

# Research grants and contracts in 2016

## C1. International grants and research contracts

### Project teams in the doctorate domain System Engineering

#### Theodor Borangiu and Ph.D students

1. Big Data, Analytics and Cloud for Digital Transformation on Manufacturing (DTM), IBM Faculty Awards National IBM Research Grant 2016-2017, Ph.D. student in the team: A. Silisteanu

#### Sergiu Stelian Iliescu and Ph.D students

2. Proactive Risk Management through Improved Cyber Situational Awareness, proiect H2020-DS-2015-1, 2016-2019, Ph.D. student in the team: M. Barbulescu

#### Ion Necoară and Ph.D students

3. Programme de cooperation scientifique entre L'Academie roumaine, WBI et le FRS/FNRS, Universite Catholique Louvain, Belgium, 2016-2018, director proiect (UPB) On Necoara Ph.D. student in the team: Clipici, D.

#### Dan Ștefănoiu and Ph.D students

4. Advanced Control Technique for Launchers Flight Control Systems, Code, ESA-4000109427/13/F/JLV, Contract with the European Space Agency (ESA), 2014-2016, D. Ștefănoiu member, Ph.D. student in the team: E.M. Cimpoesu

### Project teams in the doctorate domain Computers and Information Technology

#### Valentin Cristea and Ph.D students

5. Data4Water: Excellence in Smart Data and Services for Water Management, H2020-TWINN-2015, ID: 690900, Director: Prof.dr.ing. Mariana Mocanu (UPB), Perioada de desfasurare: Jan. 2016 – Dec. 2019, V. Cristea member, Ph.D. student in the team: Huru, A.D.
6. AESOP – A European and South African Partnership on Heritage and Past, International Erasmus Mundus, 2013 – 2017, V. Cristea member, Ph.D. student in the team: Petre A.C.

#### Ciprian Dobre and Ph.D students

7. ICT COST Action IC1303, Algorithms, Architectures and Platforms for Enhanced Living Environments” (AAPELE), proiect EU COST. Resposanbil de rețeaua națională de cercetare în acțiune și reprezentat în Comitetul de Management al Acțiunii: Ciprian Dobre (UPB). Nov. 2013 – Nov. 2017, Ph.D. students in the team: Stanciu, V.D., Dragoi, V.A.
8. ICT COST Action IC1406, “High-Performance Modelling and Simulation for Big Data Applications” (cHiPSet), proiect EU COST, 2014-2017, C. Dobre Responsabil pentru rețeaua națională de cercetare și member in the Management Committee (coordinator of the Romanian partner), Ph.D. student in the team: Borcea, L.
9. COST Action CA15127, “Resilient communication services protecting end-user applications from disaster-based failures (RECODIS)”, 2016-2020, C. Dobre representative for Romania, Ph.D. student in the team: Hirtan, L.A.
10. COST Action CA15140, “Improving Applicability of Nature-Inspired Optimisation by Joining Theory and Practice (ImAppNIO)”, 2016-2020, C. Dobre representative for Romania, Ph.D. student in the team: Popescu, M.C.

11. Data4Water – Excellence in Smart Data and Services for Supporting Water Management, H2020-TWINN-2015, 2016-2019, Director: Prof.dr.ing. Mariana Mocanu (UPB). C. Dobre coordinator UPB for WP4, Ph.D. student in the team: Michiu, G.

#### **Adina Florea and Ph.D students**

12. CAMI – Artificially intelligent ecosystem for self-management and sustainable quality of life in AAL, International project, AAL, June 2015 – May 2018. Partners: Universitatea POLITEHNICA din Bucuresti, Centrul IT pentru Stiinta si Tehnologie (Romania), Mälardalen University (Sweden), CNet Svenska AB (Sweden), Ecotopias (Denmark), Aliviate Development ApS (Denmark), ECLEXYS Sagl (Switzerland), Knowledge Society Association (Poland), Adina Florea project director, Ph.D students in the team: Nica, A.C., Haller, E.

#### **Nicolae Goga and Ph.D students**

13. Grant Eureka Erasmus Mundus, Fellowships for Postdoc / PhD / MSc / Bachelor between Latin America and Europe, 2013-2016, N. Goga coordinator UPB, and Ph.D student in the team: Dragici, I.C.

#### **Florica Moldoveanu and Ph.D students**

14. HAI-OPS – Hospital Acquired Infection and Outbreak Prevention System, Proiect international Eurostars, applied research, ID proiect: E!9831 – HAI-OPS, Dec. 2015 – Dec. 2018, A. Moldoveanu (Coordinator), Florica Moldoveanu (Member), Ph.D student in the team: O. Ferche
15. Sound of Vision – Natural sense of vision through acoustics and haptics, proiect international, Horizon 2020, ID proiect 643636, 2015 – 2018. Alin Moldoveanu (Coordinator), Florica Moldoveanu (Member), Ph.D students in the team: O. Ferche, A. Grădinaru
16. DECAMP – Open Distributed European Virtual Campus on ICT Security ([www.myDECAMP.eu](http://www.myDECAMP.eu)), International project, Erasmus+, September 2014 – August 2017, Florica Moldoveanu (Coordinator), Ph.D students in the team: A. Grădinaru, O. Ferche

#### **Dragoş Niculescu and Ph.D students**

17. Superfluidity: a super-fluid, cloud-native, converged edge system – SUPER-FLUIDITY, proiect H 2020, 2015-2017, D. Niculescu member, Ph.D student in the team: Lup, C.I.

#### **Florin Pop and Ph.D students**

18. ICT COST Action IC1302, Semantic keyword-based search on structured data sources (KEYSTONE), proiect EU COST. Resposanbil de Reţeaua Naţională în Comitetul de Management al Acţiunii: Florin Pop (UPB). Nov. 2013 – Nov. 2017, Ph.D students in the team: Vasile, M.A., Groza, L.M.
19. ICT COST Action CA15140, "Improving Applicability of Nature-Inspired Optimisation by Joining Theory and Practice" (ImAppNIO), proiect EU COST. Reprezentat ca Member of the Management Committee (coordinator of the Romanian partner): Florin Pop (UPB). WG 4 (Software), 2016 – 2020, Ph.D students in the team: Vasile, M.A., Groza, L.M.
20. Data4Water: Excellence in Smart Data and Services for Water Management, H2020-TWINN-2015, ID: 690900, Director: Mariana Mocanu (UPB), 2016 -2019, F. Pop member, Ph.D student in the team: Iordache, G.V.
21. ICT COST Action IC1303, Algorithms, Architectures and Platforms for Enhanced Living Environments" (AAPELE), proiect EU COST. Responsible with the national research network and representative of the Management Committee: C. Dobre (UPB), 2013 – 2017, F. Pop member, Ph.D students in the team: Apostol, G.C., Palanciuc, M.D.M.
22. ICT COST Action CA15127, "Resilient communication services protecting end-user applications from disaster-based failures" (RECODIS), proiect EU COST, May 2016 – April 2020, F. Pop member, Ph.D student in the team: Tudorica, C.A.
23. ICT COST Action IC1406, "High-Performance Modelling and Simulation for Big Data Applications" (cHiPSet), proiect EU COST. Responsible with the national research network and representative of the Management Committee (responsible of the Romanian partner): Ciprian Dobre (UPB). 2015 – 2019, F. Pop member, Ph.D student in the team: Ionica, D.G.
24. ICT COST Action IC1403, "Cryptanalysis of ubiquitous computing systems (CRYPTACUS)", proiect EU COST. Responsible with the national research network and representative of the Management Committee (responsible of the Romanian partner): George Pantelimon Popescu (UPB). 2013 – 2017, F. Pop member, Ph.D student in the team: Apostol G.C.

### **Nirvana Popescu and Ph.D students**

25. Sound of Vision – Natural sense of vision through acoustics and haptics, proiect international, Horizon 2020, ID proiect 643636, 2015 – 2018. A. Moldoveanu (Coordinator), Nirvana Popescu (Member), Ph.D student in the team: Maracine, M.

### **Adriana Țăpuș and Ph.D students**

26. Physiological state, deception and trust detection in HRI by using a mixture of Thermal and RGB-D cameras, proiect ENSTA, France, 2016, Project Coordinator Adriana Tapus, Ph.D student in the team: D.O. Iacob

### **Nicolae Țăpuș and Ph.D students**

27. DATA4WATER – Excellence in Smart Data and Services for Supporting Water Management, proiect H2020-TWINN-2015, 2016-2018, N. Tapus member, Ph.D students in the team: Vasilescu, L.M., Vasilescu, M.
28. KEYSTONE – Semantic keyword-based search on structured data sources, Project COST, Nov. 2013 – Nov. 2017, N. Tapus member, Ph.D student in the team: Lupescu, G.
29. AESOP – A European and South African Partnership on Heritage and Past, International project, Erasmus Mundus, 2013 – 2017, N. Tapus project director, Ph.D students in the team: Duta, C.-L., Carabas, C.

### **Ștefan Trăușan-Matu and Ph.D students**

30. Realizing an Applied Gaming Eco-system (RAGE), proiect H2020-ICT-2014/H2020-ICT-2014-1 No. 644187, 2015-2019, project coordinator S. Trausan-Matu, Ph.D students in the team: Rinciog, O., Ruseti, S.
31. Early Nutrition eAcademy Southeast Asia (ENeASEA) ERASMUS+, 2016-2018, project coordinator S. Trausan-Matu, Ph.D students in the team: M.G. Gutu, I.C. Paraschiv
32. DMKM Erasmus Mundus Master, 2011-2016, project Coordinator S. Trausan-Matu, Ph.D students in the team: C.I. Badea

## **C2. National grants and research contracts**

### **Project teams in the doctorate domain System Engineering**

#### **Neculai Andrei and Ph.D students**

1. Analiza, evaluare și decizie pentru managementul Cloud Computing, Proiect PN 16 09 03 01, ICI Bucharest, Contract Nr. 36N/2016, 2016-2017, Neculai Andrei project director, Ph.D students in the team: N.D. Nicolau

#### **Cătălin Buiu and Ph.D students**

2. Bioinspired techniques for robotic swarms security, Contract PCE-2012, 2013-2016, Catalin Buiu project director, Ph.D students in the team: A.G. Florea, M. Gânsari
3. Audio-video station for automatic detection of meteors (ALLSKY)", PCCA, 2012-2016, Catalin Buiu project director, Ph.D students in the team: A.G. Florea

#### **Bogdan Dumitrescu and Ph.D students**

2. Sparse representations and signal processing applications, grant IDEI 2011-2016, CNCSIS, Romania, Project Director Bogdan Dumitrescu, Ph.D students in the team: P. Irofti, T. Cioaca

#### **Sergiu Stelian Iliescu and Ph.D students**

2. Sistem inteligent de asistare a deciziilor aplicat în rețelele electrice de joasă tensiune cu producere distribuită din surse de energie regenerabilă, proiect PN II PT-PCCA-2011-3, 2012-2016, S.S. Iliescu – project director UPB, Ph.D students in the team: M. Puianu
3. Dispecerizarea consumului într-o rețea electrica de distribuție, grant GEX 2016-2017, Arghira N. – project director, S.S. Iliescu – member, Ph.D students in the team: B. Godeanu, M. Ionescu

#### **Ion Necoara and Ph.D students**

2. Modeling, Control and Optimization for Big Data Systems (MoCOBiDS), PN II – RU – TE 2014, UEFISCDI, Romania, contract nr. 176/01.10.2015, project director (UPB) Ion Necoara, Ph.D students in the team: A. Patrascu

#### **Cristian Oară and Ph.D students**

8. Robust control in nonstandard cases, Grant PN-II-ID-PCE-2011-3-0235, 2011-2016, project director Cristian Oara, Ph.D students in the team: C. Flutur, F.S. Tudor

#### **Dan Popescu and Ph.D students**

9. Multisensory robotic system for aerial monitoring of critical infrastructure systems, Program CDI STAR, contract ROSA nr. 71/2013, 2013-2016, project director D. Popescu, Ph.D students in the team: C. Dragana, A. Sumalan, D. Gornea
10. Multi-drone system for the assessment of the flood effects (SIMUL), grant program BRIDGE, UEFISCDI, 2016-2018, project director D. Popescu, Ph.D students in the team: C. Dragana, A. Sumalan, D. Gornea

#### **Dumitru Popescu and Ph.D students**

11. Ecosistem de cercetare, inovare și dezvoltare de produse și servicii TIC pentru o societate conectată la Internet of Things- NETIO, ID-40. 270, Project POC 2014-2020, partnership through spin-off, CE&E, Project director D.Popescu, Ph.D students in the team: Miron, C., Catana, A.
12. Monitorizarea și Controlul de la Distanță al unui UPQC Instalat într-un Nod PCC de Cuplare la Rețeaua Electrică Publică Joasă Tensiune (Configurație Microgrid), Contract ICMET Craiova, 2016, Project director D.Popescu, Ph.D student in the team: Iriza, I.R.

#### **Dan Ștefănoiu and Ph.D students**

11. High Performance Computing of Personalized Cardio Component Models, Code HEART-130/2012, Grant UEFISCDI, 2012-2016, D. Ștefănoiu member, Ph.D student in the team: M. Nicula

#### **Project teams in the doctorate domain Computers and Information Technology**

##### **Valentin Cristea and Ph.D students**

11. MobiWay – Platformă Integrată pentru Sistemele de Transport Inteligent ale Viitorului, Proiect de parteneriat CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 16 / 2014, 2014 – 2016, project director: Ciprian Dobre (UPB), V. Cristea member, Ph.D student in the team: C. Gosman
12. CyberWater – Prototype Cyberinfrastructure-based System for Decision-Making Support in Water Resources Management – CyberWater, National PNII – Parteneriate PCCA 1, ID: PNII – Parteneriate PCCA 1 no. 47/2012, UEFISCDI, V. Cristea project director, Ph.D students in the team: S. Ciolofan
13. ClueFarm – Information system based on cloud services, accessible through mobile devices, for quality improvement of products and business development in farms, Project Parteneriat, CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 29/2014. Project director: Valentin Cristea (UPB), 2014 – 2016, Ph.D students in the team: Marin, R.-C, Nitulescu, C.B.

##### **Ciprian Dobre and Ph.D students**

11. MobiWay – Platformă Integrată pentru Sistemele de Transport Inteligent ale Viitorului, Proiect de parteneriat CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 16 / 2014, 2014-2017, project director C. Dobre, Ph.D student in the team a: Borcea, L.

12. ClueFarm – Information system based on cloud services, accessible through mobile devices, for quality improvement of products and business development in farms, Proiect de parteneriat, CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 29/2014, project director: V. Cristea (UPB), 2014 – 2016, C. Dobre member, Ph.D student in the team: Stanciu, V.D.

#### **Adina Florea and Ph.D students**

19. Mobile@Old – Mobility pattern assistant for elderly people, ID proiect PN-II-PT-PCCA-2013-4-2241, 2014 – 2016. Partners: University POLITEHNICA of Bucharest, IT Center for Science and Technology, University Babes-Bolyai Cluj-Napoca, University Stefan cel Mare Suceava, Adina Florea member, Ph.D student in the team: Codreanu, I.A.

#### **Florica Moldoveanu and Ph.D. students**

20. TRAVEE – Terapeut Virtual prin Feedback Augmentat pentru Recuperarea Neuromotorie, proiect national PN-II, ID proiect 1/2014(PN-II-PT-PCCA-2013-4-1580), 2014 – 2017, Alin Moldoveanu (Coordinator), Florica Moldoveanu (Member), Ph.D students in the team: O. Ferche, A. Grădinaru

#### **Dragoș Niculescu and Ph.D students**

21. 4.5G service based on MPTCP – 4.5G, proiect national in Program PN III, 2017-2018, D. Niculescu project director, Ph.D students in the team: Lupu, C.C.

#### **Florin Pop and Ph.D students**

22. DataWay – Real-time Data Processing Platform for Smart Cities: Making sense of Big Data, PN-II-RU-TE-2014-4-2731, 2015-2017, Project director: Florin Pop, Ph.D students in the team: Ionica D.G.
23. ClueFarm – Information system based on cloud services, accessible through mobile devices, for quality improvement of products and business development in farms, Proiect Parteneriate, CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 29/2014. Project director: Valentin Cristea (UPB). 2014 – 2016, F. Pop member, Ph.D students in the team: Iordache, G.V.
24. MobiWay – Platformă Integrată pentru Sistemele de Transport Inteligent ale Viitorului, Proiect de parteneriat CNCSIS-PN-II-PT-PCCA-2013-4, Contract no. 16 / 2014. Project director: Ciprian Dobre (UPB). 2014 – 2016, F. Pop member, Ph.D students in the team: Ionica D.G.

#### **Nirvana Popescu and Ph.D students**

22. Intelligent Haptic Robot Glove for the patients suffering a cerebrovascular accident (IHRG)", Grant no. 150/2012, Program Parteneriate 2011 Competition: 2012-2016, Project manager: Nirvana Popescu, Ph.D students in the team: C. Toader, L. Năstase
23. High Performance Computing of Personalized Cardio Component Models (HEART), Contract nr.130 / 29.07.2012, Program Parteneriate, 2012-2016. Project director: Decebal Popescu, N. Popescu member, Ph.D students in the team chipa: Radu, A.S.

#### **Răzvan Rughiniș and Ph.D students**

22. Adopția și Impactul tehnologiilor video Inovative în Serviciile publice de educație și administrație locală – IRIS, Proiect national, Program Parteneriate 2013, UEFISCDI, PN-II-PT-PCCA- 2013-4-1802, 2014-2016, project director for UPB: R. Rughiniș, Ph.D student in the team: Vaduva, J.A.

#### **Nicolae Țăpuș and Ph.D students**

22. DataWay – Real-time Data Processing Platform for Smart Cities: Making sense of Big Data, CNCS – UEFISCDI, project number PN-II-RU-TE-2014-4-2731, 2015-2017, N. Tapus member, Ph.D students in the team: Damian, I.

#### **Ștefan Trăușan-Matu and Ph.D students**

22. Querying Databases in Natural Language Using Deep Learning (Text2NeuralQL), proiect national, program PN-III-P2-2.1-PTE-2016-0109, project director: S. Trausan-Matu, Ph.D students in the team: S. Ruseti, R. Iacob
23. Intelligent systems for conversation analysis, Grant of the Romanian Academy, 2016-2019, S. Trausan-Matu project director, Ph.D student in the team: R.C. Iacob
24. Hub tehnologic inovativ bazat pe modele semantice și calcule de înaltă performanță, HUBTECH – P\_39\_405, Program POC, 2016 – 2018, S. Trausan-Matu project director, Ph.D students in the team: G.M. Gutu, I.C. Paraschiv