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Personal Information

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Education Information

Doctorate, Ankara University, Fen Bilimleri Enstitüsü, Fizik (Dr), Turkey 2007 - 2012

Postgraduate, Ankara University, Fen Bilimleri Enstitüsü, Fizik (YI) (Tezli), Turkey 2005 - 2007

Undergraduate, Ankara University, Fen Fakültesi, Fizik Bölümü, Turkey 2001 - 2004

Dissertations

Doctorate, Üçüncü aile sfermiyonlarının karışım, üretim ve bozunumları, Ankara University, Fen Bilimleri Enstitüsü, Fizik (Dr), 2012

Postgraduate, Elektron-pozitron çarpışmalarında rezonans ve çift üretim süreçleri, Ankara University, Fen Bilimleri Enstitüsü, Fizik (YI) (Tezli), 2007

Research Areas

Physics, High Energy Physics

Academic Titles / Tasks

Associate Professor, Ankara University, Fen Fakültesi, Fizik Bölümü, 2017 - Continues

Research Assistant, Ankara University, Fen Fakültesi, Fizik Bölümü, 2009 - 2017

Courses

Physics II, Undergraduate, 2022 - 2023

COMPUTER PROGRAMMING, Undergraduate, 2022 - 2023

PHYSICS OF FUNDAMENTAL INTERACTIONS, Postgraduate, 2022 - 2023

QUANTUM PHYSICS LABORATORY, Undergraduate, 2022 - 2023

Physics I, Undergraduate, 2022 - 2023

THEORY OF SPECIAL RELATIVITY, Undergraduate, 2022 - 2023

Fiz131-A, Undergraduate, 2016 - 2017

Fiz131-B, Undergraduate, 2016 - 2017

Fiz 226 Bilgisayar Programlama I, Undergraduate, 2015 - 2016

Fiz 121 Fizik, Undergraduate, 2015 - 2016, 2014 - 2015

Published journal articles indexed by SCI, SSCI, and AHCI

- I. **Expected sensitivity on the anomalous quartic neutral gauge couplings in $\gamma\gamma$ collisions at the CLIC**
Gutiérrez-Rodríguez A., Gurkanli E., KÖKSAL M., ARI V., Hernández-Ruíz M.
European Physical Journal Plus, vol.138, no.12, 2023 (SCI-Expanded)
- II. **Projected sensitivity to dimension-6 triple gauge couplings at the FCC-hh**
ARI V., Cetinkaya V., KÖKSAL M., ÇAKIR O.
Nuclear Physics B, vol.996, 2023 (SCI-Expanded)
- III. **Study of the projected sensitivity on the anomalous quartic gauge couplings via $Z\gamma\gamma$ production at the CLIC**
ARI V., Gurkanli E., KÖKSAL M., Gutiérrez-Rodríguez A., Hernández-Ruíz M.
Nuclear Physics B, vol.989, 2023 (SCI-Expanded)
- IV. **Investigating top-Higgs FCNC couplings at the FCC-hh**
Ozsimek O. M., Ari V., Çakır O.
NUCLEAR PHYSICS B, vol.983, 2022 (SCI-Expanded)
- V. **Future projections on the anomalous WW gamma gamma couplings in hadron-hadron interactions at the FCC-hh**
Gutierrez-Rodriguez A., Ari V., Gurkanli E., Koksals M., Hernandez-Ruiz M. A.
JOURNAL OF PHYSICS G-NUCLEAR AND PARTICLE PHYSICS, vol.49, no.10, 2022 (SCI-Expanded)
- VI. **Studying Same-Sign Top Pair Production through Top-Higgs FCNC Interactions at the HL-LHC**
Ozsimek O., Ari V., Çakır O.
Advances in High Energy Physics, vol.2022, 2022 (SCI-Expanded)
- VII. **Single production of vectorlike Y quarks at the HL-LHC**
Cetinkaya V., OZANSOY A., ARI V., ÖZŞİMŞEK Ö. M., ÇAKIR O.
Nuclear Physics B, vol.973, 2021 (SCI-Expanded)
- VIII. **The Large Hadron-Electron Collider at the HL-LHC**
Agostini P., Aksakal H., Alekhin S., Allport P. P., Andari N., Andre K. D. J., Angal-Kalinin D., Antusch S., Aperio Bella L., Apolinario L., et al.
JOURNAL OF PHYSICS G-NUCLEAR AND PARTICLE PHYSICS, vol.48, no.11, 2021 (SCI-Expanded)
- IX. **Analysis of the anomalous quartic WWWW couplings at the LHeC and the FCC-he**
Gurkanli E., Ari V., Billur A. A., Koksals M.
EUROPEAN PHYSICAL JOURNAL PLUS, vol.136, no.7, 2021 (SCI-Expanded)
- X. **Study on the anomalous quartic $W+W-$ gamma gamma couplings of electroweak bosons in $e(-) p$ collisions at the LHeC and the FCC-he**
Gutierrez-Rodriguez A., Hernandez-Ruiz M. A., Gurkanli E., Ari V., Koksals M.
EUROPEAN PHYSICAL JOURNAL C, vol.81, no.3, 2021 (SCI-Expanded)
- XI. **Sensitivity physics expected to the measurement of the quartic WW gamma gamma couplings at the LHeC and the FCC-he**
Gurkanli E., Ari V., Gutierrez-Rodriguez A., Hernandez-Ruiz M. A., Koksals M.
JOURNAL OF PHYSICS G-NUCLEAR AND PARTICLE PHYSICS, vol.47, no.9, 2020 (SCI-Expanded)
- XII. **Model independent study for the anomalous quartic WW gamma gamma couplings at future electron-proton colliders**
Ari V., Gurkanli E., Billur A. A., Koksals M.
NUCLEAR PHYSICS B, vol.957, 2020 (SCI-Expanded)
- XIII. **Anomalous quartic $W+W-$ gamma gamma couplings in $e(-) p$ collisions at the LHeC and the FCC-he**
ARI V., Gurkanli E., Gutierrez-Rodriguez A., Hernandez-Ruiz M. A., Koksals M.
EUROPEAN PHYSICAL JOURNAL PLUS, vol.135, no.3, 2020 (SCI-Expanded)

- XIV. **FCC-hh: The Hadron Collider: Future Circular Collider Conceptual Design Report Volume 3**
 Abada A., Abbrescia M., AbdusSalam S., Abdyukhanov I., Abelleira Fernandez J., Abramov A., Aburaia M., Acar A., Adzic P., Agrawal P., et al.
 EUROPEAN PHYSICAL JOURNAL-SPECIAL TOPICS, vol.228, no.4, pp.755-1107, 2019 (SCI-Expanded)
- XV. **HE-LHC: The High-Energy Large Hadron Collider Future Circular Collider Conceptual Design Report Volume 4**
 Abada A., Abbrescia M., AbdusSalam S., Abdyukhanov I., Abelleira Fernandez J., Abramov A., Aburaia M., Acar A., Adzic P., Agrawal P., et al.
 EUROPEAN PHYSICAL JOURNAL-SPECIAL TOPICS, vol.228, no.5, pp.1109-1382, 2019 (SCI-Expanded)
- XVI. **FCC-ee: The Lepton Collider: Future Circular Collider Conceptual Design Report Volume 2**
 Abada A., Abbrescia M., AbdusSalam S., Abdyukhanov I., Abelleira Fernandez J., Abramov A., Aburaia M., Acar A., Adzic P., Agrawal P., et al.
 EUROPEAN PHYSICAL JOURNAL-SPECIAL TOPICS, vol.228, no.2, pp.261-623, 2019 (SCI-Expanded)
- XVII. **FCC Physics Opportunities: Future Circular Collider Conceptual Design Report Volume 1**
 Abada A., Abbrescia M., AbdusSalam S., Abdyukhanov I., Fernandez J. A., Abramov A., Aburaia M., Acar A., Adzic P., Agrawal P., et al.
 EUROPEAN PHYSICAL JOURNAL C, vol.79, no.6, 2019 (SCI-Expanded)
- XVIII. **Anomalous WW gamma couplings with beam polarization at the Compact Linear Collider**
 ARI V., Billur A. A., Inan S. C., Koksals M. M.
 NUCLEAR PHYSICS B, vol.906, pp.211-230, 2016 (SCI-Expanded)
- XIX. **Search for Excited Spin-3/2 Neutrinos at LHeC**
 OZANSOY A., ARI V., Cetinkaya V.
 ADVANCES IN HIGH ENERGY PHYSICS, vol.2016, 2016 (SCI-Expanded)
- XX. **Search for Anomalous Quartic ZZ gamma gamma Couplings in Photon-Photon Collisions**
 Koksals M., ARI V., Senol A.
 ADVANCES IN HIGH ENERGY PHYSICS, vol.2016, 2016 (SCI-Expanded)
- XXI. **Effects of the FCNC Couplings in Production of New Heavy Quarks within Z' Models at the LHC**
 Cetinkaya V., ARI V., Cakir O.
 Advances in High Energy Physics, vol.2016, 2016 (SCI-Expanded)
- XXII. **Search for HZZ' couplings at the LHC**
 ARI V., Cakir O., Kuday S.
 EPL, vol.108, no.1, 2014 (SCI-Expanded)
- XXIII. **Pair production of new heavy leptons with U(1)' charge at linear colliders**
 ARI V., Cakir O., KUDAY S.
 International Journal of Modern Physics A, vol.29, no.11-12, 2014 (SCI-Expanded)
- XXIV. **Forward-backward asymmetries of fourth family fermions through the Z' models at linear colliders**
 ARI V., Cakir O., Cetinkaya V.
 Physical Review D - Particles, Fields, Gravitation and Cosmology, vol.87, no.3, 2013 (SCI-Expanded)
- XXV. **Pair production of tau sneutrinos at linear colliders**
 ARI V., Cakir O.
 Modern Physics Letters A, vol.26, no.24, pp.1783-1796, 2011 (SCI-Expanded)
- XXVI. **Pair production of the fourth family charged sleptons at e+e- colliders**
 ARI V., Cakir O., Cakir I. T., Sultansoy S.
 EPL, vol.94, no.2, 2011 (SCI-Expanded)

Books & Book Chapters

I. Nükleer Kararsızlık

ALĞIN E., REYHANCAN İ. A., AYDIN A., KAPLAN A., BOZKURT A., ÇAKIR M. A., KARA A., KAYIŞ TOPAKSU A., DEMİR B., TEL E., et al.

Refereed Congress / Symposium Publications in Proceedings

- I. **Search for Higgs Effective Couplings at Photon Induced Reactions**
ÇETİNKAYA V., ARI V., BİLLUR A. A., Samancı C.
International Conference on Innovative Engineering Applications, 20 - 22 September 2018
- II. **Probing the Anomalous Quartic ZZ Couplings in the Future Linear Colliders**
KÖKSAL M., ARI V., ŞENOL A.
IX. INTERNATIONAL WORKSHOP ON NUCLEAR STRUCTURE PROPERTIES, 1 - 03 September 2016
- III. **Büyük Hadron Çarpıştırıcısı nda LHC Higgs Bozonunun Standart Model Ayar Bozonları İle Olan Anomal Bağlaşımlarının Araştırılması**
ARI V.
Fizik Adım Günleri IV, Turkey, 28 May 2015
- IV. **Bu yu k Hadron C arpı tırıcısında Yeni Ag ır Kuark U retimine C es ni Deg is tiren Yu ksu z Akım Bag las ımlarının Etkisi**
ÇETİNKAYA V., ARI V., ÇAKIR O.
Adım Fizik Günleri IV, Turkey, 28 May 2015
- V. **Büyük Hadron Çarpıştırıcısı'nda HZZ' Bağlaşımlarının Ölçümü**
KUDAY S., ARI V., ÇAKIR O.
Ankara Yüksek Enerji Fiziği Günleri, Ankara, Turkey, 12 - 14 February 2015
- VI. **Fourth Family Quarks Forward Backward Asymmetry Within the Z Models at Linear Colliders**
ARI V., ÇETİNKAYA V., ÇAKIR O.
Turkish Physical Society 28th International Physics Congress, 06 September 2011
- VII. **Pair Production of TauSneutrinos at Linear Colliders**
ARI V., ÇAKIR O.
Turkish Physical Society 27th International Physics Congress, 14 September - 17 April 2010

Metrics

Publication: 38
Citation (WoS): 1607
Citation (Scopus): 2007
H-Index (WoS): 7
H-Index (Scopus): 8