

On behalf of the yHEP management board:

Alina Nasr-Esfahani, Felipe Peña, Annika Thiel, Leonel Morejon, Michael Lupberger, Pardis Niknejadi, Valerie Lang, Farah Afzal

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Young High Energy Physicist Association

- Representing early career scientists (everybody w/o permanent contract) Phd students, Postdocs, Junior Research-Group Leaders, etc.
 - Founded in 2015, currently >~300 members
- Sections \rightarrow Related to committees
 - $\circ \quad \text{Particle physics} \to \underline{\mathsf{KET}}$
 - $\circ \quad \text{Astroparticle physics} \to \underline{\mathsf{KAT}}$
 - \circ ~ Physics of Hadrons and Nucleons \rightarrow $\underline{\mathsf{KHuK}}$
 - New since the past year: Accelerator physics $\rightarrow KfB$
- yHEP with one ex-officio member in KET, KAT, KHuK (KfB ongoing)

- Goals
 - Assessing and improving situation of non-permanent scientists
 - Shaping the future of physics
 - Improvement of environmental sustainability in science
 - Networking

Contact & Info: yhep-info@desy.de Webpage LinkedIn

Become a member? Sign-up to the mailing list



yHEP Management Board (12/2021 - 12/2022)



Elected by members every year \rightarrow 2 representatives per section

Particle Physics



Valerie Lang

Chair Akad. Rat a.Z. Uni Freiburg



Michael Lupberger

Postdoc Uni Bonn



Astroparticle Physics



PhD Student Uni Wuppertal

Hadrons & Nuclei



Jun. Prof. Uni Bonn

Accelerator Physics



Felipe Peña

PhD student Uni Hamburg/ DESY



Farah Afzal

Postdoc Uni Bonn



Pardis Niknejadi

Tenure track scientist DESY

Dep. Chair

Leonel

Morejon

Postdoc Uni Wuppertal

Newly elected yHEP Management Board

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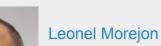
Particle Physics



Valerie Lang

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Astroparticle Physics

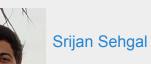
Dep. Chair

Postdoc Uni Wuppertal



Michael Lupberger

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PhD student Uni Wuppertal

Hadrons & Nuclei

Farah Afzal Postdoc

Uni Bonn

Accelerator Physics



Felipe Peña

PhD student Uni Hamburg/ DESY



Philipp Krönert PhD student Uni Bonn



Pardis Niknejadi

Tenure track scientist DESY



yHEP activities in the past year



- yHEP survey: Collecting and presenting data on young scientists' perspective
- yHEP activities involving KET/ECFA and KHuK/NuPECC
- yHEP contributions to KHuK brochure
- Other activities

yHEP survey



- Survey conducted in March 2022 among yHEP members
 - On the situation of young researchers in Germany
 - Covering the areas
 - General demographics
 - Work situation
 - Financial/contract situation
 - Work-life balance
 - Career paths
 - Diversity and Inclusion
 - Feedback
 - 131 complete responses
- Presentation of first results
 - At the RECFA visit
 - At the annual meetings this year

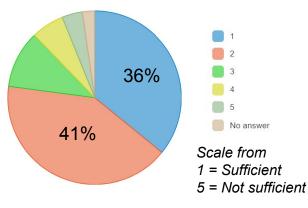
Accelerator Other physics (KfB) 8% Physics of 10 hadrons and 21% Particle nucleons 59% 27 physics (KHuK) 77 (KET) 9% 12 Astroparticle physics (KAT)

Many thanks to all who replied!

• Further analysis is still ongoing - if you are interested to contribute, please let us know!

Research and the German system

• What is appreciated and what not



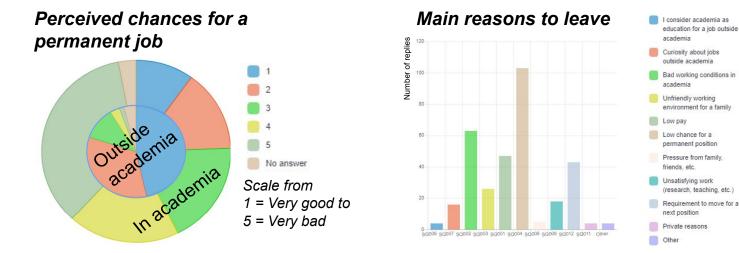
Amount of scientific freedom

Pros and cons of the German scientific system

- + Diversity and quality of research
- + Overall funding situation
- + International collaboration
- Short-term contracts (for the experts: WissZeitVG)
- Unclear long-term perspective
- Required coverage of long-term tasks (teaching, technical support, etc) by non-permanent staff with too little benefit for their career development
- (Very) Good satisfaction with the scientific freedom in Germany (77%)
- Main issues seen with short-term contracts + unclear perspective
 - More permanent (non-professor) positions would be vital!

Job chances in the field

• Chances to stay and reasons to leave



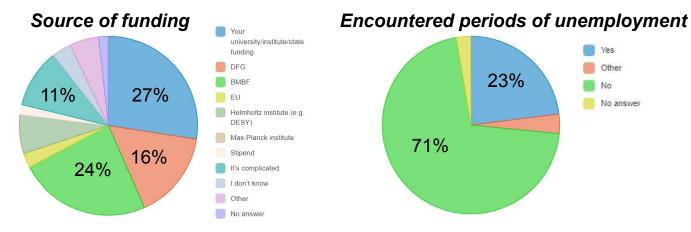
- Majority would like to stay in academia, but sees only small chances
 - Chances for positions outside of academia perceived as very positive
 - Main reasons to leave the field: Low chance for permanent job, bad working conditions, low pay



Contract situation



- About 80% of respondents with contracts <= 3 years duration
 - Variety of funding options in Germany

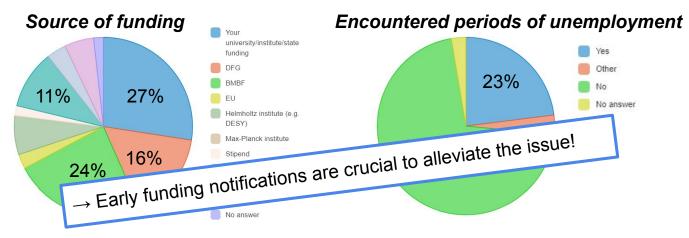


- Significant funding (40%) through BMBF or DFG \rightarrow Note: From sample of respondents!
- Funding situation is complicated in Germany → Many short-term contracts from different sources, or partial funding from different sources at the same time
- Consequence: Periods of unemployment if contracts don't exactly match end & start dates

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BMBF funding

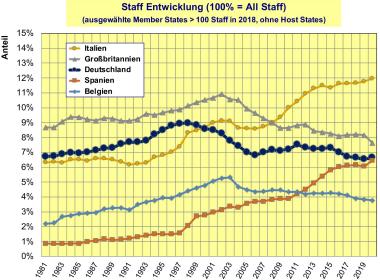


- Recap: Funding notifications from BMBF tended to arrive late
 - \circ Particularly bad situation for the funding period 2021-2024 \rightarrow Notifications arrived even after start of new funding period
 - Protest letter from yHEP sent to the BMBF in November 2021, pointing out the implications for non-permanent researchers
 - Coordinated with KET and KHuK, also informed KAT
 - \blacksquare Reply from BMBF received \rightarrow discussions via DESY-PT how to improve next time
- Joint call from yHEP, KET and KHuK
 - Move full process 3 months earlier
 → have funding notifications at latest
 3 months before start of new funding period
 - Consequence: Strategy discussion (1st step)
 3 months earlier
- Announcement of effort by BMBF in this direction for 2024-2027 at <u>KET meeting</u> → Many thanks for this!



Situation of German employment at CERN

- Germans under-represented among CERN staff
 - Mismatch between Germany's CERN budget contribution (~21) and German CERN staff (7 %)
 - CERN-Germany working group (WG) founded to address the problem
- yHEP involved in KET-BMBF and CERN-Germany WG meeting on the topic
 - Discussions from yHEP with 3 engineers/hardwarerelated researchers to identify potential issues
 - Results presented to CERN-Germany WG in September 2022
 - Positively received by BMBF
 - Fingers crossed that it will improve the situation



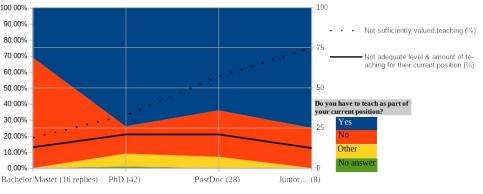
Source: DAC webpage

Teaching



- One outcome of the yHEP survey: Potential issue = Teaching
 - Dissatisfaction of young researchers with teaching situation observed \rightarrow in particular for junior research group leaders, etc.
 - From the survey how could the value of teaching be improved?
 46 replies with suggestions
 - Better comparability between universities / institutes
 - Recognition of teaching responsibilities for applications
 - Proper training in teaching
 - Honest time allocation and inclusion in job profile





For universities only

yHEP activities - ECFA and NuPECC

- European Committee for future accelerators (ECFA)
 - Visit in Germany, Berlin: <u>1 April 2022</u>
 - yHEP included with presentation on <u>Perspective of Young Scientists</u>
 - Resulting statements from the RECFA visit include <u>Executive summary</u> and <u>Letter</u>
 - \rightarrow Recommendations in relation to young researchers:
 - Keep number of PhD students with adequate salaries (i.e. increase funding accordingly)

FCFA

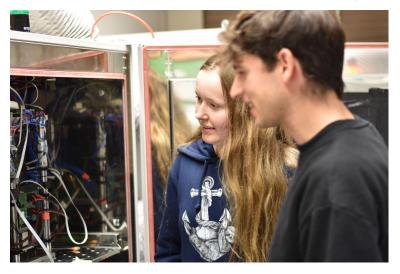
- Measures to increase the number of permanent scientist positions at universities
- Nominations for Early-Career Researcher Panel (ECR) of ECFA
- Nuclear Physics European Collaboration Committee (NuPECC)
 - yHEP wrote a letter to chair of NuPECC, proposing to also include representatives from young researchers in their committee→ positively received
 - yHEP submitted <u>contribution</u> for NuPECC LRP 2024:
 - Inclusion of direct representatives of early career researchers in NuPECC
 - Support the establishment of more groups like yHEP in other European states
 - Establish working groups with young researchers within NuPECC

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Contributions to KHuK brochure

- Chapter 13: "Wissenschaftlicher Nachwuchs f
 ür Forschung und Wirtschaft"
 - yHEP updated chapter with new paragraphs on graduate schools, summer schools, PhD prices, yHEP activities
 - you are welcome to add information (especially from Nuclear physics)
 - New pictures of young scientists taken, which can be included in brochure
- Chapter 15: "Nachhaltigkeit"
 - Sustainability in science is an important topic that should be included in the brochure

 \rightarrow Annika and Tetyana have added chapter

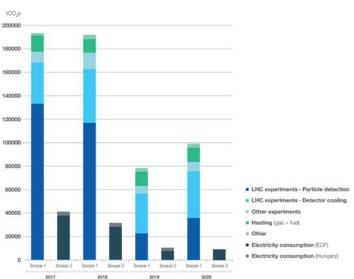




Environmental sustainability in science

YHEP association

- Bringing environmental sustainability to the forefront in HEP
 - <u>Addendum</u> to previous yHEP statement published in Dec 2021 on <u>webpage</u>
 - yHEP Campaign: "Know you footprint" in preparation → If interested to contribute, please let us know
- CERN/HEP have non-negligible impact on the environment!
- Related workshops/forums in 2022:
 - <u>Sustainable HEP Workshop 2nd edition</u> in Sept.
 - Town hall: CERN Year of Environmental Awareness: outcome and future perspectives in Sept.
 - <u>CERN and the Environment</u> in Oct.
 - ATLAS and DESY sustainability forums (re-)instantiated



Source: Vol 2: CERN Environment Report

Networking and events



- Annual yHEP meetings at DPG spring conferences in 2022
 - KET+KAT annual meeting: 23 March 2022 (Heidelberg) \rightarrow via Zoom at the end
 - KHuK+KfB annual meeting: 29 March 2022 (Mainz) \rightarrow via Zoom at the end
 - Next annual meeting in 2023: DPG spring meeting in Dresden (20th-24th March)
- Next Panel discussion: Planned on the topic of Mental Health
 - If you have ideas for good speakers, please let us know
 - Stay tuned for the announcement!
 - If interested to join, sign-up to our mailing list! \rightarrow Zoom link will be sent around there

Conclusion

- yHEP = young High Energy Physicists Association
 - Representing interests of early-career researchers in Germany →collected data by doing a survey
 - yHEP activities ECFA and NuPECC
 - Helped to update KHuK brochure
 - Looking forward to more activities in the next year with a new management board!





 \rightarrow Spread the word to PhD students, postdocs, etc \rightarrow Get in contact!

Contact & Info: yhep-info@desy.de Webpage LinkedIn Become a member? Sign-up to the mailing list

Thank you for your attention!