

Публикации Лаборатории Релятивистской Ядерной Физики

ОФВЭ ПИЯФ за 2015 год в журналах

1. **Testing the prototype detectors for the muon tracking system of the CBM experiment on the proton beam of the PNPI accelerator at high counting rates**
E.V. Atkin *et al.*. 2015. 6 pp.
Published in **Instrum.Exp.Tech.** **58** (2015) **6**, 726-731
2. **A study of the coordinate gas-filled detectors based on the Micromegas and Micromegas + GEM/TGEM technologies for the muon tracking system of the CBM experiment**
E.V. Atkin (Moscow Phys. Eng. Inst.) *et al.* . 10 pp.
Published in **Instrum.Exp.Tech.** **58** (2015) **5**, 602-611, **Prib.Tekh.Eksp.** **2015** (2015) **5**, 20-30
3. **Unique Spectrometer Experiments with the Super-FRS at FAIR**
J. Äystö *et al.*. 2015. 7 pp.
Published in **JPS Conf.Proc.** **6** (2015) **020035**
4. **Coherent $\psi(2S)$ photo-production in ultra-peripheral Pb Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) *et al.*). 13 pp.
Published in **Phys.Lett.** **B751** (2015) **358-370**
5. **Precision measurement of the mass difference between light nuclei and anti-nuclei**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) *et al.*). 16 pp.
Published in **Nature Phys.** **11** (2015) **10**, 811-814
6. **Measurements of elliptic and triangular flow in high-multiplicity ${}^3\text{He}+\text{Au}$ collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) *et al.*). 9 pp.
Published in **Phys.Rev.Lett.** **115** (2015) **14**, 142301
7. **ϕ meson production in $d+\text{Au}$ collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) *et al.*). 14 pp.
Published in **Phys.Rev.** **C92** (2015) **4**, 044909
8. **One-dimensional pion, kaon, and proton femtoscopy in Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) *et al.*). 15 pp.
Published in **Phys.Rev.** **C92** (2015) **5**, 054908

9. **Measurement of jet quenching with semi-inclusive hadron-jet distributions in central Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 37 pp.
 Published in **JHEP 1509 (2015) 170**

10. **Investigation of the structure of light exotic nuclei by proton elastic scattering in inverse kinematics**
 G.D. Alkhazov, A.A. Vorobyov, A.V. Dobrovolsky, A.G. Inglessi, G.A. Korolev, A.V. Khanzadeev. 2015. 6 pp.
 Published in **Phys.Atom.Nucl. 78 (2015) 3, 381-386, Yad.Fiz. 78 (2015) 5, 411–416**

11. **Measurement of charm and beauty production at central rapidity versus charged-particle multiplicity in proton-proton collisions at $\sqrt{s_{NN}} = 7$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 39 pp.
 Published in **JHEP 1509 (2015) 148**

12. **Inclusive, prompt and non-prompt J/ ψ production at mid-rapidity in Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 28 pp.
 Published in **JHEP 1507 (2015) 051**

13. **Systematic study of charged-pion and kaon femtoscopy in Au + Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
 PHENIX Collaboration (A. Adare (Colorado U.) et al.). 21 pp.
 Published in **Phys.Rev. C92 (2015) 3, 034914**

14. **A study of the coordinate gas-filled detectors based on the GEM and TGEM technologies for the muon tracking system of the CBM experiment**
 E.V. Atkin (Moscow Phys. Eng. Inst.) et al.. 9 pp.
 Published in **Instrum.Exp.Tech. 58 (2015) 2, 197-205, Prib.Tekh.Eksp. 2015 (2015) 2, 32-40**

15. **Measurement of pion, kaon and proton production in proton–proton collisions at $\sqrt{s_{NN}} = 7$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 33 pp.
 Published in **Eur.Phys.J. C75 (2015) 5, 226**

16. **Coherent p0 photoproduction in ultra-peripheral Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 23 pp.
 Published in **JHEP 1509 (2015) 095**

17. **Rapidity and transverse-momentum dependence of the inclusive J/ ψ nuclear modification factor in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
 ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 27 pp.
 Published in **JHEP 1506 (2015) 055**

18. **Measurement of dijet k_T in p–Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 11 pp.
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19. **Measurement of charged jet production cross sections and nuclear modification in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 14 pp.
Published in **Phys.Lett. B749 (2015) 68-81**
20. **Measurement of jet suppression in central Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 14 pp.
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21. **Two-pion femtoscopy in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (J. Adam (Prague, Tech. U.) et al.). 28 pp.
Published in **Phys.Rev. C91 (2015) 034906**
22. **Forward-backward multiplicity correlations in pp collisions at $\sqrt{s_{NN}} = 0.9, 2.76$ and 7 TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 23 pp.
Published in **JHEP 1505 (2015) 097**
23. **Centrality dependence of particle production in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). 28 pp.
Published in **Phys.Rev. C91 (2015) 6, 064905**
24. **Systematic Study of Azimuthal Anisotropy in Cu+Cu and Au+Au Collisions at $\sqrt{s_{NN}} = 62.4$ and 200 GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev. C92 (2015) 3, 034913**
25. **Inclusive photon production at forward rapidities in proton-proton collisions at $\sqrt{s_{NN}} = 0.9, 2.76$ and 7 TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 24 pp.
Published in **Eur.Phys.J. C75 (2015) 4, 146**
26. **Charged jet cross sections and properties in proton-proton collisions at $\sqrt{s_{NN}} = 7$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 33 pp.
Published in **Phys.Rev. D91 (2015) 11, 112012**
27. **Production of inclusive Y(1S) and Y(2S) in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 13 pp.
Published in **Phys.Lett. B740 (2015) 105-117**
28. **Charged-pion cross sections and double-helicity asymmetries in polarized p+p collisions at $\sqrt{s_{NN}} = 200$ GeV**
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29. **Search for dark photons from neutral meson decays in p+p and d + Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
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30. **Production of $\Sigma(1385)\pm$ and $\Xi(1530)0$ in proton-proton collisions at $\sqrt{s_{NN}} = 7$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 30 pp.
Published in **Eur.Phys.J. C75 (2015) 1, 1**
31. **Elliptic flow of identified hadrons in Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 81 pp.
Published in **JHEP 1506 (2015) 190**
32. **Measurement of electrons from semileptonic heavy-flavor hadron decays in pp collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.). 13 pp.
Published in **Phys.Rev. D91 (2015) 1, 012001**
33. **Cross section for $b\bar{b}$ production via dielectrons in d+Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev. C91 (2015) 1, 014907**
34. **Centrality dependence of low-momentum direct-photon production in Au+Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev. C91 (2015) 6, 064904**
35. **Heavy-quark production and elliptic flow in Au+Au collisions at $\sqrt{s_{NN}} = 62.4$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev. C91 (2015) 4, 044907**
36. **Measurement of long-range angular correlation and quadrupole anisotropy of pions and (anti)protons in central d+Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev.Lett. 114 (2015) 19, 192301**
37. **Measurement of $Y(1S+2S+3S)$ production in p+p and Au+Au collisions at $\sqrt{s_{NN}} = 200$ GeV**
PHENIX Collaboration (A. Adare (Colorado U.) et al.).
Published in **Phys.Rev. C91 (2015) 2, 024913**
38. **$K^*(892)0$ and $\phi(1020)$ production in Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Betty Bezverkhny Abelev (LLNL, Livermore) et al.).
Published in **Phys.Rev. C91 (2015) 024609**

39. **Nuclear gluon densities at small x from photoproduction of J/ ψ in ultraperipheral ion collisions at the LHC**
V.A. Guzey, M.B. Zhalov (St. Petersburg, INP). 2015. 9 pp.
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40. **Measuring nuclear modification factors for ϕ -mesons in p + Pb and Pb + Pb collisions in the ALICE experiment at the large hadron collider**
V.M. Samsonov, V.G. Riabov, Yu.G. Riabov (St. Petersburg Polytechnic Inst. & St. Petersburg, INP), M.V. Malaev (St. Petersburg, INP). 2015. 3 pp.
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41. **Creation of light hadrons in Cu + Au interactions at an energy of 200 GeV**
Ya.A. Berdnikov (St. Petersburg Polytechnic Inst.), D.A. Ivanishchev (St. Petersburg, INP), D.O. Kotov (St. Petersburg Polytechnic Inst.), V.G. Riabov, Yu.G. Riabov, V.M. Samsonov (St. Petersburg, INP), A.S. Safonov (St. Petersburg Polytechnic Inst.). 2015. 4 pp.
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42. **Recent results from PHENIX on jet suppression and direct photon production**
PHENIX Collaboration (Victor Germanovich Riabov (St. Petersburg, INP) for the collaboration). 2015.
Published in **PoS BaldinISHEPPXXII (2015)** **078**
43. **Centrality dependence of high-pT D meson suppression in Pb-Pb collisions at $\sqrt{s_{NN}} = 2.76$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). Jun 22, 2015. 21 pp.
Published in **JHEP** **1511** (2015) 205
- 44 **Centrality dependence of inclusive J/ ψ production in p-Pb collisions at $\sqrt{s_{NN}} = 5.02$ TeV**
ALICE Collaboration (Jaroslav Adam (Prague, Tech. U.) et al.). Jun 29, 2015. 29 pp.
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