

# 42nd IEEE Symposium on Security and Privacy

Sponsored by the IEEE Computer Society Technical Committee on Security and Privacy in cooperation with the International Association for Cryptologic Research **Program Chairs Welcome** Alina Oprea Northeastern University, Ruhr-Universität

Boston, MA, USA

Ruhr-Universität Bochum, Germany

## Welcome!

 Welcome to the 42<sup>nd</sup> IEEE Symposium on Security and Privacy

– Flagship security conference

- We have four exciting days of online talks and discussion ahead of us!
- We have one day of workshops on Thursday, May 27

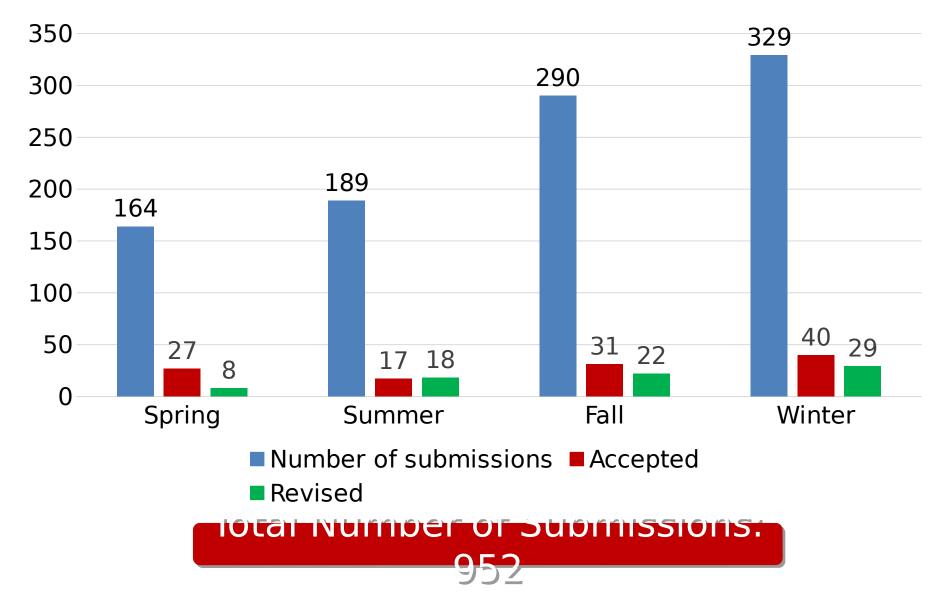
# **Reviewing Process**

- Quarterly submission deadlines
  - -4 deadlines this year: Spring, Summer, Fall, Winter
- Two rounds of reviews
  - Early reject notifications sent after 1.5 months
  - Notifications sent to all authors within 2.5 months from submission
  - Second-round papers reviewed by at least 4 PC members
  - -Decisions: Accept (with Shepherding), Reject, or Revise
- Revised papers
  - Revised papers are given specific requirements and can resubmit to next 2 cycles a revision that addresses them
  - Ensure that the same PC members are reviewing the revision

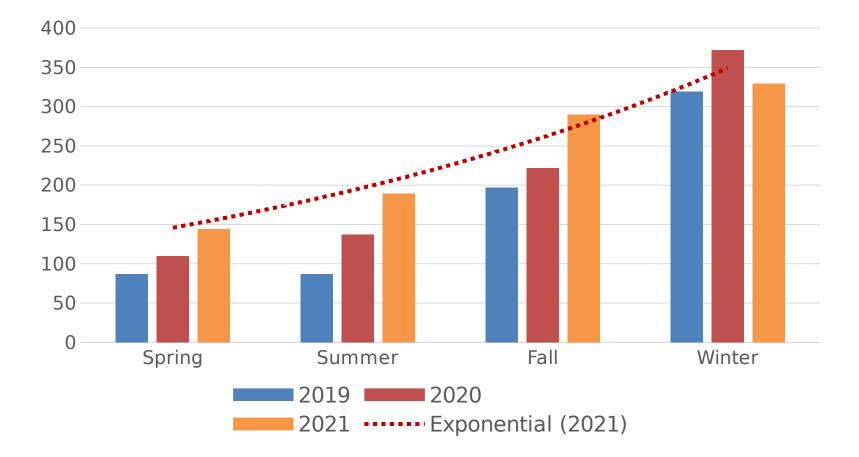
# Program Committee

- Large and diverse Program Committee (127 members)
  - Wide geographical distribution, broad expertise, industry and government representation
- Every PC member participated in all reviewing cycles
- PC members reviewed on average 22 papers in the entire year (4-8 papers per cycle)
- Strived for positive and constructive online discussion
- A selected set of papers were discussed in the quarterly virtual PC meeting

### The 2021 S&P Conference

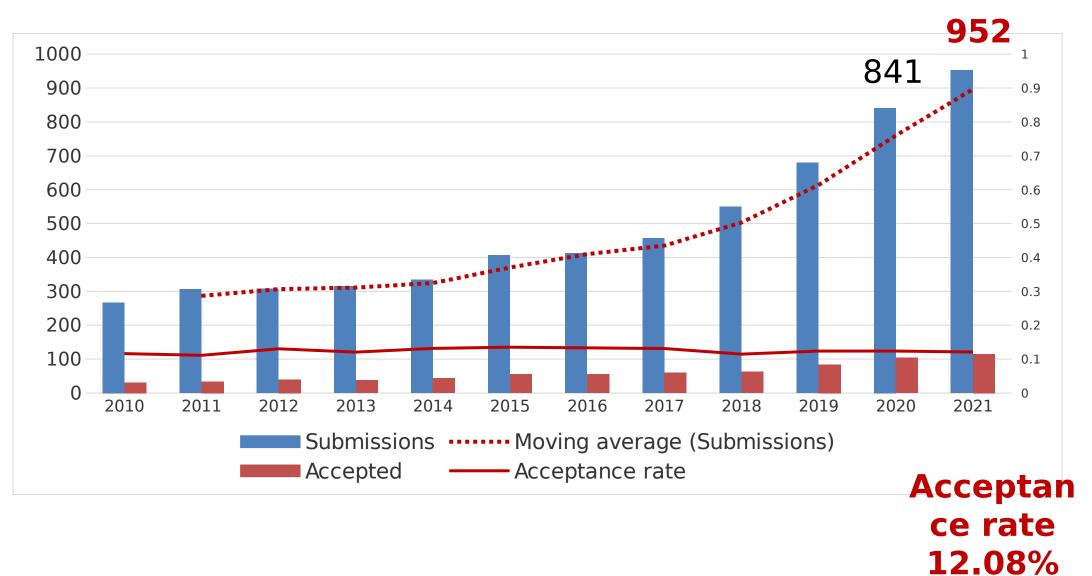


#### Quarterly Submissions in 2019, 2020, and 2021



- Consistent growth year-to-year
- More submissions in the Fall and Winter cycles

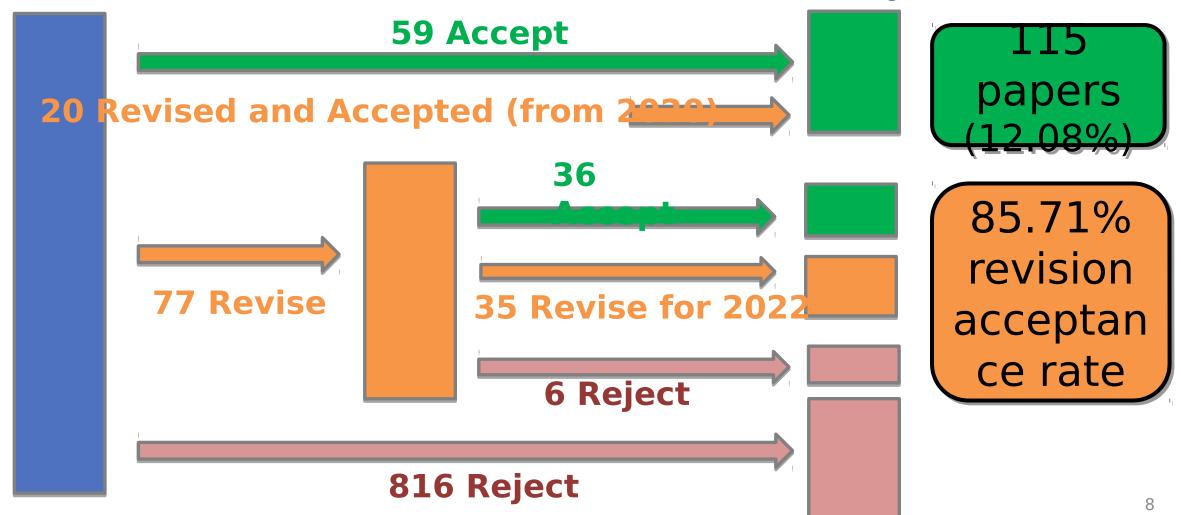
### **Historical Statistics**



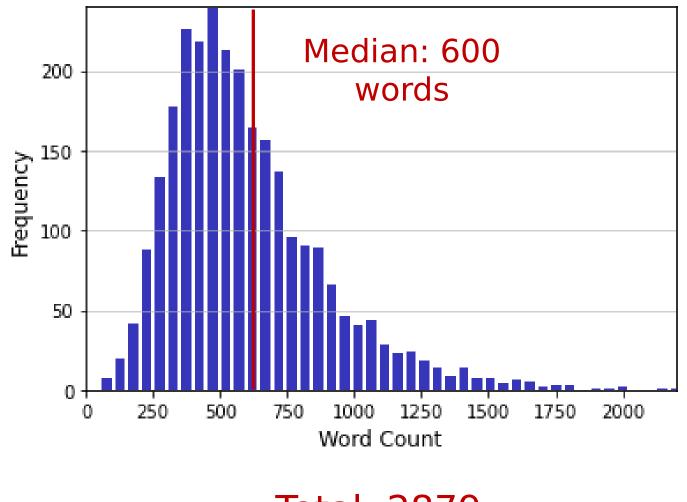
### From Submissions to the Program

#### 952 Submissions

2021 Program

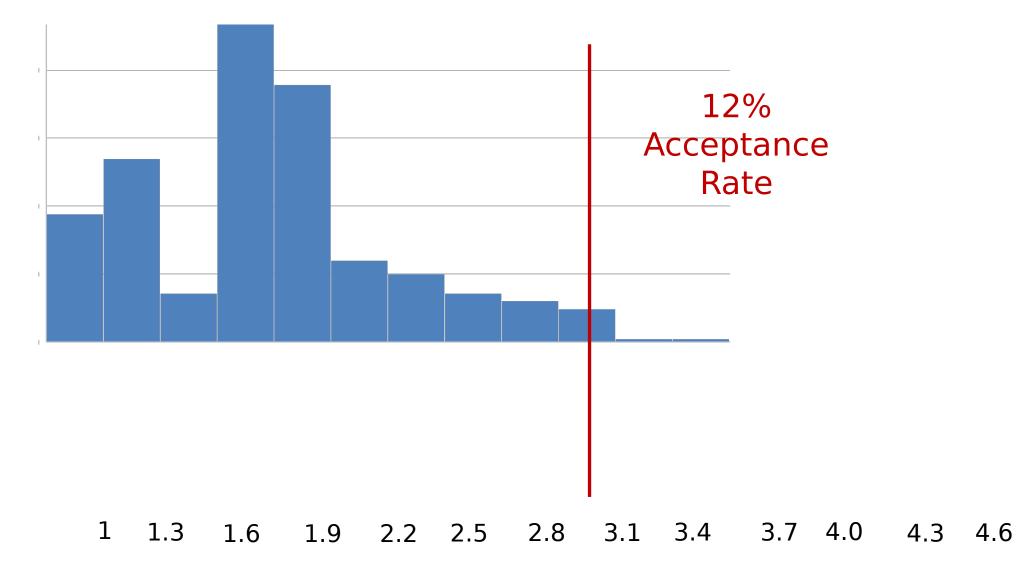


### **Review Length**

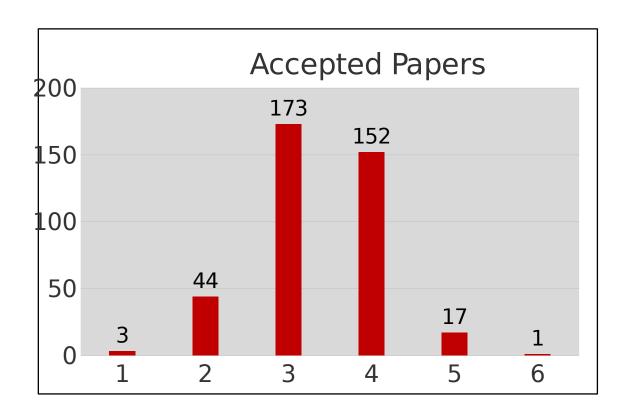


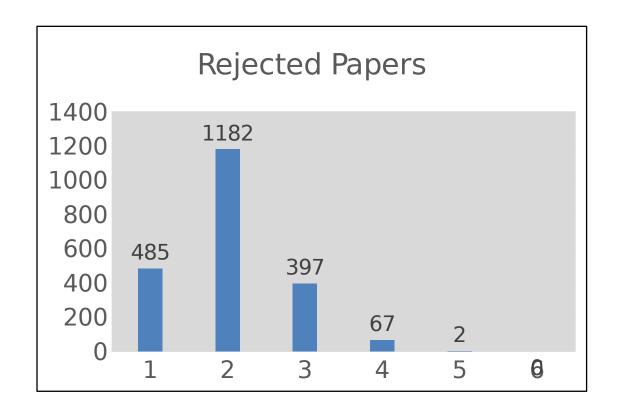
Total: 2879

### **Overall Merit Score**



# **Reviewing Scores**





# Average: 3.35

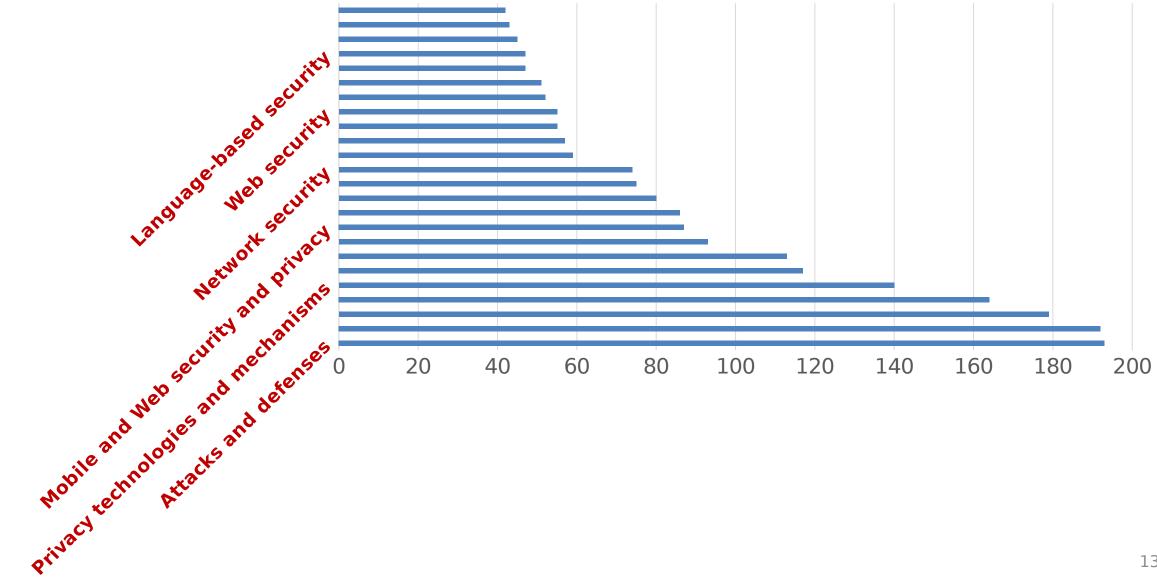
Average: 2.02

## Scores for SoK Papers

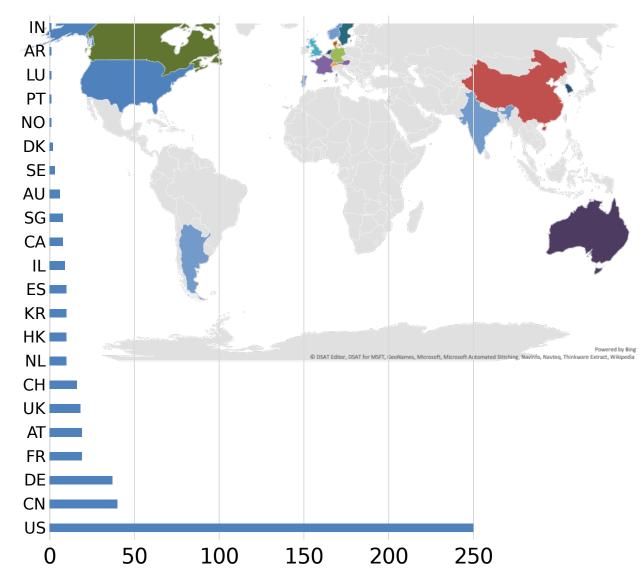
#### SoK Papers **Regular Papers**

- SoK and Regular papers have different score distributions
- Difference is statistically significant (two-sample T-test, Kolmogorov-Smirnov test, Epps-Singleton test)

#### Paper Topics



### Author Geographical Representation



# "Hypocrite Commits" Paper

- Paper was accepted and later withdrawn by authors
- PC statement covers both technical and ethical aspect of submission, available on IEEE S&P'21 website
- "Ethics in Security and Privacy Research" Panel on May 25 from 8:00 – 8.:45am
- IEEE S&P'22 will introduce ethical review board (ERB), CfP will also be updated to better reflect the expectations regarding ethical considerations and human-subjects research

# **Revised Rolling Submission Model**

- IEEE S&P'22 PC chairs: Thorsten Holz and Thomas Ristenpart
- Change in submission deadline for next year's conference
  - Four deadlines for 2021: March 5, June 4, September 3, and December 3, 2020
  - Three deadlines for 2022: April 15, August 19, and December 2, 2021
  - Enables more time between reviewing cycles
- Rebuttal phase
  - Authors can exchange messages with reviewers
  - Communication via HotCRP for five days

# Thanks!

- Authors and speakers
- Conference attendees
- Organizing committee
  - General chair: Alvaro Cárdenas; Vice chair: Rakesh Bobba
  - IEEE Computer Society's Technical Committee on Security & Privacy and its chair Ulfar Erlingsson, vice chair Bryan Parno, and ex-chair Sean Peisert
  - -The IEEE S&P steering committee
- Program committee and external reviewers
- Many others responsible for making things run smoothly

# **Enjoy the Virtual Conference!**

AWARDS

# Award Selection Process

- Award selection committee
  - –PC chairs: Alina Oprea and Thorsten Holz
  - PC members: Carmela Troncoso, David Kohlbrenner, Nicolas Christin, Srdjan Capkun, and Yongdae Kim
- Shortlist of 10 papers after first voting round
- Voting among the 7 committee members
- Sponsored by Security



### **Best Paper Awards**

#### **Compositional Security for Reentrant Applications** Ethan Cecchetti, Siqiu Yao, Haobin Ni, and Andrew C. Myers

**Cornell University** 

#### Hardware-Software Contracts for Secure Speculation

Marco Guarnieri (IMDEA Software Institute), Boris Köpf (Microsoft Research), Jan Reineke (Saarland University), and Pepe Vila (IMDEA Software Institute)

### Best Student Paper Award (1/2)

#### CrawlPhish: Large-scale Analysis of Client-side Cloaking Techniques in Phishing

Penghui Zhang (ASU), Adam Oest (ASU), Haehyun Cho (ASU), Zhibo Sun (ASU), RC Johnson (PayPal), Brad Wardman (PayPal), Shaown Sarker (NCSU), Alexandros Kapravelos (NCSU), Tiffany Bao (ASU), Ruoyu Wang (ASU), Yan Shoshitaishvili (ASU), Adam Doupé (ASU), and Gail-Joon Ahn (ASU and Samsung Research)

### Best Student Paper Award (2/2)

#### They Would do Better if They Worked Together: The Case of Interaction Problems Between Password Managers and Websites

Nicolas Huaman (Leibniz University Hannover), Sabrina Amft (Leibniz University Hannover), Marten Oltrogge (CISPA Helmholtz Center for Information Security), Yasemin Acar (Leibniz University Hannover and MPI-SP), and Sascha Fahl (Leibniz University Hannover)

#### **Best Practical Paper Award**

#### The EMV Standard: Break, Fix, Verify

#### David Basin, Ralf Sasse, and Jorge Toro-Pozo ETH Zurich