



10th International CDIO Conference
SHARING SUCCESSFUL ENGINEERING
EDUCATION EXPERIENCES

June 15 - 19, 2014

Universitat Politècnica de Catalunya
Barcelona, Catalonia, Spain

CALL FOR PAPERS AND PRESENTATIONS

The CDIO Initiative (www.cdio.org) welcomes your ideas and invites proposals for papers and presentations at the 10th International CDIO Conference. Proposals are welcome on topics relevant to the CDIO approach and the conference Theme. In addition to describing improvements in the contexts and methods in engineering education, the Theme of this year is intended to emphasize the need for sharing successful learning experiences, especially Design-Build Projects, in sufficient detail for other CDIO programs to adapt or duplicate these learning objects in their own environment. This level of detail will include both broader goals and discipline specific information. Thus, presentations may be grouped by disciplines (chemical, electrical, mechanical, aeronautical, civil, multidisciplinary, ...) for focus where there is enough interest.

There are two main categories of contributions. More detail in their description is included in the document "CDIO Program Track Policy", that will be available in the Conference webpage:

- **Contributions that require a full paper** and that are expected to meet those standards by the referees. The review process will follow three phases with their corresponding deadlines: submission of a 500 word abstract, submission of a full paper according to the template and submission of the final version of the full paper revised in accord with referees comments. The paper and any supporting materials submitted by the final manuscript deadline will appear in the conference proceedings and be archived on the cdio.org website.
- **CDIO Projects in Progress:** These contributions describe current activities and initial results and allow an opportunity to share with other conference attendees and benefit from timely input. This track includes traditional conference presentations as well as discussions and skill development that would typically take place in a **roundtable** or **workshop** format. An abstract is required and will be selected for presentation by the program committee. The deadline for Project in Progress abstracts will be much later, although submission as early as possible is preferred. The short contribution and any supporting materials submitted by the final manuscript deadline will appear in the conference proceedings.

The first deadline (November 17) applies to the abstracts for the full paper category. Proposals should address one or more of the following tracks:

- **Advances in CDIO:** These contributions provide an advance to the state of the art in CDIO based education. They meet the expectations for original scholarly publication, including adequate review of relevant literature, a hypothesis, results of simulations or measurements, analysis, and conclusions. They may address any area of CDIO, including scholarly examinations of CDIO implementation. Possible strands include:
 - o *Innovations in Teaching, Learning, and Assessment*
 - o *Engineering Ethics, Sustainability, and Social Responsibility*
 - o *Faculty Development Programs*
 - o *Program Evaluation and Accreditation*
 - o *Engineering Leadership and Entrepreneurship*

- **CDIO Learning Objects:** Papers for CDIO Learning Objects are intended to help other institutions, mainly these which are starting an implementation process, in adapting them to their curricula and must include enough information to allow implementing the object. Also a balance between technical description and pedagogical issues is desirable. Then the paper must include a description of the object, sections on Learning Outcomes and Student Achievement of those outcomes as well as a list of Additional Resources. For instance, if the Learning Object is a design-build project, the following items may be included: information on the degree and year, team size and number of simultaneous teams, the requirements, a description of the project and their learning outcomes, the needed materials and their approximate cost and also the results of the implementation, the student's achievement. Additional resources can be included: files of rubrics, drawings, and instructional materials as well as links to data sheets and suppliers for relevant components and supplies if not widely available.
- **CDIO Implementation:** These contributions describe a particular implementation of CDIO principles in a practical setting. They may describe experience with a course or project, an instruction method, or introduce new CDIO central materials (e.g. revised syllabus, self evaluation rubrics, etc.). They may also be case studies of the program level implementation experience at a particular institution. These contributions must be examples of good practice (or critical examinations of where it was lacking) and be of general interest to participants from other CDIO institutions.

Session Types

- **Keynote Presentations:** These presentations will be longer duration and will be available to the entire conference audience with no conflicts. They will be reserved for invited speakers and contributions judged to be of significant importance to all CDIO Collaborators.
- **Poster Presentations:** These presentations will provide a short 'teaser' opportunity for each poster author and will be available to the entire conference with no conflicts. Immediately following the teaser session posters provided by the authors will be on display in a central area where authors can discuss the work with interested attendees. This session will also be scheduled with no conflicts. Poster presentations will be scheduled early in the conference to facilitate further interaction.
- **Podium Presentations:** These presentations will follow a traditional conference format of multiple, parallel tracks with short slide presentations followed by Q&A. The number of tracks and potential conflict with workshops, etc. will limit the size of the audience. These parallel tracks will also include some **Reprise Sessions** in which past authors will be invited to repeat especially valuable presentations from previous conferences
- **Workshop Presentations:** Interactive working session on a specific topic with activities that engage participants proposed by a workshop facilitator. A short contribution will outline the objectives for skills development and any requirements for prior knowledge of the topic or skills.
- **Roundtable Discussions:** Informal discussion of a topic proposed by a roundtable facilitator. A short contribution will provide the background and discussion questions. A follow-up summary report is required for the conference site.

Contributions will be matched to presentation type by the program committee with consideration of the author's preference and the nature of the contribution. Scheduling preference will be given to full paper contributions. In most cases full papers will get the podium or keynote presentations while projects in progress will be presented as posters, workshops, or roundtables, as appropriate.

Deadlines

Event	Date / Deadline
Call for abstracts opens	October 3, 2013
Abstract submission deadline	November 17, 2013
Notification of abstract acceptance	December 2, 2013
Draft paper submission deadline	February 2, 2014
Notification of draft paper acceptance	March 21, 2014
Full paper submission deadline	April 20, 2014
Extended descriptions deadline*	April 20, 2014
Notification of acceptance for all sessions	April 28, 2014
Final versions for USB drive**	May 9, 2014

* For workshops, Roundtables & other Project in Progress Abstracts

** Final Versions of Projects in Progress, slides & all supporting information for poster teaser session and workshops

Conference At-A-Glance

Sunday, June 15	Registration, CDIO Council meeting, opening reception
Monday, June 16	Plenary session, concurrent sessions: Introductory and advanced workshops, CDIO Academy, campus showcases
Tuesday, June 17	Plenary sessions, concurrent sessions, roundtables, CDIO Academy, posters, conference dinner
Wednesday, June 18	Plenary sessions, concurrent sessions, CDIO Academy, posters
Thursday, June 19	Global and regional CDIO meetings (open to all conference participants), annual election, closing session, CDIO Council meeting

Abstract Preparation and submission

Submission of first abstract will be performed through a webpage form with the START system **on or before November 17, 2013** and is template-free. The corresponding author will enter the title, authors and affiliations, an abstract limited to 500 words, the conference strand and the preferred type of presentation. There is a template for Full Papers and a second one for Short Contributions which will be made available after abstracts review and acceptance notification.

Access to the START system (www.softconf.com/d/cdio2014/) is open and more details will be available soon through the conference website, www.cdio2014.org (under construction)

The final submission PDF must follow the formatting requirements detailed in the template on the conference website and must include a Creative Commons License to allow it to be included in the proceedings and/or archived on the CDIO web site.

Criteria for Selection

- Relevance to the conference theme and strands
- Innovative ideas with proven results
- Potential to stimulate thought and discussion
- Ideas, programs, and practices that have applications for the CDIO audience
- Learning Objects with a description which includes enough information to allow implementing them in other institutions

Questions

For questions, email cdio2014@upc.edu