Ricardo Ribalda Delgado, PhD.

Personal Data

Place of Birth:	Zaragoza, Spain | 30 November 1983
Address:	Ryparken 67, 2 th. 2100 Copenhagen Ø, Denmark
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Work Experience

Now
June 2008

Lead Firmware Engineer Qtechnology A/S., Denmark
Smart Cameras and Embedded Systems

Development of the firmware, kernel and low level user libraries for high performance Smart Cameras for the food industry. These cameras have been deployed in hundreds of locations around the world, and work at framerates up to 1000 fps. During this 5 years trip we have launched 5 products and bring up over 50 PCBs. This work has lead to contributions in the Linux Kernel, Das U-boot, Yocto Project (Open Embedded), flashrom and Gstreamer, among others

October 2010
September 2005

Researcher HCTLAB Unversidad Autónoma de Madrid, Spain
Industrial Computing, Biometry and Robotics

Development of state of the art industrial computing systems like: 3D fingerprint sensors for 1 and 10 fingers (for TBS, Switzerland), Access control with smartcards (for UAM), Road Monitoring (for FCC), Qualifications notifications (for UAM), and Automatic Sales of Bus Tickets (deBlas).

Summer 2009

Visitor Researcher Forschungszentrum Jülich, Germany
Scientific Computing and Profile-guided optimization

Optimization of Low Level processing stages of the GLORIA high altitude spectrometer. My contributions lead to a process speedup of more than 200x, allowing the processing of the spectrometer's data in real time.

Education

November 2015

PhD in Computer Engineering and Telecommunications
Universidad Autónoma, Madrid, Spain
Dissertation: "An Innovative Vision System for Industrial Applications"
Supervisor: Prof. Javier Garrido Salas
Grade: Doctor Europaeus Cum Laude

June 2007

Master of Advanced Studies in Computer Engineering
and Telecommunications
Universidad Autónoma, Madrid, Spain
Dissertation: "Intelligent and reconfigurable architecture for remote image processing applications based on an FPGA with Linux"
Supervisor: Prof. Javier Garrido Salas
Grade: Sobresaliente (10/10)

June 2005

Master in Computer Engineering
Universidad Autónoma, Madrid, Spain
Internship: University Research Lab
Grade: Notable (8/10)

Other Education

2014   High Level synthesis for FPGAs with Vivado HLS
2012   OpenCL Training
2010   Intensive VHDL and Xilinx Tools
2009   Image Processing with FPGAs
2003   Linux SysAdmin

Languages

SPANISH: Mother Tongue
ENGLISH: Excellent (Spoken English at Work - C2)
DANISH: Basic Knowledge

Congress Attendance

2017   Kernel Recipes
2014   Linux Plumbers
2013, 2017   Kernel Summit
2011-2017   LinuxCon Europe
2010-2017   Embedded Linux Conference Europe
2007-2017   Chaos Communication Conference

Open Source Contributions

- *Linux Kernel:* ~224 contributions merged, including a 9+ year old bug in the driver core.

- *Yocto project / Open Embedded:* 60 contributions. "Supporting Organization".

- *U-boot:* 47 contributions merged. Maintainer of Xilinx PowerPC boards.

- *libv4l2/v4l-utils:* 12 contributions.

- *flashrom:* First support for EEPROM memories.

- *Gstreamer instruments:* 12 contributions.

- *Coreboot:* 6 contributions.

- *OpenJDK:* 1 contribution.

Speaker and Trainer

- 2018: Keynote Speaker: "Industrial Computer Vision" (invited by AMD's CTO Mark Papermaster)", *Embedded World 2018*.

- 2016: Keynote Speaker: "The Small Potato Collider (or how to solve a multidisciplinary problem using a modular camera)", *NOBUGS2016*.

- 2016: Speaker: "Developing an Industrial Machine Vision Application using Mentor Embedded Linux on AMD R-series SOC with Qtechnology Cameras", *Mentor Webinars*.

- 2015: Speaker: "The art of counting potatoes with Linux", *Embedded Linux Conference Europe*.

- 2005, 2006, 2007, 2008, Trainer: Structure and Technology of Computers II (Assembly), *Universidad Autónoma de Madrid*.

- 2007, 2008, 2009 y 2010, Trainer: Embedded Linux, *Electra Training*.

- 2007 y 2008: Teacher: Basic Robotics, *UAM*

- 2007: Speaker: OpenSource Development in the UAM, *AEI*

- 2006: Speaker: Cryptography in Linux *UAM Summer Courses*

- 2004: Speaker: Linux Introduction *Campus Party*

- 2002, 2003: Panel Moderator: "OpenSource in the Public Administration" *Hispalinux Congress*

OTHER ACHIEVEMENTS

2015   Eudyptula Challenge
2012   Winner of the Copenhagen Startup Weekend