

Declaration of interest for Code_Aster

Logilab specializes in scientific computing and data science. Building on the expertise of its R&D center, Logilab implements software solutions and offers high value trainings and consulting.

Logilab expertise is centered on several tools (Python, C, Fortran, etc.) and techniques (software engineering, agile project management, multi-paradigm programming, statistics, logic, etc.) and applies them to advanced computing problems (data analysis, numerical problem solving, simulation, etc.) and knowledge management problems (content management systems, database aggregation, indexation tools, information management, business modeling, etc.)

Logilab works under a set of comprehensive quality rules. All developments are delivered on a regular basis after being validated with automated and manual tests. When possible, Logilab favors lean and agile development methods that allow to maximize the return on investment and produce software that fits within the available budget and provides as much value as possible to the final users.

Logilab training sessions are designed for engineers willing to enhance their skills in software development and computer science. They cover a wide range of topics (Python, Object Oriented design and programming, C/C++, agile project management, implementation of customized virtual machines for cloud computing, etc.) and are always fine tuned to best suit the needs of the attendees.

Logilab has always been part of the Free/Open Source Software community. The company uses and contributes to Free/Open Source Software for its own projects as well as for its customers. Major contributions include Debian, Mercurial and Python. Most of the internal developments of the company are released as open source on [Logilab free software projects](http://www.logilab.org/) [http://www.logilab.org/] site.

Logilab is fostering innovation and its staff is engaged in a process of continuous learning. This is visible thru its participation to R&D programs and by reading the catalog of its trainings. It is an active member of two French competitiveness clusters: Systematic Paris Region and Aerospace Valley.

Contribution to Code_Aster

Since its inception, Logilab has always been an active member and contributor of the Free/Open Source Community. It is not by accident that since 2005, Logilab has invested time in Code_Aster that is both free and very advanced in its field.

As a software specialist, Logilab's role is not to develop new algorithms or models, but to help develop the software in tight cooperation with experts of the physics and its numerical representation. Logilab also contributes to the software architecture issues and to tools and methods. For example, it has integrated Code_Aster in the Salome Meca platform, refactored some parts of Code_Aster, worked on the data catalog, pioneered the use of a new revision control system and a new build system, etc.

Logilab maintains on BitBucket a friendly fork of Code_Aster, called [libaster](http://www.libaster.org/) [http://www.libaster.org/], that experiments with a new compilation tool (*waf*) and a new global architecture (libaster is a real Python library that can be imported in any Python program and that doesn't need a command file). Some of the ideas from this experimental fork have been reused or merged in the official Code_Aster.

Commercial offer around Code_Aster

Logilab provides development services of software components and tools. Having a high expertise in Python, C/C++ and Fortran, and a good knowing of Code_Aster architecture, Logilab can rapidly develop customized software elements from algorithms and specifications, or integrate Code_Aster inside a computation chain.

Logilab also offers consulting services and professional trainings in computing science, including the development in Python, C/C++ or Fortran inside Code_Aster software architecture.

Finally, Logilab commercializes a platform for defining, managing and saving Code_Aster computation cases. This platform has dedicated plugins for creating and managing numerous computation cases in parametric studies. Try it at <http://www.simulagora.com/>

Contacts

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