SIGOPS Annual Report July 2016 – June 2017

SIGOPS addresses a broad spectrum of issues associated with operating systems research and development. Although many of the members are drawn from industry, academic and government professionals are also represented in the membership.

Overview

This was the second year for Robbert van Renesse (Cornell) as Chair, Shan Lu (University of Chicago) as Vice Chair, Kaoutar El Maghraoui (IBM Research) as Treasurer, and Håvard Johansen (University of Tromsø, Norway) as Information Director. As will be clear from the material below, SIGOPS is a highly active organization. In addition, the two main chapters of SIGOPS, EuroSys and ChinaSys, are both very active. Eurosys organizes a large conference annually and ChinaSys organizes two large meetings per year. We are excited to hold our flagship conference, SOSP, for the first time in Asia. SOSP 2017 will be held in Shanghai. Professional SIGOPS membership dues remain at \$10, and student membership is just \$5 per year.

SIGOPS publishes a quarterly newsletter, *Operating Systems Review (OSR)*, which focuses on specific research topics or research institutions, manages an electronic mailing list, and maintains a web site: http://www.sigops.org/. Jeanna Matthews and Tom Bressoud have retired as co-editors of Operating System Review. These posts have been taken over by Mark Silberstein (Technion) and Chris Rossbach (UT Austin). They are planning issues for mid-July and mid-December in 2017. In order to help with the mechanics involved in this publication, we have added a new position: SIGOPS Publication Director, a role now filled by Kishore Pusukuri of LinkedIn.

SIGOPS encourages participation in conferences and career building activities for young members of the community. For example, substantial funding was provided this year as travel grants for students to attend conferences and diversity workshops, with many of these grants targeted at women and underrepresented minorities. As of May 2017, we supported the following with student travel grants: PODC 2016, APSYS 2016, CRA Grad Cohort Workshop, and SOCC 2016. A total of \$29,950.80 has been spent on travel grants so far. For the 2016 fiscal year, the list is: SOCC 2015, CRA Grad Workshop, APSYS 2015, ASPLOS 2016, EUROSYS 2015, and VEE 2016. A total of \$44,043.62 was spent on travel grants.

SIGOPS started providing sponsorship for childcare services at major systems conferences in the past year to promote diversity. At OSDI'16, SIGOPS sponsored an onsite childcare program that was used 6 kids from 4 families, costing about \$10,000; at EuroSys'17, SIGOPS sponsored an onsite childcare program that was used by 2 kids from 2 families, costing about \$1,000. At the coming SOSP'17 in China, we plan to sponsor childcare grants that conference participants can apply. Although we are still experimenting different ways to provide such services, we already got positive feedback from the community about this initiative.

We have taken over the popular HotOS workshop from USENIX. HotOS XVI was held May 7-10 at Whistler in Canada, and the workshop featured 64 attendees (among which 21 students and 18 industrial attendees) and 2 invited speakers. Industrial sponsorship reached a \$21K record for this workshop. The workshop ran with a small surplus. Given these promising results, we are certainly looking at doing it again next year.

Awards

The SIGOPS Dennis M. Ritchie Doctoral Dissertation Award 2016 committee was run by Nickolai Zeldovich (MIT),
 Andrew S. Tanenbaum (VU, Amsterdam), and Yuanyuan Zhou (UCSD). The award went <u>Vijay Chidambaram</u>'s
 "Orderless and Eventually Durable File Systems", advised by Andrea Arpaci-Dusseau and Remzi Arpaci-Dusseau at

University of Wisconsin-Madison. <u>Charles M. Curtsinger</u>'s <u>"Performance Analysis and Debugging"</u>, advised by Emery D. Berger of the University of Massachusetts at Amherst got an Honorable Mention.

- The Mark Weiser Award 2016 was awarded to Antony Rowstron of Microsoft Research Cambridge. The committee consisted of Stefan Savage (UCSD), Margo Seltzer (Harvard), and Peter Druschel (MPI-SWS).
- The 2016 ACM SIGOPS Hall of Fame award went to Fay Chang, Jeffrey Dean, Sanjay Ghemawat, Wilson C. Hsieh,
 Deborah A. Wallach, Mike Burrows, Tushar Chandra, Andrew Fikes, and Robert E. Gruber. <u>Bigtable: A Distributed Storage System for Structured Data</u> In 7th USENIX Symp. on Operating Systems Design and Implementation (OSDI '06), November 2006. The committee consisted of Tom Anderson, Rich Draves, Jason Flinn, Frans Kaashoek,
 Kimberly Keeton, Hank Levy. Jeff Mogul. Timothy Roscoe, Amin Vahdat, and Robbert van Renesse.
- The SIGARCH/SIGPLAN/SIGOPS ASPLOS Influential Paper 2017 went to "Automatically characterizing large scale program behavior", Timothy Sherwood, Erez Perelman, Greg Hamerly, Brad Calder (University of California at San Diego) from ASPLOS 2002.

Conferences

- The 26th Symposium on Operating Systems Principles (SOSP 2017) is to be held in Shanghai. It is 100% sponsored by SIGOPS. The General Co-Chairs are Haibo Chen (Shanghai Jiao Tong) and Lidong Zhou (Microsoft Research). The PC Co-Chairs are Peter Chen (UMich) and Lorenzo Alvisi (Cornell). The Steering Committee consists of Dilma Da Silva, Mike Dahlin, Peter Druschel, Steven Hand, Hank Levy, and Ethan Miller. Andrew Birrell who served on the committee passed away December 2016.
- The 13th Eurosys Conference (Eurosys 2017) was held in Belgrade in April. Sponsored by SIGOPS and Eurosys.
- The 22nd ACM International Conference on Architectural Support for Programming Languages and Operating Systems (ASPLOS 2017) was held in Xi'an, China in April. ASPLOS is sponsored 25% by SIGOPS, 50% by SIGARCH, and 25% by SIGPLAN.
- The 12th ACM SIGPLAN/SIGOPS international Conference on Virtual Execution Environments was collocated with ASPLOS in Xi'an. VEE is sponsored 50% by SIGPLAN and 50% by SIGOPS.
- The 35th Annual ACM SIGACT-SIGOPS Symposium on Principles of Distributed Computing (PODC 2016) was held in Chicago in July. PODC is sponsored 50% by SIGOPS and 50% by SIGACT.
- The 7th ACM Symposium on Cloud Computing (SOCC 2016) was held in Santa Clara, CA, in October. SOCC is sponsored 50% by SIGOPS and 50% by SIGMOD.
- The 14th ACM Conference on Embedded Networked Sensor Systems (SenSys 2016) was held in Stanford, in November. Sensys is sponsored 10% by SIGOPS, SIGARCH, SIGMETRICS and SIGBED, 30% by SIGMOBILE, and 30% by SIGCOMM.
- The 7th SIGOPS Asia-Pacific Workshop on Systems (APSys) was held in August in New Delhi, India. APSys is 100% sponsored by SIGOPS.
- The 10th ACM International Systems and Storage Conference (SYSTOR) was held in Haifa in May 2017. It is 100% sponsored by SIGOPS.

- The 16th ACM SIGOPS Workshop on Hot Topics in Operating Systems (HotOS 2017) was held in Whistler, BC, in May 2017. It is 100% sponsored by SIGOPS. (Until now it was organized by USENIX.)
- We sponsored the 2017 CRA-W Grad Cohort Workshop, held in Washington D.C. in April 2017, at the
 Bronze level sponsorship. A record 550 women graduate students attended, representing over 179 institutions
 in North America and 65% with their citizenship elsewhere. A total of 100 of these masters and PhD students
 are working in SIGOPS areas, with 18 in core OS, 48 in Networking and 32 in Distributed Systems.
- In-cooperation events included USENIX events OSDI 2016, FAST 2017, and NSDI 2017.

Exciting Initiatives

- We are putting on another Diversity Workshop co-located with SOSP 2017.
- SOSP 2017 will also feature a day of tutorials for people new to SIGOPS, and, for the first time, a Student Research Competition.
- We are working on granting ChinaSys members automatic membership to SIGOPS.
- We are organizing a biennial SIGOPS Summer School, the first one to be held in August 2018 in Norway, and the next one to be held in China in 2020.