

## Education

- December 2009** **PhD, Computer Science**, TELECOM Bretagne, Rennes, France.
- February 2002** **MSc, Computer Science**, University of Los Andes (ULA), Mérida, Venezuela.
- February 1998** **Systems Engineer (cum laude)**, Major in Control Systems, Minor in Computer Science, Systems Engineering School, Universidad de Los Andes (ULA), Mérida, Venezuela.

## Employment

- February 2018 – present. Senior Research Associate / EPSRC IAA Fellow**  
University of Cambridge, UK. Monitoring IoT Spectrum in Smart Cambridge.
- April 2017 – January 2018. Research Associate**  
University of Cambridge, UK. EPSRC Project: Network as a Service.
- May 2015 – March 2017. Research Associate**  
University of Cambridge, UK. H2020 EU RIFE Project: Architecture for an Internet for Everybody.
- January 2014 – April 2015. Associate Professor**  
*Profesor Asociado* (in Spanish) at the University of Los Andes, Venezuela.
- January 2013 – December 2013. Invited Scientist**  
Marconi Lab. International Centre for Theoretical Physics, Trieste, Italy.
- September 2012 – December 2012. Research Fellow**  
National Center for Scientific Research (CNRS/IRISA - RSM Dpt. IT/TB), Rennes, France.
- January 2010 – August 2012. Lecturer Attache**  
*Profesor Agregado* (in Spanish) at the University of Los Andes, Venezuela.
- January 2006 – December 2009. PhD Student**  
Security, Networking and Multimedia Department at TELECOM Bretagne, Rennes, France.
- September 2002 – December 2005. Assistant Professor**  
*Profesor Asistente* (in Spanish) at the University of Los Andes, Venezuela.
- January 1999 – February 2002. MSc Computer Science / Research Assistant**  
University of Los Andes, Venezuela.

## Other Appointments

- 2010 – 2015** Research Group Leader in Networking and Distributed Systems, ULA.
- 2014** Coordinator of Industrial Internship Program at Systems Engineering School, ULA.
- 2010 – 2012** Head of the Computer Science Master Program, ULA.

## Teaching Responsibilities

- Michaelmas Term 2017** Supervising Principles of Communication. Computer Lab, University of Cambridge.
- August 2015** Introduction to game programming. Cambridge Coding Academy.
- August 2015** Introduction to programming. Sutton Summer School. Computer Lab, University of Cambridge.
- August 2017** Introduction to game programming. Cambridge Coding Academy.
- 2002-2005, 2010-2012, 2014** Lecturing Data Structures and Algorithms (undergraduate and master), Distributed Systems (master program), and Computer Networking (undergraduate and master). ULA

## Grants

- 2018 – 2019** Knowledge Transfer Fellowship: IoT Spectrum Monitoring in Smart Cambridge. University of Cambridge, UK.
- 2012** Research Fellowship: Characterization of chaotic urban Wi-Fi deployments, CNRS/IRISA. Rennes, France.
- 2006 – 2009** PhD Studies. Venezuelan Fund for Telecommunications.
- 1999 – 2002** Research grant. Venezuelan National Scientific Council.

## Mentoring

12 one-year engineering thesis work at ULA.

2 two-years thesis works of Master of Science at ULA.

Mentorship of an Instructor (first level of a Lecturer) in his 2-years' probation period (ULA requirement to be promoted to a permanent position).

2 six-months thesis works of Master of Science (each generating one publication in peer-reviewed conference), at TELECOM Bretagne, France.

## Invited Talks

- June 2017** Next Generation Networking, Multi-service Networks Workshop, Coseners. Community Mapping of TV White Spaces: Perspectives and Challenges.
- Apr 2017** LACNIC Webminar to Latin America - Transmission Control Protocol: an experimental vision.
- Jan 2017** Global Access to the Internet for All (GAIA) Workshop, University of Cambridge, UK. Efficient information dissemination with ICN in remote independent communities.
- May 2016** RIPE 72. Academic Cooperation Program (RACI). Alternative Network Deployments. Copenhagen, Denmark. 1000+ attendees.
- Dec. 2015** Global Access to the Internet for All (GAIA) Workshop ACM Dev 2015, London, UK, Zebra RFO: Open and Regionalised Spectrum Repositories for the developing world.
- July 2015** Global Access to the Internet for All (GAIA) Working Group, IETF 93, Prague, Czech Republic, TV White Spaces challenges and experiences on deployments in Africa and Latin America.
- July 2014** Scientific and Technological Symposium in Computer Science, SCTC 2014, Universidad Central de Venezuela, Caracas, Venezuela. Community Networks: Part of the Future Internet?

## Other Research Duties

- 2010 –present** IEEE Communication Letter, reviewer
- January 2017** Chair of 2<sup>nd</sup> International Workshop on Future Internet Architecture for Development, in IEEE Consumer Communication and Networking, Las Vegas, USA.
- January 2016** Chair of 1<sup>st</sup> International Workshop on Future Internet Architecture for Development, in IEEE Consumer Communication and Networking, Las Vegas, USA.

## TPC Member:

IEEE Consumer Communication and Networking 2018.

ACM Annual International Conference on Mobile Computing and Networking 2017.

IEEE Consumer Communication and Networking 2017.

IEEE International Conference on Computer Communications and Networks 2016.

IEEE Consumer Communication and Networking 2016.

Global Information Infrastructure and Networking Symposium 2015.

IEEE Vehicular Technology Conference 2014.

**Peer-Reviewed Journals**

- [1] **A. Arcia-Moret**. TV White Spaces meet Databox: A Common Pool Resource management perspective. *Under submission*. IEEE Communications Magazine. Call: Unlocking 5G Spectrum Potential for Intelligent IoT: Opportunities, Challenges and Solutions. pp 1-10.
- [2] J. Benseny J., J. Toyli, H. Haimmainen, **A. Arcia-Moret**. The Mitigating Role of Regulation on the Concentric Patterns of Broadband Diffusion. *Under Submission*. Telecommunication Policy Journal. pp 1-19.
- [3] C. Gomes, **A. Arcia-Moret**, J. Crowcroft. TCP in the Internet of Things: from ostracism to prominence. To appear in IEEE Internet Computing, January 2018, pp 1-15.
- [4] J. Saldana, **A. Arcia-Moret**, et al. Alternative Networks: Towards a Global Access to the Internet for All. IEEE Communications Magazine. May 2017. pp 187-193 (7 pages)
- [5] C. Mikeka, M. Thodi, J. Mlatho, J. Pinifolo, D. Kondwani, L. Momba, M. Zennaro and **A. Arcia-Moret**. Malawi Television White Spaces (TVWS) Pilot Network Performance Analysis, in Journal of Wireless Networking and Communications. September 2014. pp 26-32 (7 pages).
- [6] G. Castignani, **A. Arcia-Moret**, and N. Montavont. A study of the discovery process in 802.11 networks. ACM SIGMOBILE Mobile Computing and Communications Review, 2011. pp 25-36 (12 pages).

**Peer-Reviewed Conferences with Proceedings**

- [7] **A. Arcia-Moret**. Zebra-RFO: A spectrum repository for the masses. ACM Conference on Embedded Networked Sensor Systems, Delf, Netherlands. November 2017. pp 1-2.
- [8] **A. Arcia-Moret**, Z. Gilani, A. Sathiaselan, J. Crowcroft. Peer provided cell-like networks made out of thin air. IEEE Consumer Communication and Networking 2017. Las Vegas, USA. pp 369-372 (4 pages).
- [9] **A. Arcia-Moret**, A. Sathiaselan, M. Zennaro, F. Rondon, E. Pietrosemoli, D. Johnson. Open and regionalised spectrum repositories for emerging countries. In SIGCOMM Global Access to the Internet for All (GAIA) Workshop. Florianópolis, Brazil, August 2016. pp 13-18 (6 pages).
- [10] **A. Arcia-Moret**, A. Araujo, J. Aguilar, and L. Molina. Intelligent network discovery for next generation community wireless network. In IEEE/IFIP Annual Conference on Wireless On-demand Network Systems and Services (WONS), Italy, 2016. pp 1-7.
- [11] **A. Arcia-Moret**, J. Gomez, and A. Sathiaselan. Octopus: A zero-cost architecture for stream network monitoring. London, UK, December 2015. ACM Symposium on Computing and Development. pp 71-72.
- [12] **A. Arcia-Moret**, L. Molina, N. Montavont, G. Castignani, and A. Blanc. Access Point Discovery in 802.11 Networks. In IEEE/IFIP Wireless Days, Brasil, November 2014. pp 1-6.
- [13] C. Mikeka, J. Mlatho, M. Thodi, J. Pinifolo, D. Kondwani, L. Momba, M. Zennaro, **A. Arcia-Moret**, C. Fonda and E. Pietrosemoli. Preliminary Performance Assessment of TV White Spaces Technology for Broadband Communication in Malawi, in proceedings of Humanitarian Technology: Science, Systems and Global Impact 2014, HumTech2014, Boston, USA. pp 149-154 (6 pages).
- [14] **A. Arcia-Moret**, E. Pietrosemoli, and M. Zennaro. WhipPi: White space monitoring with raspberry pi. In IEEE Global Information Infrastructure and Networking Symposium (GIIS 2013), October 28-31. Trento, Italy 2013. pp 1-6.
- [15] **A. Arcia-Moret**, N. Montavont, G. Castignani. Accelerating Short Transfer in 802.11 Networks. In Proceedings of IEEE/IFIP Wireless Days. Valencia, España. 2013. pp 1-3.
- [16] M. Zennaro, E. Pietrosemoli, **A. Arcia-Moret**, C. Mikeka, J. Pinifolo, C. Wang and Steve Song. TV White Spaces, I presume? The quest for TVWS in Malawi and Zambia. In Proceedings of International Conference on Information and Communication Technologies and Development, ICTD 2013. Cape Town, South Africa 2013. pp 175-178 (4 pages).
- [17] G. Castignani, N. Montavont and **A. Arcia-Moret**. Multi-objective Optimization Model for Network Selection in Multi-Homed Devices. Proceedings of IEEE 10th Annual Conference on Wireless On-Demand Network Systems and Services (WONS). March 18-20. Alberta, Canada 2013. pp 113-115 (3 pages).
- [18] N. Montavont, **A. Arcia-Moret**, G. Castignani. On the Selection of Scanning Parameters in IEEE 802.11 Networks. Proceedings of IEEE 24th Annual International Symposium on Personal, Indoor, and Mobile Radio Communications, PIMRC 2013. September 8-11. London, UK 2013. pp 2137-2141 (5 pages).
- [19] **A. Arcia-Moret**, O. Díaz, N. Montavont. A Tunable Slow Start for TCP. In Proceedings of IEEE Global Information Infrastructure and Networking Symposium (GIIS), Choroní, Venezuela 2012. pp 1-6.

- [20] A. Borrero, **A. Arcia-Moret**, and A. Lezama. Simulation of all-optical networks study case: Minimum-deflection routing. Proceedings of IEEE Global Information Infrastructure and Networking Symposium (GIIS), Choroní, Venezuela 2012. pp 1-6.
- [21] **A. Arcia-Moret**, L. Molina, G. Castignani, and N. Montavont. Characterizing spontaneous IEEE 802.11 network deployments. In 6<sup>th</sup> IEEE International Conference on Network Games, Control and Optimization (Net-GCooP), 2012, pp 1–8.
- [22] G. Castignani, N. Montavont, **A. Arcia-Moret**, M. Oularbi and S. Houcke. Cross-Layer Adaptive Scanning Algorithms for IEEE 802.11 Networks. Proceedings of IEEE Wireless Communications and Networking Conference 2011 (IEEE WCNC 2011). Cancun, Mexico. March 2011. pp 327-332 (6 pages).
- [23] G. Castignani, **A. Arcia-Moret** and N. Montavont. An evaluation of the resource discovery process in IEEE 802.11 networks. Proceedings of ACM Second International Workshop on Mobile Opportunistic Networking, Pisa, Italy 2010. pp 147-150 (4 pages).
- [24] G. Castignani, N. Montavont and **A. Arcia-Moret**. The WiFi Scanning Process: Strategies and Evaluation. Proceedings of CIBELEC, Mérida, Venezuela, May 2010. pp 1-4.
- A. Arcia-Moret**, N. Montavont, J-M. Bonnin and D. Ros. TCP ACK Division Revisited. Proceedings of CIBELEC, Mérida, Venezuela, May 2010. pp 1-5.
- [25] **A. Arcia-Moret**, N. Montavont, A. Paltrinieri, and D. Ros. Improving uplink bandwidth management in 802.16 networks. In Proceedings of IEEE Local Computer Networks, Zürich, Oct. 2009. pp 233-236 (4 pages).
- [26] Y. Yang, **A. Arcia-Moret**, N. Montavont and D. Ros. On the impact of IEEE 802.16 Bandwidth Request-Grant Mechanisms on TCP. Proceedings of IEEE Global Communications Conference, Exhibition and Industry (GLOBECOM 2010). Miami, USA 2010. pp 1-6.
- [27] A. Eshete, **A. Arcia-Moret**, D. Ros and Y. Jiang, Impact of WiMAX network asymmetry on TCP. In Proceedings of IEEE WCNC 2009, Budapest, April 2009. pp 1-6.
- [28] **A. Arcia-Moret**, D. Ros and N. Montavont. Auto-protection of 802.11 networks from TCP ACK division. Proceedings of ACM CoNEXT. Madrid, 2008. pp 1-2.

#### Standardization documents (both counting on 2 or more years of academic peer-review)

- [29] J. Saldana, **A. Arcia-Moret**, B. Braem, E. Pietrosemoli, A. Sathiseelan, and M. Zennaro, Alternative Network Deployments: Taxonomy, characterization, technologies and architectures. RFC 7962, Jul. 2016. pp 1-43.
- [30] S. Floyd, **A. Arcia-Moret**, D. Ros, and J. Iyengar. Adding Acknowledgement Congestion Control to TCP. Internet Standards Track RFC 5690, IETF, February 2010. pp 1-33.

#### Book Chapters, Reports, etc.

- [31] M. Zennaro, **A. Arcia-Moret**. Low Cost Spectrum Measurements. In TV White Spaces: A Pragmatic Approach. Edited by: E. Pietrosemoli and M. Zenaro. <http://wireless.ictp.it/tvws/book>. January 2014. pp 161-170 (10 pages).
- [32] **A. Arcia-Moret**, I. Psaras, J. Crowcroft. Bringing Information Centric Networking to Challenged Environments. Report of FI4D/CCNC 2017. Las Vegas, USA. February 2017. pp 1-4. arXiv:1801.01824 [cs.NI]
- [33] **A. Arcia-Moret**, A. Sathiseelan, M. Hussain, J. Benseny, H. Hämmäinen, E. Hadjoannou, C. Theodorou, Watts S., Trossen D., Sahin O, Du H., Arnal F., Sallantin R., Baig R., Potts M. First Report on Technology Validation. D4.1, RIFE Project. [https://rife-project.eu/wp-content/uploads/RIFE\\_D4.1\\_final.pdf](https://rife-project.eu/wp-content/uploads/RIFE_D4.1_final.pdf), 2016. pp 1-83.
- [34] T. Kärkkäinen, R. Baig, A. Sathiseelan, **A. Arcia-Moret**, M. Hussain, F. Arnal, R. Sallantin, D. Trossen, C. Theodorou. Initial platform design and set of dissemination strategies. D3.1, RIFE Project. [https://rife-project.eu/wp-content/uploads/RIFE\\_D3.1\\_final.pdf](https://rife-project.eu/wp-content/uploads/RIFE_D3.1_final.pdf), 2015. pp 1-55.
- [35] G. Castignani, N. Montavont, **A. Arcia-Moret**, S. Houcke, M. Oularbi Rabie. An IEEE 801.11 Scanning Algorithm: cross-layer experiments. Institut TELECOM/TELECOM Bretagne. 2011. pp 1-23; (Collections des rapports de recherche de TELECOM Bretagne, RR-2011-05-RSM, ISSN 1255-2275).
- [36] S. Gamboa, **A. Arcia-Moret**. Technical Report. Profiling BT-Latam Satellite Network: a TCP perspective. University of Los Andes. Mérida, Venezuela. 2010. pp 1-141.
- [37] **A. Arcia-Moret**, Y. Yang, N. Montavont and D. Ros. A Study of Bandwidth-Perception Management Mechanisms in IEEE 802.16. April 2010. pp 1-10. Networks. arXiv:1004.0050 [cs.NI].