

**17th International Workshop
on Top Quark Physics
(TOP2024)**

Report of Contributions

Contribution ID: **12**

Type: **not specified**

Welcome drink

Sunday, 22 September 2024 19:00 (1h 30m)

Contribution ID: 13

Type: **not specified**

Welcome for the local authorities

Monday, 23 September 2024 09:00 (10 minutes)

Session Classification: Introduction

Contribution ID: 14

Type: **not specified**

Introductory information

Monday, 23 September 2024 09:25 (10 minutes)

Session Classification: Introduction

Contribution ID: 15

Type: **not specified**

Keynote

Monday, 23 September 2024 09:35 (45 minutes)

Presenter: SERVANT, Geraldine (Deutsches Elektronen-Synchrotron (DE))

Session Classification: Introduction

Contribution ID: 16

Type: **not specified**

Run 3 object reconstructions in ATLAS

Monday, 23 September 2024 11:00 (20 minutes)

Presenter: GILLES, Geoffrey (Nikhef National institute for subatomic physics (NL))

Session Classification: Cross sections

Contribution ID: 17

Type: **not specified**

Run 3 object reconstructions in CMS

Monday, 23 September 2024 11:30 (20 minutes)

Session Classification: Cross sections

Contribution ID: **18**

Type: **not specified**

Machine learning for top

Monday, 23 September 2024 12:00 (20 minutes)

Presenter: KOMM, Matthias (Deutsches Elektronen-Synchrotron (DE))

Session Classification: Cross sections

Contribution ID: 19

Type: **not specified**

Inclusive top cross sections in CMS

Monday, 23 September 2024 14:00 (20 minutes)

Presenter: DEL RIEGO BADAS, Javier (Universidad de Oviedo (ES))

Session Classification: Cross sections

Contribution ID: 20

Type: **not specified**

Inclusive top cross sections in ATLAS

Monday, 23 September 2024 14:30 (20 minutes)

Presenter: CHEN, Charlie (University of Victoria (CA))

Session Classification: Cross sections

Contribution ID: 21

Type: **not specified**

Differential top cross section in ATLAS and CMS

Monday, 23 September 2024 15:00 (20 minutes)

Presenter: BEHNKE, Olaf (Deutsches Elektronen-Synchrotron (DE))

Session Classification: Cross sections

Contribution ID: 22

Type: **not specified**

Resonance-aware NLOPS matching for off-shell $t\bar{t}+tW$ production with semileptonic decays

Monday, 23 September 2024 15:30 (20 minutes)

Presenter: JEZO, Tomas (WWU ITP)

Session Classification: Cross sections

Contribution ID: 23

Type: **not specified**

Complete NLO corrections to top-quark pair production with isolated photons

Monday, 23 September 2024 16:30 (20 minutes)

Presenter: STREMMER, Daniel (RWTH Aachen University)

Session Classification: Associated top production

Contribution ID: 24

Type: **not specified**

Photon production in top quark events at ATLAS and CMS

Monday, 23 September 2024 17:00 (20 minutes)

Presenter: RIBEIRO LOPES, Beatriz (CERN)

Session Classification: Associated top production

Contribution ID: 25

Type: **not specified**

Top quark production in association with vector bosons at ATLAS and CMS

Monday, 23 September 2024 17:30 (20 minutes)

Presenter: VAN DER LINDEN, Jan (Ghent University (BE))

Session Classification: Associated top production

Contribution ID: 26

Type: **not specified**

tt+HF (bb/cc) measurements from ATLAS and CMS

Tuesday, 24 September 2024 09:00 (20 minutes)

Presenter: ANTIPOV, Egor (Stony Brook University (US))

Session Classification: top-Higgs interplay

Contribution ID: 27

Type: **not specified**

Higgs synergies with top in ATLAS and CMS

Tuesday, 24 September 2024 09:30 (20 minutes)

Presenter: VARRIALE, Lorenzo (Univ. of Valencia and CSIC (ES))

Session Classification: top-Higgs interplay

Contribution ID: 28

Type: **not specified**

Five-flavour scheme predictions for $t\bar{t}b\bar{b}$ at next-to-leading order accuracy

Tuesday, 24 September 2024 10:00 (20 minutes)

Presenter: MOSKALETS, Tetiana (Southern Methodist University (US))

Session Classification: top-Higgs interplay

Contribution ID: 29

Type: **not specified**

ATLAS EFT results in the top quark sector

Tuesday, 24 September 2024 11:00 (20 minutes)

Presenter: KIM, Dongwon (Stockholm University (SE))

Session Classification: EFT

Contribution ID: **30**

Type: **not specified**

CMS EFT results in the top quark sector

Tuesday, 24 September 2024 11:30 (20 minutes)

Presenter: VAN DEN BOSSCHE, Niels (Ghent University (BE))

Session Classification: EFT

Contribution ID: 31

Type: **not specified**

Indirect constraints on top quark operators from a global SMEFT analysis

Tuesday, 24 September 2024 12:00 (20 minutes)

Presenter: RODRIGUEZ SANCHEZ, Antonio

Session Classification: EFT

Contribution ID: 32

Type: **not specified**

Four top final states with NLO accuracy in perturbative QCD: 4 lepton channel

Tuesday, 24 September 2024 14:00 (20 minutes)

Presenter: DIMITRAKOPOULOS, Nikolaos (Central Michigan University)

Session Classification: Searches with tops in decay

Contribution ID: 33

Type: **not specified**

Measurement and searches of four-top quark production with the ATLAS and CMS

Tuesday, 24 September 2024 14:30 (20 minutes)

Presenter: QIN, Quake (Institut de Física d'Altes Energies (IFAE))

Session Classification: Searches with tops in decay

Contribution ID: 34

Type: **not specified**

Top-philic ALP phenomenology at the LHC: the elusive mass-window

Tuesday, 24 September 2024 15:00 (20 minutes)

Presenter: MIMASU, Ken

Session Classification: Searches with tops in decay

Contribution ID: 35

Type: **not specified**

Searches for scalar particles in top quark topologies in ATLAS and CMS

Tuesday, 24 September 2024 15:30 (20 minutes)

Presenter: JONES, Eleanor (Deutsches Elektronen-Synchrotron (DE))

Session Classification: Searches with tops in decay

Contribution ID: 36

Type: **not specified**

Precise tests of the axion coupling to tops

Tuesday, 24 September 2024 16:30 (20 minutes)

Presenter: PHAN, Anh Vu ((1) Radboud University, (2) Nikhef)

Session Classification: top and BSM search

Contribution ID: 37

Type: **not specified**

Searches for top associated DM production at the LHC

Tuesday, 24 September 2024 17:00 (20 minutes)

Presenter: STAFFORD, Dominic William (Deutsches Elektronen-Synchrotron (DE))

Session Classification: top and BSM search

Contribution ID: 38

Type: **not specified**

Quantum detection of new physics in top-quark pair production at the LHC

Tuesday, 24 September 2024 17:30 (20 minutes)

Presenter: VRYONIDOU, Eleni (University of Manchester (GB))

Session Classification: top and BSM search

Contribution ID: 39

Type: **not specified**

Dark matter as the trigger of flavour changing neutral current decays of the top quark

Wednesday, 25 September 2024 09:00 (20 minutes)

Presenter: Dr JUEID, Adil (Institute for Basic Science)

Session Classification: FCNC and lepton flavor violation

Contribution ID: 40

Type: **not specified**

Comparisons of FCNC results from ATLAS and CMS

Wednesday, 25 September 2024 09:30 (20 minutes)

Presenter: ANDREA, Jeremy (Centre National de la Recherche Scientifique (FR))

Session Classification: FCNC and lepton flavor violation

Contribution ID: 41

Type: **not specified**

Probes of flavor symmetry and violation with Top quarks in ATLAS and CMS

Wednesday, 25 September 2024 10:00 (20 minutes)

Presenter: WATSON, Miriam (University of Birmingham (GB))

Session Classification: FCNC and lepton flavor violation

Contribution ID: 42

Type: **not specified**

YSF theory 1

Wednesday, 25 September 2024 11:00 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 43

Type: **not specified**

YSF CMS 1

Wednesday, 25 September 2024 11:15 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 44

Type: **not specified**

YSF ATLAS 1

Wednesday, 25 September 2024 11:30 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 45

Type: **not specified**

YSF theory 2

Wednesday, 25 September 2024 11:45 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 46

Type: **not specified**

Status of top-quark mass measurement

Thursday, 26 September 2024 09:00 (30 minutes)

Presenter: VOS, Marcel (IFIC Valencia (ES))

Session Classification: Theory mini workshop

Contribution ID: 47

Type: **not specified**

Electroweak metastability and Higgs inflation

Thursday, 26 September 2024 09:45 (20 minutes)

Presenter: MASINA, Isabella (Universita e INFN, Ferrara (IT))

Session Classification: Theory mini workshop

Contribution ID: 48

Type: **not specified**

The collider landscape: which collider for establishing the SM instability ?

Presenter: FRANCESCHINI, Roberto (Rome 3 U.)

Session Classification: Theory mini workshop

Contribution ID: 49

Type: **not specified**

Vacuum Stability in the Standard Model and Beyond

Thursday, 26 September 2024 11:45 (20 minutes)

Presenter: STEUDTNER, Tom

Session Classification: Theory mini workshop

Contribution ID: 50

Type: **not specified**

Higgs potential criticality beyond the Standard Model

Thursday, 26 September 2024 11:15 (20 minutes)

Presenter: STEINGASSER, Thomas (MIT)

Session Classification: Theory mini workshop

Contribution ID: 51

Type: **not specified**

Theory talk missing 1

Session Classification: Theory mini workshop

Contribution ID: 52

Type: **not specified**

The magic of entangled top quarks

Thursday, 26 September 2024 14:00 (20 minutes)

Presenter: WHITE, Chris (Queen Mary University of London)

Session Classification: Spin and entanglement

Contribution ID: 53

Type: **not specified**

Full quantum tomography of top quark decays

Thursday, 26 September 2024 14:30 (20 minutes)

Presenter: AGUILAR SAAVEDRA, Juan Antonio (Consejo Superior de Investigaciones Científicas (ES))

Session Classification: Spin and entanglement

Contribution ID: 54

Type: **not specified**

CMS results on top spin and entanglement

Thursday, 26 September 2024 15:00 (20 minutes)

Presenter: NEGRO, Giulia (Purdue University (US))

Session Classification: Spin and entanglement

Contribution ID: 55

Type: **not specified**

ATLAS results on top spin and entanglement

Thursday, 26 September 2024 15:30 (20 minutes)

Presenter: LYSAK, Roman (Czech Academy of Sciences (CZ))

Session Classification: Spin and entanglement

Contribution ID: **56**

Type: **not specified**

CMS Joker talk 1

Thursday, 26 September 2024 16:30 (20 minutes)

Session Classification: Joker talks

Contribution ID: 57

Type: **not specified**

ATLAS Joker talk 1

Thursday, 26 September 2024 17:00 (20 minutes)

Session Classification: Joker talks

Contribution ID: 58

Type: **not specified**

ATLAS Joker talk 2

Thursday, 26 September 2024 17:30 (20 minutes)

Session Classification: Joker talks

Contribution ID: 59

Type: **not specified**

CMS Joker talk 2

Thursday, 26 September 2024 18:00 (20 minutes)

Session Classification: Joker talks

Contribution ID: **60**

Type: **not specified**

YSF ATLAS 2

Friday, 27 September 2024 09:00 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: **61**

Type: **not specified**

YSF CMS 2

Friday, 27 September 2024 09:15 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: **62**

Type: **not specified**

YSF CMS 3

Friday, 27 September 2024 09:45 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: **63**

Type: **not specified**

YSF ATLAS 3

Friday, 27 September 2024 10:00 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 64

Type: **not specified**

Mapping the SMEFT at High-Energy Colliders: from LEP and the (HL-)LHC to the FCC-ee

Presenter: CELADA, Eugenia

Session Classification: Future

Contribution ID: 65

Type: **not specified**

Theory Summary

Friday, 27 September 2024 10:45 (45 minutes)

Presenter: Prof. CZAKON, Michal Wiktor (Rheinisch Westfaelische Tech. Hoch. (DE))

Session Classification: Summaries

Contribution ID: 66

Type: **not specified**

Experimental Summary

Friday, 27 September 2024 11:30 (45 minutes)

Presenter: JAFARI, Abideh (Isfahan University of Technology (IR))

Session Classification: Summaries

Contribution ID: 67

Type: **not specified**

Top2025 announcement

Friday, 27 September 2024 12:15 (10 minutes)

Session Classification: Last words

Contribution ID: **68**

Type: **not specified**

Closing remarks

Friday, 27 September 2024 12:25 (10 minutes)

Session Classification: Last words

Contribution ID: **69**

Type: **not specified**

YSF theory 3

Friday, 27 September 2024 09:30 (10 minutes)

Session Classification: Young Scientist Forum

Contribution ID: 70

Type: **not specified**

Mapping the SMEFT at High-Energy Colliders: from LEP and the (HL-)LHC to the FCC-ee

Tuesday, 24 September 2024 18:00 (20 minutes)

Presenter: CELADA, Eugenia

Session Classification: top and BSM search

Contribution ID: 71

Type: **not specified**

The collider landscape: which collider for establishing the SM instability ?

Thursday, 26 September 2024 10:45 (20 minutes)

Presenter: FRANCESCHINI, Roberto (Rome 3 U.)

Session Classification: Theory mini workshop

Contribution ID: 72

Type: **not specified**

Outreach talk at the médiathèque

Thursday, 26 September 2024 18:30 (1 hour)

Contribution ID: 74

Type: **not specified**

Welcome from the French institute representatives

Monday, 23 September 2024 09:10 (15 minutes)

Session Classification: Introduction