

Title: A combined **GP-GPU/FPGA** desktop system for accelerating **image processing** applications (GUDI)

Who: Erasmushogeschool Brussel and Vrije Universiteit Brussel (Flandres, Belgium)

Abstract:

Recently, two new technologies have brought the power of high performance computing to a desktop computer: the GP-GPU or general purpose graphical processing unit and the reconfigurable FPGA's or Field Programmable Gate Arrays. Both have different characteristics: GP-GPU's are strong in massive independent parallelism while FPGA's are powerful for tasks with less regular parallelism and more dependencies. In this project, we will present a prototype, which combines in one platform both technologies.

Partners:

We are looking for partners with background in high performance computing and/or parallelism. Goals to exploit could be

- to test the platform with other programming languages and/or other technologies
- to implement algorithms that can benefit from the best of the two worlds (FPGA and GP-GPU)

Contact person

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