Oliscience

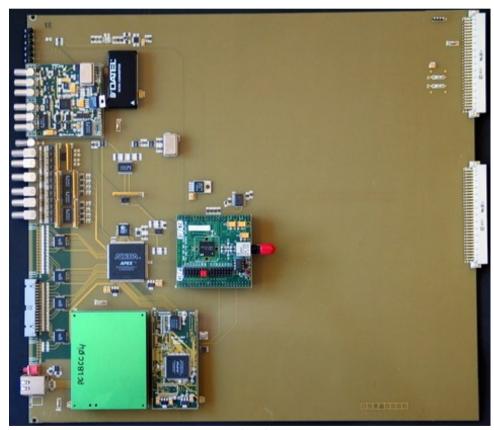
project proposal and status report

by

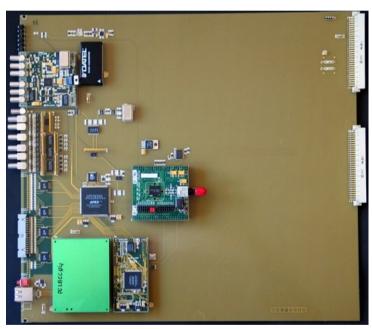
Andrea Borga

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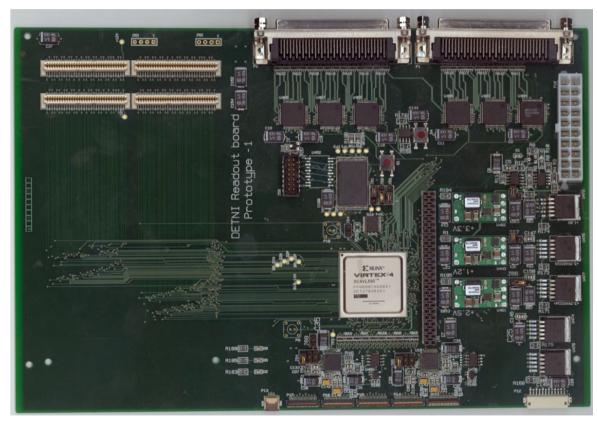
presently Electronics Technology department



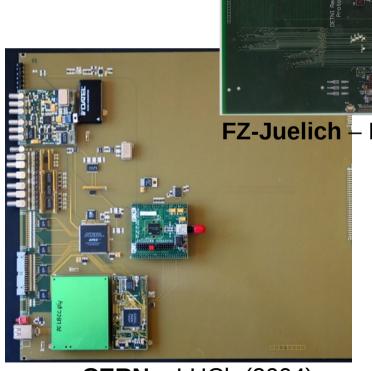
CERN – LHCb (2004)



CERN – LHCb (2004)



FZ-Juelich – DETNI (2007)

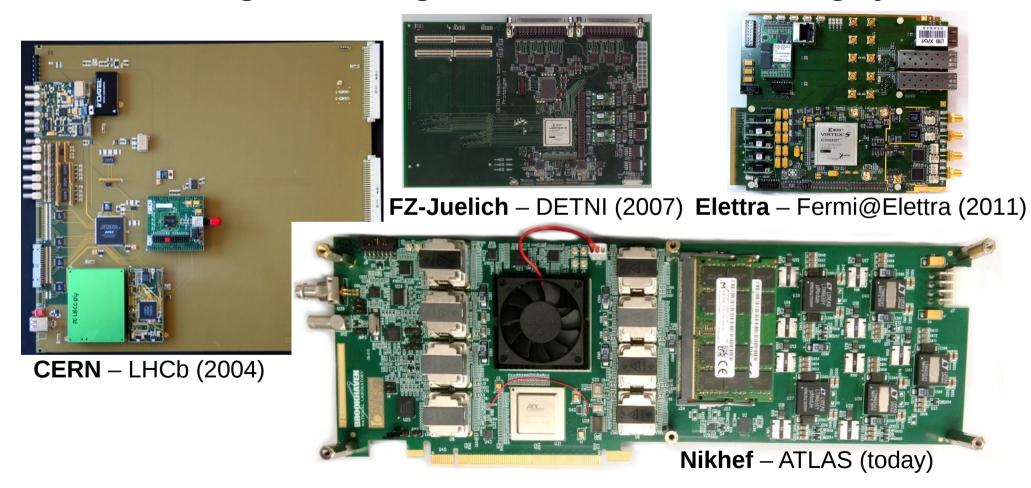


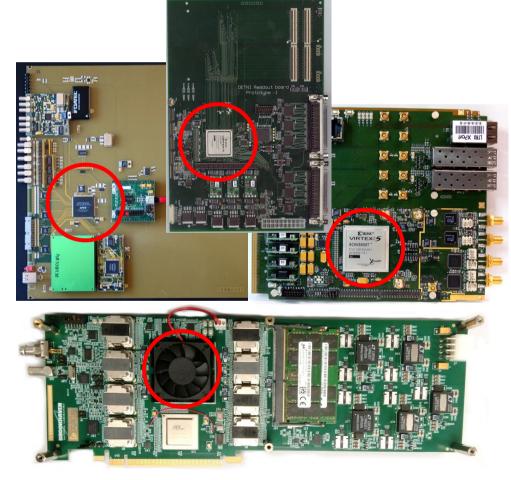


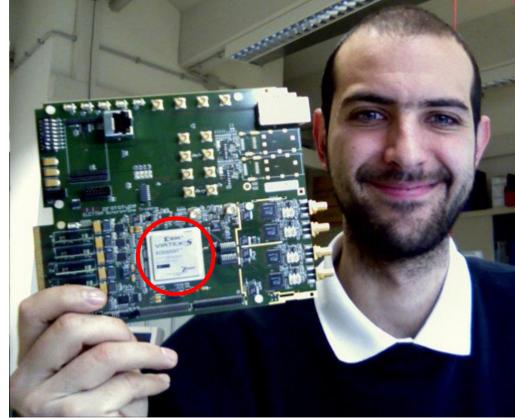


Elettra – Fermi@Elettra (2011)

CERN – LHCb (2004)



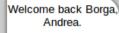




The problem

- There is no solid definition of gateware and its boundary → this I want to fix
- There is a lot of effort duplication especially in our scientific community → this I want to fix
- There is no solid metrics to measure the strength of digital designers → this I want to fix
- I see business opportunities in open source paradigms applied to my field of expertise
 - → here is where I want to succeed next









部分翻译

Browse

Tools

Google™ Custom Search

Search

- PROJECTS
- FORUMS
- ABOUT
- HowTo/FAQ
- MISC
- PARTNERS
- SHOP

What is OpenCores?



the #1 community within open source hardware IP-cores

OpenCores is the world's largest site/community for development of hardware IP cores as open source.

OpenCores.org host the source code for different digital HW projects (IP-cores, SoC, boards, etc) and support the users with different tools, platforms, forums and other useful information. Please join us!

Projects



Browse all Projects (Cores)

Forum



WebShop



Visit our Webshop

Professional support



Professional support for OpenCores technology based products.

If you plan to use IPs from OpenCores in your next design and need support, please contact ORSoC AB.

They are experts in SoC design based on the OpenCores technology and have extensive experience all parts of FPGA/ASIC development.

Please contact ORSoC for further information.

News

Registered OpenCores users



274470

OpenCores statistics

Last updated projects

- · Reed Solomon Codec
- Boost Converter
- Yet Another Hamming Encoder and Decoder
- Double Clocked FFT Core
- Another Wishbone Controlled UART
- OpenArty
- Wishbone Scope
- XuLA2-LX25 SoC

Most popular projects

- OpenRISC 1000
- minsoc
- . I2C controller core
- · SPI controller core
- SPI Master/Slave Interface
- · Alwcpu A light weight CPU
- SPI Verilog Master & Slave modules
- openGFX430

OpenCores.org

- A portal that since 2003 collected >250.000 professionals in the field of gateware IPs
- Generates ~500.000 views per month
- Strong identity, established trademark, consistent community, very specialized, potentially business oriented
- Unkempt since 2012, but it is still the largest community for such niche market
- I regard this as the most strategic starting point for my endeavour

Oliscience goals

- Open Logic Interconnects science
- Acquired the portal
- Activate the community
- Offer an "impact metrics" to asses performance and motivate designers to contribute (for labs)
- Propose "hardware platform matching" as a sort of advertisement opportunity (for industry)
- Provide consultancy services via the portal in the field of gateware design and support

Competitive analysis

- Other unrestricted non-commercial initiatives
- LibreCores (FOSSi foundation): trying to rebase the OpenCores community
- OHWR (CERN initiative): generic open "hardware" portal for sharing various projects

Added values

- For designers: engaging experience encourages to contribute and participate
- For labs: showcase their capabilities, find new partnerships, approach funding agencies
- For companies: potential market place popular among users in the filed
- For all: let professionals take care of the infrastructure
- For all: a partner that knows fundamental research needs in first person

Planning for this year

- Taken ownership of the website
- Probe the community for changes
- Search for partners especially in the scientific community
- Develop business model and marketing strategy
- ... **found** tools to get my ideas in motion: contacted a CERN Business Incubator!

Where do I need support?

- Develop new licensing schemes for gateware distribution, with an eye on labs' needs for "measuring the impact on society"
- Further extend my network with labs, since they are expected key clients
- Attract industry through the portal
- Product development: a new service for a sector in need but not (yet) receptive

Develop the business

- ... comes with a series of open questions
- "premium subscription" for labs and commercial enterprises?
- Option to sell compatible hardware via the site:
 Oliscience gets a % on the sale?
- Companies offer consultancy services on their products via the site: Oliscience gets a %?
- Oliscience offers direct consultancy services via the site?

Personal experience with BIC

- How can an electrical engineer get the most out of those "business tools"?
- Learning curve is really steep
- BIC, IXA, ACE, etc.: how to get a grip?
- There is a gap between business oriented minds and technical problem solvers
- An engineer's approach: convergence through a slow iterative process
- Possibilities to speed this up?



Thank you for your attention