Message from the
28th USENIX Security Symposium
Program Co-Chairs

Welcome to the USENIX Security Symposium in Santa Clara, CA! We hope you enjoy the outstanding technical program and invited talks. Now in its 28th year, the symposium brings together researchers and practitioners from across the field. We encourage you to engage with the community through our events, hallway track, and questions for speakers.

This was an exciting year for the USENIX Security Symposium as we transitioned to a new paper reviewing model with multiple submission deadlines. We want to use this opportunity to detail the model we instituted this year, as well as the process we used to develop it.

The USENIX board asked us in June of 2018 if we would be willing to move to multiple submission deadlines for the 2019 Symposium, and tasked us with developing a plan to do so. We studied the processes and choices made by conferences that had previously transitioned to multiple submission deadlines, including the IEEE Symposium on Security and Privacy, the Privacy-Enhancing Technologies Symposium, the ACM International Conference on Mobile Computing and Networking, and the Conference on Cryptographic Hardware and Embedded Systems, and consulted with former and current chairs of these conferences. We then developed a preliminary plan that we presented to the USENIX Security Steering Committee for feedback. After incorporating their suggested changes and receiving approval, we presented the plan to the USENIX Security community at USENIX Security 2018 in August 2018 in a community meeting to gather feedback before publishing the official Call for Papers.

We made the following choices in designing the new submission model:

- There would be four evenly-spaced submission deadlines throughout the year. We felt that this was a "sweet spot" that would allow for the two-and-a-half-month review cycle that the community was used to, while still giving authors multiple opportunities to submit their work when they felt it was ready. Since 2019 was a transitional year, we had two submission deadlines. The first deadline in the fall was November 15, 2018, and the second deadline in the winter was February 15, 2019.

- Like other conferences that have transitioned to multiple deadlines, we instituted a paper revision and resubmission process, which we describe in more detail below.

- To try to make the reviewing and revision process as constructive as possible, we introduced "journal-style" reviewing outcomes. That is, instead of rating papers "Accept", "Weak Accept", "Weak Reject", or similar, we specified that reviewers could give outcomes of "Accept", "Minor Revision", "Major Revision", "Reject and Resubmit", and "Reject".

"Accept" has the same meaning as before. "Minor Revision" replaces "Accept with Shepherding". Papers with this outcome were assigned a shepherd who articulated a specific list of textual changes, such as adding additional citations or clarifying details of experiments, that the authors were requested to make, with the specific guidance that papers in this category were not accepted until the changes were made to the reviewers' satisfaction.

"Major Revision" was the most significant change to the process. Papers receiving this outcome were returned to the authors with a list of specific changes requested by the reviewers. These included performing additional experiments, adding additional case studies or analyses, or requests for rewriting that were considered beyond the scope of what a shepherd could reasonably guide. Authors of "Major Revision" papers were invited to resubmit to either of the next two submission deadlines, with the promise that we would attempt to assign the same set of reviewers to review the resubmission, and that the resubmission would be evaluated according to the reviews and the specific changes requested by the reviewers. Papers receiving this outcome were considered to still be under submission for the next two deadlines, and we asked authors to explicitly withdraw their papers from consideration if they wished to submit the same work to another conference.

Finally, papers that were rejected could receive two possible outcomes. A "Reject and Resubmit" outcome was intended to signal to the authors that the reviewers thought the work could likely be revised to be accepted, but that the scope of the changes reviewers felt was required for acceptance was beyond what the reviewers could articulate in a specific list of "Major Revision" requests, or would likely take longer than the four months that authors would have to revise their work for a "Major Revision". Papers receiving this outcome could not submit to either of the next two submission deadlines. Papers receiving a "Reject" outcome were not allowed to resubmit for a full year after the submission date.

- There would be two in-person program committee meetings a year. While program committee meetings are expensive and time-consuming, we received feedback from many community members that they serve an important role for calibration and discussion. In the 2019 transitional year, we held only one in-person meeting associated with the winter submission deadline.

- As in previous years, for each submission deadline, we used a double-blind review process with two rounds of reviews.

We expected the total number of submissions to increase this year, in line with the experience of other conferences that have transitioned to multiple submission deadlines. Accordingly, we gathered the largest program committee ever, with 100 members and two chairs. We endeavored to assemble a diverse program committee in terms of area of expertise, seniority level, geography, gender, race, and institution type. Members of the resulting program committee were 19% from industry, government, or nonprofit, 25% female, and 27% based outside the US. The 2018 USENIX Security chairs invited members of the community to volunteer themselves and others to serve on the 2019 program committee using a web form; we found this to be an incredibly valuable resource when assembling our program committee.

A major goal of our changes to the reviewing system was to focus on returning helpful, constructive reviews to authors, and to provide as much guidance as possible in moving submitted papers towards publication. Following last year, we also assembled a Review Task Force (RTF) of five experienced program committee members to help ensure review quality and encourage positive discussion. RTF members provided feedback on reviews, helped manage online discussion, and acted as proxies for program committee members not in attendance in the in-person program committee meeting, in exchange for a reduced reviewing workload. We found significant value in the RTF, and expanded their roles this year, particularly in facilitating online discussion and helping reviewers calibrate the new review outcomes across papers.

We received 260 submissions in the fall November 15, 2018 deadline. We administratively rejected four papers for violating the call for papers, and two papers were withdrawn, leaving 254 submissions to be considered in Fall Round 1. Each paper was assigned two reviews in the first round. Following three weeks of review and a week of online discussion, 93 papers were early rejected on December 14. Of these, 41 were Rejected and 45 received a Reject and Resubmit outcome. A paper was rejected if it received only scores of Reject or Reject and Resubmit, and neither reviewer saw value in additional reviews. The outcome was agreed upon by the reviewers. Authors of rejected papers were not given the opportunity to appeal. We believed that this early rejection step was critical, because it meant that the authors could immediately begin making changes to their submission and have it evaluated by other reviewers at another venue. The authors of the remaining 161 papers were given the opportunity to respond to the reviews and specific questions from the reviewers. Each fall Round 2 paper received two or more additional reviews. After three more weeks of reviewing and 1.5 weeks of online discussion, we notified authors of the Round 2 decisions on January 18, 2019. Of these papers, 11 were Rejected, 77 received a Reject and Resubmit Outcome, 48 received a Major Revision outcome, 20 received a Minor Revision outcome, and 5 were Accepted. All 20 Minor Revision papers from the fall submission deadline were accepted by February 18, 2019.

We received 481 submissions in the winter February 15, 2019 deadline. 38 of these were resubmissions of papers that received a Major Revision decision from the fall deadline. Additionally, the authors of two Major Revision papers explicitly wrote to withdraw their paper from the USENIX Security review process. We administratively rejected 20 papers for violating the call for papers, and four were withdrawn by the authors, leaving 457 papers to be considered in the winter Round 1. We assigned the same reviewers as in the previous round to the resubmitted Major Revision papers, except in cases where additional conflicts of interest arose or were discovered between the two deadlines, and assigned two reviewers to all other papers. 211 papers were early rejected on March 21, 2019: 122 Rejected and 89 Reject and Resubmit. We also asked the reviewers on Major Revision resubmissions to make decisions in Round 1: six papers were Accepted, 24 papers received a Minor Revision, one paper received a Reject and Resubmit, and seven papers were Rejected. We chose to disallow multiple Major Revision decisions in order to make sure that paper outcomes were decided in a reasonable time frame for authors. This left 216 papers in Round 2.

The in-person PC meeting was held on April 29 and 30 at the University of Florida in Gainesville, Florida. We invited all program committee members to attend the meeting but made attendance optional; 49 program committee members attended. We were able to discuss 91 papers during the meeting, and all other decisions were made in online discussion. Among the papers in Round 2, 11 papers were Accepted, 48 received Minor Revisions, 33 received Major Revisions, 108 received a Reject and Resubmit outcome, and 16 were Rejected. Further, one Minor Revision paper was ultimately rejected by the reviewers; all the others were accepted by the camera-ready deadline of June 1.

In total, we accepted 113 of the 697 distinct, non-withdrawn submissions that we received this year, for a 16% acceptance rate overall. The acceptance rate for the resubmitted Major Revision papers was 76%. Both the number of papers accepted and the number of papers submitted are new records for the symposium, which was exceptionally competitive this year. We congratulate the authors on their excellent work and achievements!

It was an honor to be part of the large community effort that brings together the USENIX Security Symposium. The demands placed on the program committee this year were exceptionally high, both in terms of reviewing load and in calibrating a new reviewing system. Each member submitted about 22 reviews, for a total of 822 reviews in the fall and 1450 reviews in winter, or 2272 reviews total, and more than 8600 comments were left in the discussions. It is our sincere hope that the new process not only assisted in creating the strongest possible program, but also that it helped to improve the quality of reviews and mentorship provided to the community.

We would especially like to thank our Review Task Force: Kevin Butler, Srdjan Capkun, Rachel Greenstadt, Jon McCune, and Franzi Roesner. Yoshi Kohno was our steering committee liaison and was a great help. Michael Bailey also provided valuable feedback from the board. We also thank the many external reviewers who provided additional expertise. We would like to thank the invited talks committee (Devdatta Akhawe, Alex Gantmann, Giancarlo Pellegrino, Elissa Redmiles), the Test of Time award committee (Matt Blaze, Dan Boneh, Kevin Fu, Fabian Monrose), the poster session chair Brad Reaves, and the lightning talks chair Christina Garman. We are extremely grateful to the staff at USENIX who run everything behind the scenes, particularly Casey Henderson, Jasmine Murcia, and Michele Nelson. Finally, we thank all of the authors of the 703 submitted papers for participating in the 28th USENIX Security Symposium.

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