Matthew Black

Curriculum Vitae

Kölner Str. 17, 57072 Siegen, Germany
+49 173 9173782, DoB: 26/10/1998
Matthew.Black@uni-siegen.de
https://github.com/mbr-phys

EDUCATION

2016 -- 2020 **Master of Physics**
FIRST CLASS HONOURS
Theoretical Physics
University of Durham

2009 -- 2016 **Secondary Education**

- Advanced Highers - A in Physics, Maths, Chemistry, and English
- Highers - A in Physics, Chemistry, Biology, Maths, and English

The High School of Glasgow

POSITIONS

MARCH 2021 -- PRESENT (FT)

Universität Siegen
PhD Student

I am currently working as a PhD student in the TP1 research group for particle physics at Universität Siegen, focusing on lattice simulations of QCD. This role involves participating in research projects requiring strong dedication and focus. I work with others both within the TP1 group and internationally to complete research, and also as part of larger collaborations focused on delivering high precision lattice results. Further research interests include new physics models and quantum computation for high energy physics.

RESEARCH WORKS

See iNSPIRE-HEP/Matthew Black.

➥ O. Atkinson, **M. Black**, A. Lenz, A. Rusov and J. Wynne, *Cornering the Two Higgs Doublet Model Type II*, JHEP 04 (2022) 172, [arXiv:2107.05650 [hep-ph]]

➥ O. Atkinson, **M. Black**, C. Englert, A. Lenz, A. Rusov and J. Wynne, *The Flavourful Present and Future of 2HDMs at the Collider Energy Frontier*, JHEP 11 (2022) 139, [arXiv:2202.08807 [hep-ph]]

➥ O. Atkinson, **M. Black**, C. Englert, A. Lenz and A. Rusov, *MUonE, muon $g-2$ and electroweak precision constraints within 2HDMs*, Phys.Rev.D 106 (2022) 11 115031, [arXiv:2207.02789 [hep-ph]]

➥ **M. Black**, A. D. Plascencia and G. Tetlalmatzi-Xolocotzi, *Enhancing $B_s \to e^+e^-$ to an Observable Level in the Two-Higgs-Doublet Model*, Phys.Rev.D 107 (2023) 3 035013, [arXiv:2208.08995 [hep-ph]].

➥ **M. Black**, O. Witzel, *B Meson Decay Constants Using Relativistic Heavy Quarks*, PoS LATTICE2022 405, [arXiv:2212.10125 [hep-lat]].

COMPUTER SKILLS

INTERMEDIATE Fortran, Perl, HTML

EXPERT Python, C++, Unix, LaTeX

REFERENCES

Dr. Alexander Lenz

POSITION Chair, Professor
GROUP *Theoretical Particle Physics Group Universität Siegen*
EMAIL Alexander.Lenz@uni-siegen.de
PHONE +49 (0)271/740-3890

Dr. Oliver Witzel

POSITION Akademischer Rat
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