

Programmes for women-in-physics/science at universities in NL

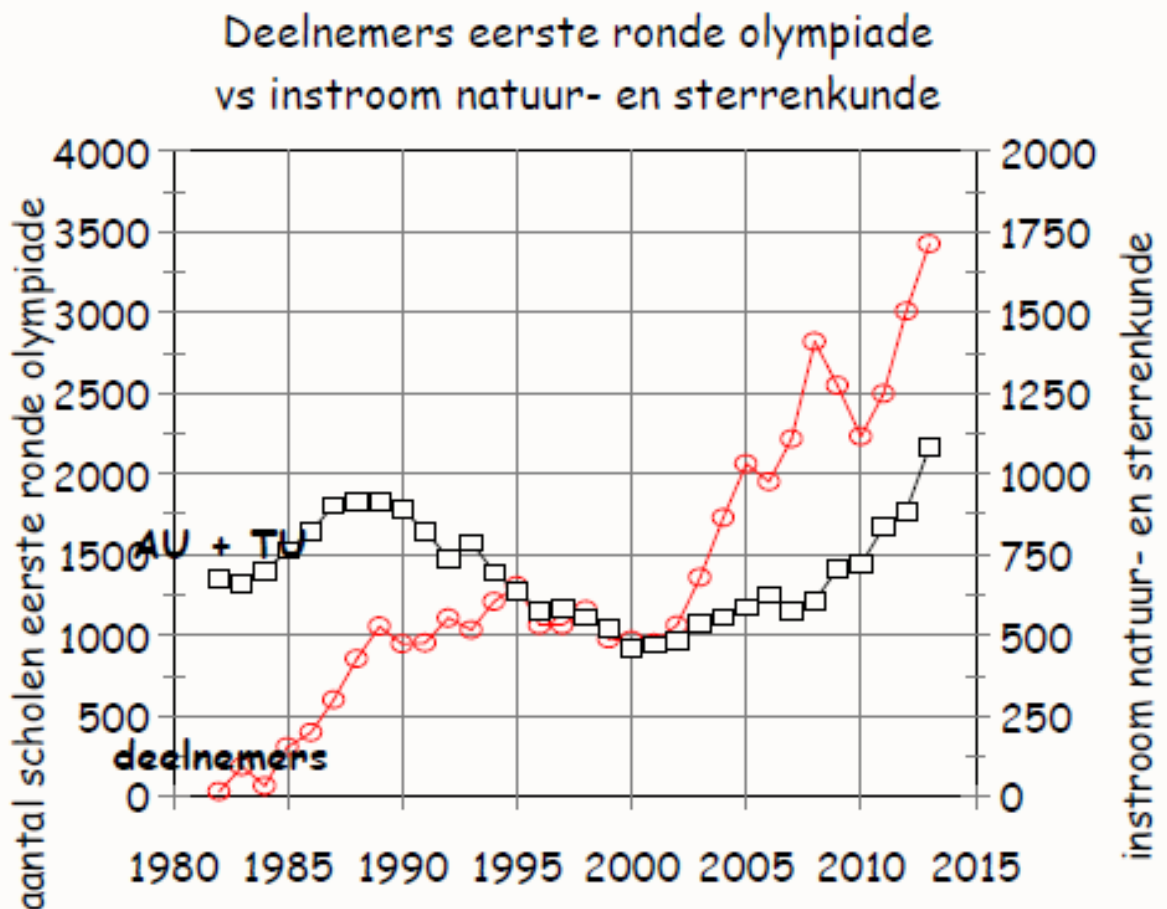
Petra Rudolf

FOM/v chairperson

Special for NL: **low student numbers in Science & Engineering** (12% of student population in 2007)

Interest for physics does not come back in number of students

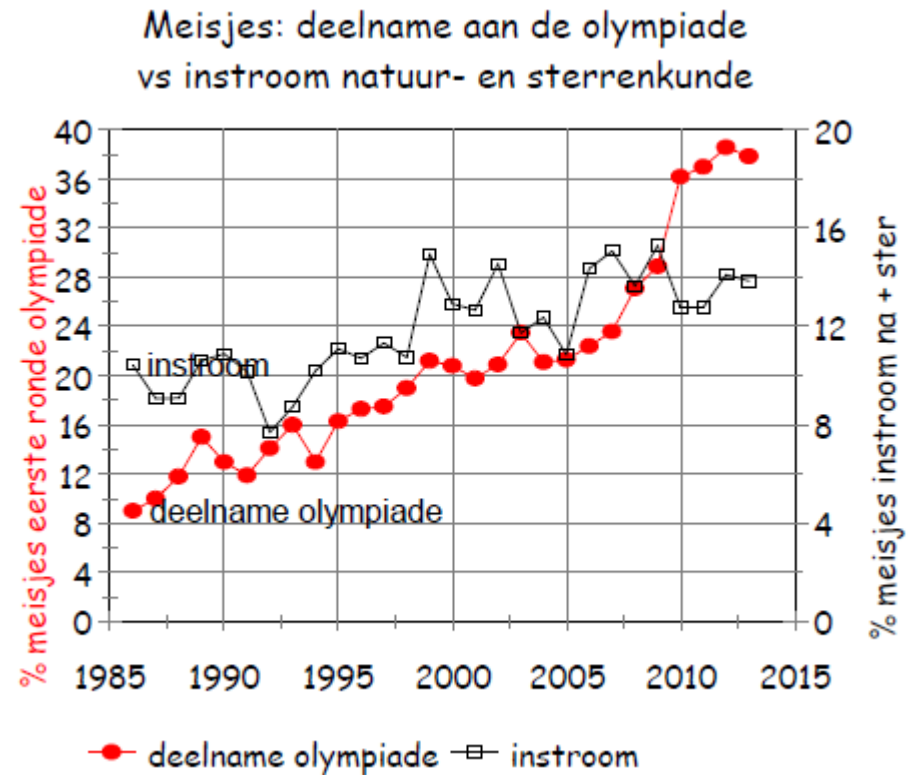
Only about ½ of high school students who participate in Physics Olympiad decide to study Physics...



For girls this is even worse....

37.8% girls among
participants in Physics
Olympiad

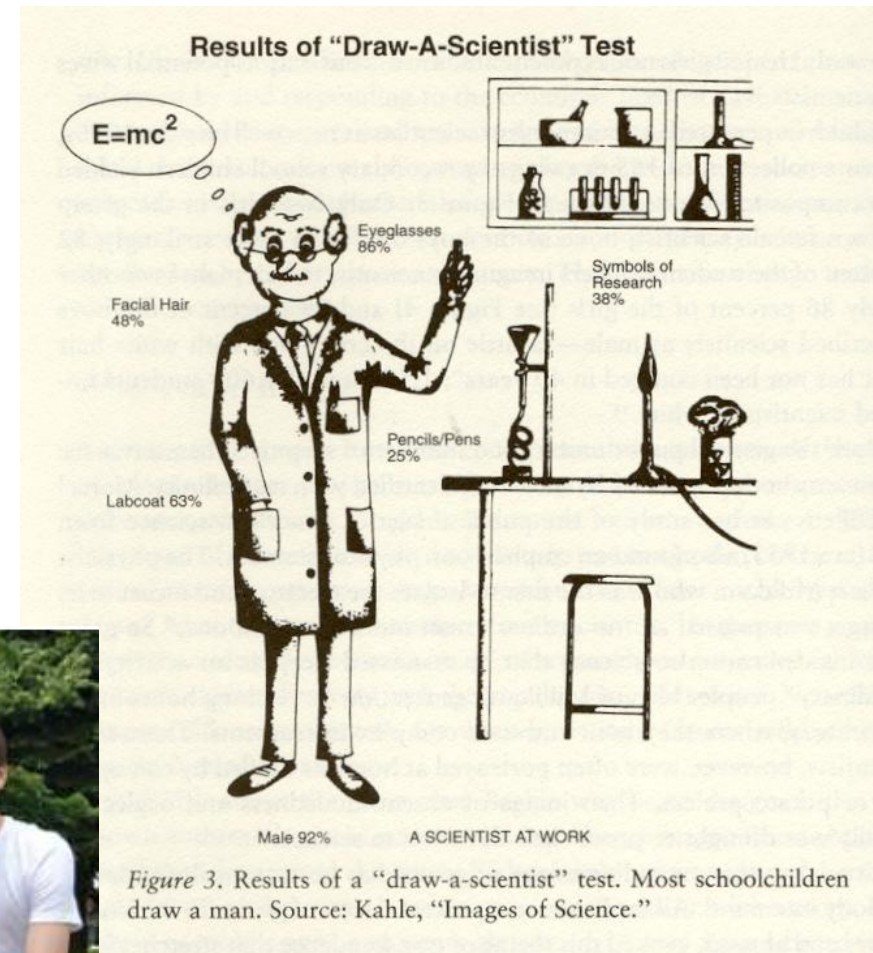
Only 13,7% of first year
Physics students are girls



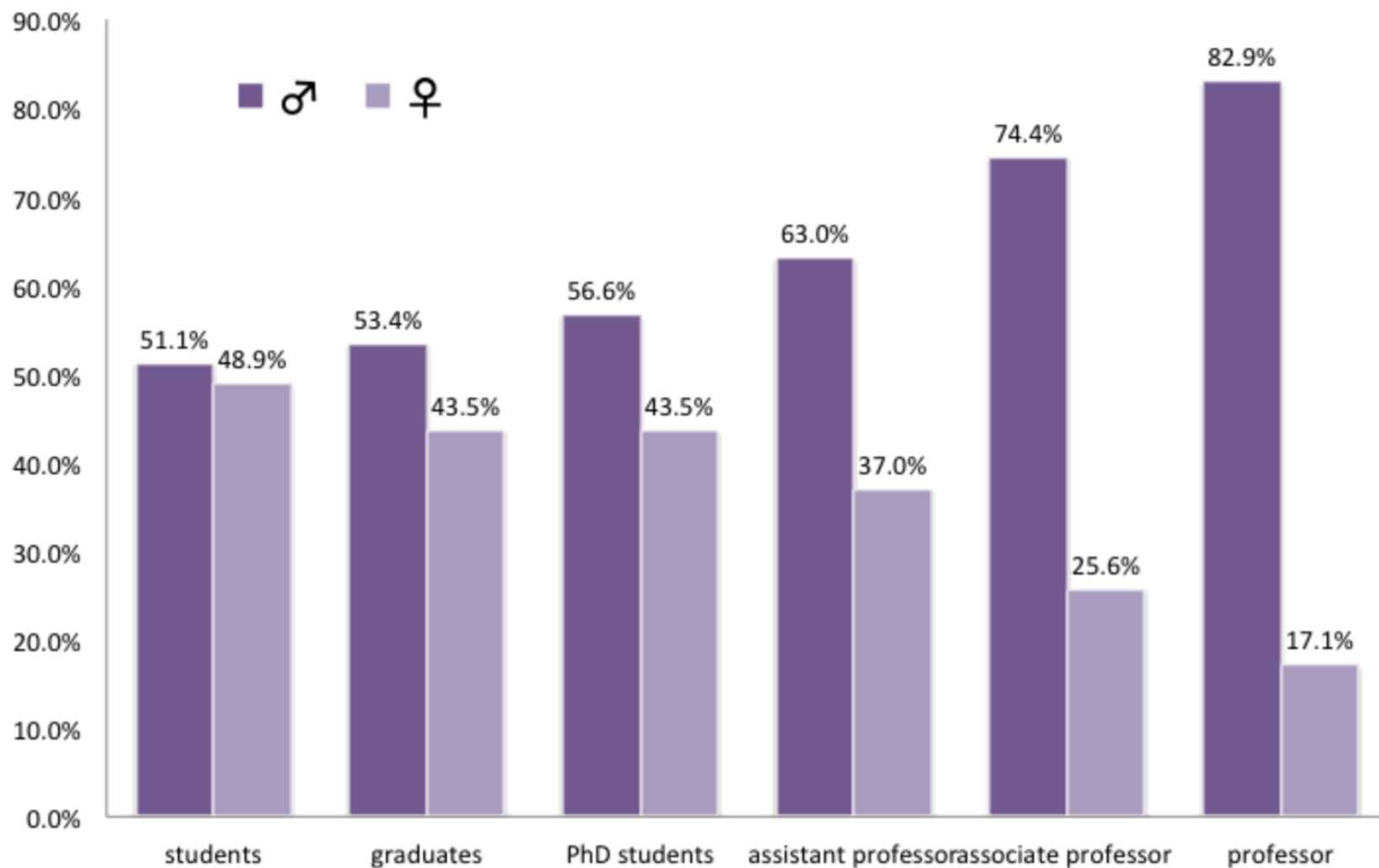
VHTO - the Dutch national expert organisation on women and science and technology, organizes “Girls Days” throughout the country



Dutch society has
a very old
fashioned idea of
the “scientist”



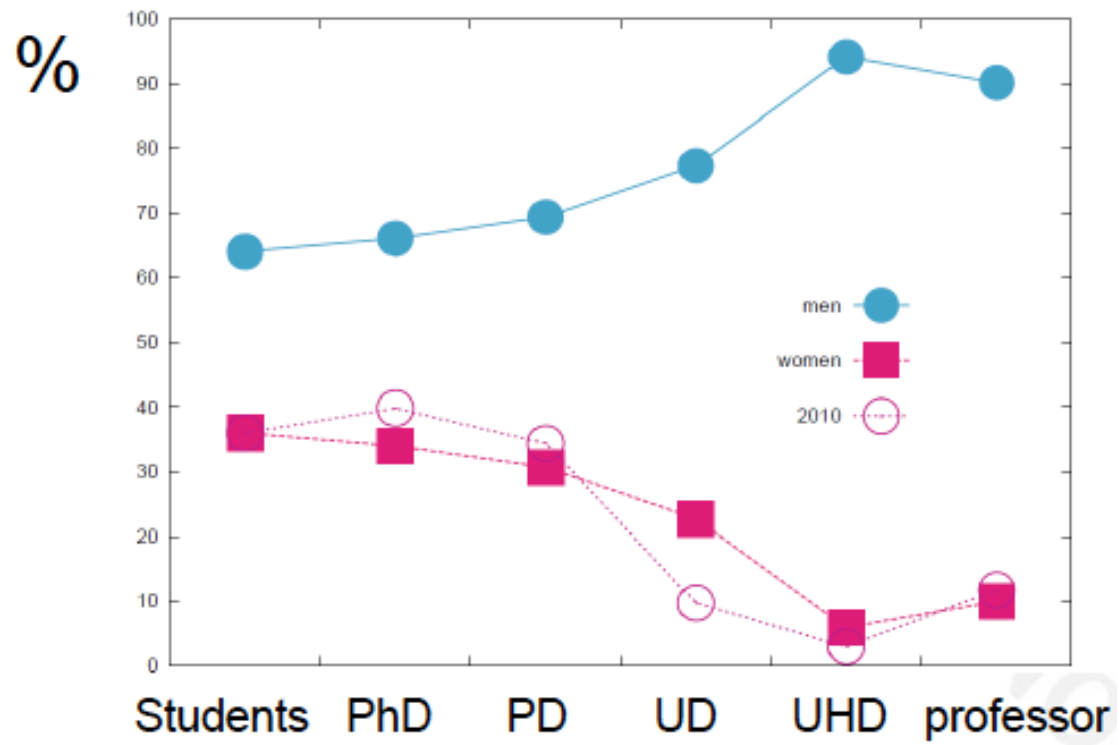
Female science
teachers are rare



Gender distribution in Dutch academia, from student to professor. Taken from the Monitor Women Professors 2015 by LNVH.

Worse in Science faculties:

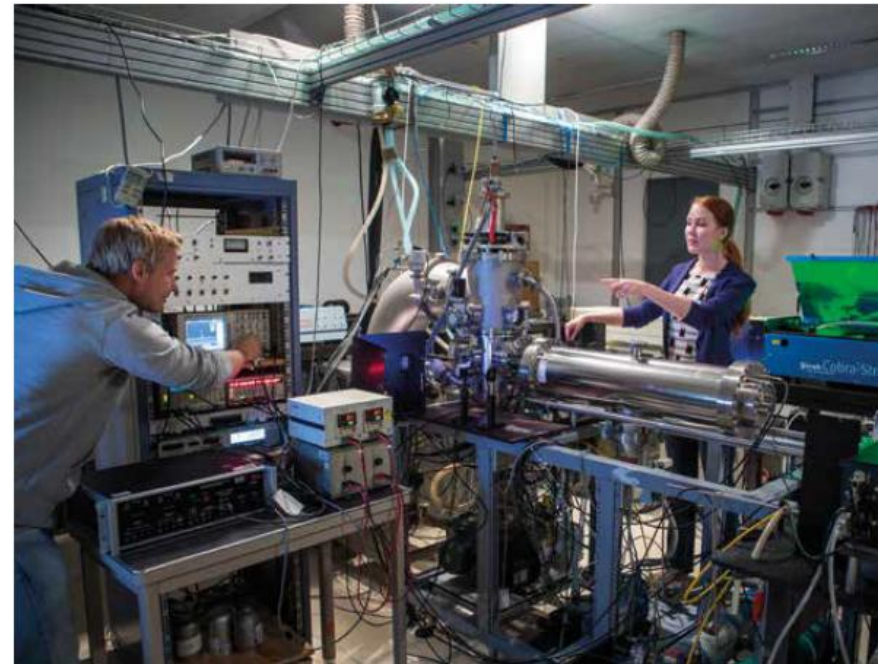
Radboud University
Nijmegen



At universities: Sector plan
Physics tenured staff

2010: 9%; 2013: 13%

Aim: 2025: 25%



Special circumstances require special measures:

The Rosalind Franklin Fellows

tenure track
assistant
professorships
exclusively for
women.

First 5 years paid
by University
Board then by
Faculty.

100th Rosalind
Franklin fellow
about to be
appointed.



From the advertisement:

APPLICANTS MUST HAVE:

- a PhD and post-doctoral experience, preferably in different research institutions (Dutch applicants should have minimally 2 years post-doctoral experience outside the Netherlands).
- publications in first rate international scientific journals
- experience in supervising research projects
- the ability to successfully compete for external research funding
- affinity to teaching
- evidence of international recognition

We are looking for **ambitious, creative women who aim for a successful independent career towards full professorship** in a European top research university. Successful candidates will be expected to establish an **independent, externally funded research program** in collaboration with colleagues at our university and elsewhere. They will also be expected to participate in and contribute to the development of the **teaching** programme of the Faculty (**20% of time**). RF Fellowships are funded with a generous **startup package**, worth around **200,000 euro**.

University wide program – for Fac. Math. Nat.Sci.:

- Up to now 5 rounds: 2003, 2005, 2008, 2010, 2012, 2014
- About **>100 applicants each time (170 in last round)** ! 20 invited for interview and a research seminar – 5-6 selected in each round
- and very successful (VICI, VIDI, ERC, European projects...)
- Promotion to adjunct professor/UHD: 80%
- Conditions: successful research line developed, at least 3 papers/year, 3 PhD supervised (1 finished), 1 larger grant, course development, good student evaluation, service to community, training courses for teaching and management followed, can teach in Dutch and English, competences (*Creativity, Communication, Guiding and Inspiring Leadership, Strategic Activities, Managerial skills, International visibility, Didactic qualities, Collegiality, Vision*)

The example is followed...

- University of Twente: **Tenure Track UTwist3 Woman in Science**
More than 100 applicants for four positions in 2015
- UvA: **Carolina MacGillavry fellowship**
217 applicants for 6 positions in 2013
- TU/e **Women in Science tenure tracks** 3-5 positions/year
- Radboud University **Joliot-Curie Fellowships**

But not all allowed to become full professor like in Groningen....

- **NWO/WISE programme** for national research institutes

Currently in FMNS 16 RFFs: 7 tenure trackers, 5 adjunct professor and 4 full professor, but 8 left.

- RFF fellows perceive criteria as achievable but getting grants can be stressful (NWO rules for non permanent staff limit possibilities)
- Embedding not always easy for RFFs; some instances of jealousy by male colleagues occurred due to “women only condition”.
- Cultural differences between NL & other countries
 - - Strategy issues: not a pre-planned enlargement of a certain specialty; difficult for small faculties where budget does not easily allow for extra position after 5 years when special presidency money stops.

Two body problem and family issues...

- **Alumni network** used to help finding jobs for partners
- Partners considered **internal candidates** for UG vacancies
- Faculties help each other in creating **temporary positions for partners**
- Good babysitting/kindergarden facilities in Groningen
- Reimbursement for **babysitting service for emergency situations and conference participation** of UG employees and babysitting routinely offered at UG-organized conferences/workshops. Financing: first Elsevier Foundation now the university.

The progress is monitored and supported

- **yearly progress interviews** **check and coach** with research unit head, institute director, director of Graduate/Undergraduate School
- training/support for **cultural differences** and **grant submissions**
- **mentoring** local and national (LNVH)
- **supervision of promotion process** by UG wide RFF committee
- **RFF UG broad and faculty networks, yearly dinners**

Other activities at other universities:

Eindhoven University of Technology: WISE network (Women in Science Eindhoven network) since 2007 envisions a TU/e in 2020 with a minimum number of female professors of 15% and higher numbers of women scientists in higher positions.

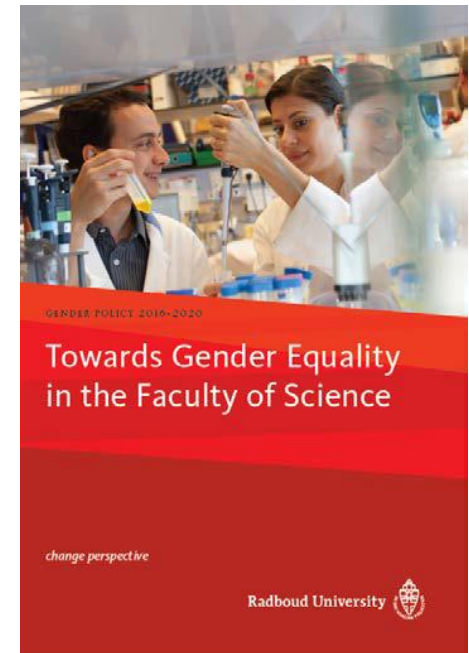
- Networking events
- Workshops
- Improve information diffusion to create awareness for opportunities
- Automatic prolongation of contracts in case of pregnancy leave for PhD students and postdocs
- Grants to go to conferences for female BSc & MSc. Students, PhD students and postdoctoral researchers at TU/e

Other activities at other universities:

Radboud University: Gender and diversity committee FNWI (since 2016)

First actions:

- 50 Keuro for pregnant women to keep activities going during leave (active)
- Mentoring for PhD, PD
- Monitor and remove gender bias in recruitment
- Exit interview
- Gathering and interpreting data
- Stimulating female students to participate in excellence programs



Working groups for each action, a new working group is formed as soon as an action is completed, many themes are discussed in monthly meetings to formulate an effective plan of action.

Radboud University: Gender and diversity committee FNWI (since 2016)

Proposal: At RU, actions that do not respect gender balance should be financially penalized

- Symposia, Workshops, PhD defenses ... with >70% members/speakers of same gender should have to pay room as externals
- Groups of more than 5 people should have at least 20% of the minority gender, or highest overheads
- Chair of search committee who does not act according to the guidelines of the RU should receive a fine on his/her salary
- Institutes that do not monitor and stimulate gender balance should not be supported in any way