FAST '23: 21st USENIX Conference on File and Storage Technologies

February 21–23, 2023, Santa Clara, CA, USA

Sponsored by USENIX, the Advanced Computing Systems Association

The 21st USENIX Conference on File and Storage Technologies (FAST '23) will take place February 21–23, 2023, at the Hyatt Regency Santa Clara in Santa Clara, CA, USA.

Important Dates

- Paper submissions due: Thursday, September 22, 2022, 11:59 pm PDT
- Author response period begins: Monday, November 28, 2022
- Author response period ends: Thursday, December 1, 2022, 11:59 pm PST
- Notification to authors: Friday, December 9, 2022
- Final paper files due: Tuesday, January 24, 2023

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Overview

The 21st USENIX Conference on File and Storage Technologies (FAST '23) brings together storage-system researchers and practitioners to explore new directions in the design, implementation, evaluation, and deployment of storage systems. The program committee interprets "storage systems" broadly: submissions on low-level storage devices, distributed storage systems, and information management are all of interest. The conference will consist of technical presentations including refereed papers, and poster sessions.

Topics

Topics of interest to FAST should include files and/or storage, and may overlap with other topics including, but not limited to:

- Archival systems
- Auditing and provenance
- Big data, analytics, and data sciences
- Caching, replication, and consistency
- Cloud, multi- and hybrid-cloud environments
- Data deduplication
- Database storage
- Distributed and networked storage (wide-area, grid, peer-to-peer)
- Emerging memory hierarchy design
- Empirical evaluation
- Experience with deployed systems
- File system design
- HPC systems (including parallel I/O)
- Key-value and NoSQL storage
- Management
- Memory-only storage systems
- Mobile, personal, embedded, and home storage
- Networking
- Novel and emerging storage technologies (e.g., byte-addressable NVM, flash, SMR, IMR, DNA storage, glass)
- Performance and QoS
- Power-aware storage architectures
- RAID and erasure coding
- Reliability, availability, and disaster tolerance
- Search and data retrieval
- Security

In evaluating the fit of a paper for FAST, a key ingredient is the design of storage software. A paper with only hardware-level contributions will be out-of-scope; a paper could be brought into scope for FAST by demonstrating for example how software can leverage novel hardware.

Submission Instructions

Please submit your paper by 11:59 pm PDT on September 22, 2022, in PDF format via the submission system linked from the FAST '23 Call for Papers web page. Do not email submissions. There is no separate deadline for abstract submissions.

- The complete submission must be no longer than 12 pages excluding references. **There is no short-paper category.** The program committee values conciseness: if you can express an idea in fewer pages than the limit, do so. Supplemental material may be added as a single separate file without page limits. However, the reviewers are not required to read or consider such material. Content that should be considered to judge the paper is not supplemental and counts toward the page limit.
- Papers must be typeset on U.S. letter-sized pages in two columns using 10-point Times Roman font on 12-point leading (single-spaced), within a text block **7" wide by 9" deep**.
- Labels, captions, and other text in figures, graphs, and tables must use font sizes that, when printed, do not require magnification to be legible. References must not be set in a smaller font. Submissions that violate these requirements will not be reviewed. Limits will be interpreted strictly. No extensions will be given for reformatting.
- A LaTeX template and style file are available on the USENIX templates page (www.usenix.org/paper-templates).
- **Double-blind policy:** Authors must not be identified in the submissions, either explicitly or by implication. To refer to your previous work, consider it as written by a third party. Do not say "reference removed for blind review." Supplemental material must be anonymized. Submissions violating anonymization rules will not be considered for review. If you are uncertain about how to anonymize your submission, please contact the program co-chairs, fast23chairs@usenix.org, well in advance of the submission deadline.
- **Prior Workshop Paper Policy:** If a submission extends a prior workshop paper, please include an anonymized copy of the workshop paper in the submission field. This should be the same as the published version, with any identifying information removed.
- Simultaneous submission of the same work to multiple venues, submission of previously published work, or plagiarism constitutes dishonesty or fraud. USENIX, like other scientific and technical conferences and journals, prohibits these practices and may take action against authors who have committed them. See the USENIX Conference Submissions Policy (www.usenix.org/submissions-policy) for details.
- If you are uncertain whether your submission meets USENIX's guidelines, contact the program co-chairs, fast23chairs@usenix.org, or the USENIX office, submissionspolicy@usenix.org.
- Papers accompanied by nondisclosure agreement forms will not be considered.
- Submissions should abide by the Conflict Identification guidelines (see below).

The program committee and external reviewers will judge papers on technical merit, significance, relevance, and presentation. Research papers on new and unexplored problems are encouraged. A good research paper:

- addresses a significant problem;
- presents an interesting, compelling solution;
- demonstrates the benefits and drawbacks of the solution;
- draws appropriate conclusions using sound experimental methods;
- clearly describes what the authors have done; and
- clearly articulates the advances beyond previous work.

Program committee members, USENIX, and the broader community generally value a paper more highly if it clearly defines and is accompanied by artifacts not previously available. These artifacts may include traces, original data, source code, or tools developed as part of the submitted work.

Blind reviewing of all papers will be done by the program committee, assisted by outside referees when necessary. Accepted papers will be shepherded by a member of the program committee.

Deployed-Systems Papers

In addition to papers that describe original research, FAST '23 also solicits papers that describe real operational systems, including systems currently in production. Such papers should address experience with the practical design, implementation, analysis, deployment, or operation of such systems. We encourage submission of papers that disprove or strengthen existing assumptions, deepen the understanding of existing problems, and validate known techniques in environments in which they were never before used or tested, with preference given to experimental results based on production data. Deployed-system papers will be treated similarly to other papers for publication purposes; they need not present new ideas or results to be accepted, but should offer useful guidance to practitioners.

A good deployed-system paper:

- clearly articulates lessons learned from deploying in production;
- describes an operational system of broad interest;
- discusses practical problems encountered in production; and
- supports the lessons with appropriate evidence, potentially including statistical data from the deployment, empirical evaluation of the system, and anecdotes.

For deployed systems papers, the title should be prefixed with "Deployed System: ", followed by the title. Authors must also indicate in the submission form that they are submitting a deployed-system paper.

Double-blind Policy for Deployed-system Paper: All submissions for FAST '23 are required to follow the double-blind policy (see above). However, for only deployed-system papers, the product or company described in the paper need not be anonymized (authors still need to be anonymized).

Author Response Period

FAST '23 will allow authors to respond to reviews prior to final decision, according to the schedule above. Authors must limit their response to correcting factual errors in the reviews, to addressing questions posed by reviewers, and to clarifying the ideas in the paper. Responses may include new experiments and data in response to a reviewer request. Responses are optional and limited to 1000 words. This is a soft limit—you may write a longer response, but the reviewers are not required to read past this limit; you may include a pdf only if you add a diagram or a figure.

Conflict Identification

Upon submitting your paper, authors must indicate conflicts with PC members. A conflict exists in one of the following cases:

Institution: You are currently employed at the same institution, have been previously employed at the same institution within the past two years, or are going to begin employment at the same institution. A completed internship does not constitute an institutional conflict.

Advisor/Advisee: Doctoral thesis advisor and post-doctoral advisor (if relevant) are conflicts for life.

Collaboration: You have a collaboration on a project, publication, grant proposal, or editorship within the past two years.

Close friends and family: Close family relations (e.g., spouse, parent/child, sibling) and close friends are conflicts forever, if they are potential reviewers.

The PC will review paper conflicts to ensure the integrity of the reviewing process, adding conflicts if necessary. If there is no basis for conflicts indicated by authors, such conflicts will be removed. Do not identify PC members as a conflict solely to avoid having them as reviewers. If you have any questions about conflicts, contact the program co-chairs.

Author Notification and Beyond

Authors will be notified of paper acceptance or rejection according to the schedule above. If your paper is accepted and you need an invitation letter to apply for a visa to attend the conference, contact conference@usenix.org as soon as possible. Visa applications can take at least 30 working days to process. Identify yourself as a presenter and include your mailing address in your email.

Early Rejection Notification. This year, we will notify authors of papers that are rejected early in the process, prior to the author response period. The goal is to allow authors of early rejected papers to use reviewer feedback earlier and resubmit to another conference as soon as possible. Early rejected papers will no longer be considered under submission (for the purposes of multiple submission policies) upon receipt of a rejection notification.

All papers will be available online to registered attendees no earlier than Thursday, January 26, 2023. If your accepted paper should not be published prior to the event, please notify production@usenix.org. The papers will be available online to everyone beginning on the first day of the main conference, February 21, 2023. Accepted submissions will be treated as confidential prior to publication on the USENIX FAST '23 website; rejected submissions will be permanently treated as confidential.

By submitting a paper, you agree that at least one of the authors will attend the conference to present it. If the conference registration fee will pose a hardship for the presenter of the accepted paper, please contact conference@usenix.org.