human-resources management and working atmosphere to the needs of people in their everyday life
Structural changes in INFN

Some PTAP objectives since 2020 are included in the INFN Performance Plan:

- **Ensuring parity and equal opportunity:** aiming at equal success rate for women and men in recruitment and selection procedures.

- **Promoting women in decision making:** ensuring a fraction $\geq 25\%$ of the under-represented gender in scientific committees appointed by the Executive Committee. The value of the minimum fraction is increased each year. It is fixed to 30% for 2022.
Support to maternity

Italian law support maternity (and now also paternity) in different manner. Here only INFN supports are listed

- Covering maternal leave periods of post-doctoral researchers. During maternity leave a substance equal to 80% of the salary is paid by the Social Security. INFN covers the remaining 20%.

- Medical insurance which covers all the expenses connected to pregnancy and childbirth for all INFN staff extended to post-doctoral research fellows and scholarship fellows.

- Preparation and distribution by CUG of a brochure including indications on how accessing to state and INFN benefits for motherhood.

- Economic support to INFN staff for nursery school and kindergarten cost, baby sitting expenses and in general school fees.
Some INFN achievements

• Awards reserved to female students working on theoretical physics

• A research mentoring program for women and recently also for men (talk today by Sabina Pellizzoni);

• Preparation (by CUG) of a brochure “Unconscious Bias and Discrimination” whose compliance is mandatory for all components of recruitment and selection INFN panels
Work –life compatibility

In Italy there are different instruments to assure work-life compatibility to the employers: teleworking, part-time and smart working. All are active in INFN, which has also adopted a flexible working time model. Smart working has been (is) extensively used in this pandemic period.

Society activities

Organization of training courses on equal opportunity and parity in research, training courses to prevent discrimination and harassment and events to prevent violence against women (Target INFN staff + associate personnel)

Organization of outreach events and Science and society activities
INFN guarantees parity and equal opportunity and recognizes the decisive contribution of women to the excellence of the Institution.
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Thanks
INFN FOR UKRAINE
THE INFN MESSAGE FOR UKRAINE

The INFN Italian National Institute for Nuclear Physics shares the strong and firm position of the European Union and of the Italian Government to condemn Russia's aggression against Ukraine, as well as any form of oppression among states and people, in the name of respect, confrontation and cooperation. These are the only and essential tools to have democratic states, guarantee the freedom of people, and achieve the progress of society. This is what science shows us every day as researchers, this is what we want to represent every day as a public scientific institution of a free and democratic State, these are our values.

In this deeply dramatic moment, which leaves all of us bewildered by its senselessness and brutality, we express our full solidarity with the Ukrainian people. And we assure our willingness to support the initiatives for peace and in support of people in difficulty that will be promoted by the Italian Government and the Ministry of University and Research. We are working to offer support to our Ukrainian colleagues with welcoming initiatives, and we will help to spread initiatives to help the Ukrainian population promoted by our local structures, our staff and the scientific community. INFN will also be aligned with the decisions of the Government and the Ministry of University and Research regarding the management of international scientific collaborations involving Russia. We would also like to express our deep sadness for the condition of Russian colleagues and their fellow citizens who suffer the tragic choices of their government. Science has been, is and will always continue to be, by its very nature, a place of freedom and a ground for dialogue and collaboration among people: we believe in this, as people and as scientists, and we work for this as INFN.

INFN INITIATIVES IN SUPPORT OF UKRAINE

SUM-Save the Ukraine Monuments Project

CALL FOR APPLICATIONS for research grants to support Ukrainian scientists for research grants to support Ukrainian scientists
SOME USEFUL LINKS

INFN ALLOCATES THE FIRST FUNDS TO HOST SCIENTISTS AFFECTED BY THE WAR

THE CALL FOR UKRAINIAN RESEARCHERS AND TECHNOLOGISTS IS NOW OPEN

TEXT OF THE CALL AND HOW TO APPLY

SAVE THE UKRAINE MONUMENTS