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Letter from the General Chairs

Most attendees of computer science conferences are used to the drill: over 2–3 days, presenters show up with their slides and deliver a 20–25 minute presentation on completed work. One or two audience members ask questions often intended to boost their own ego and social standing while making the presenter look foolish. Then, the next presentation begins. Whether or not this format is adequate is the subject of considerable debate, but it clearly does not serve well those who seek feedback on early, embryonic ideas, or those who address issues that are broader or more controversial than the safe, technical topics typically sought by conference program committees. We admit that the preceding is a caricature, but like all good sketches, it contains more than a little of the truth.

Since 1992, the New Security Paradigms Workshop has explicitly sought ideas that would not be accepted elsewhere, and attracted participants ranging from those normally outside the computer science community to prominent researchers and “greybeards” at the forefront of the community. NSPW attracts ideas that challenge the foundations of computer security, and the discussions resulting of this are intended to be highly beneficial for all participants. The goal of the workshop is to use the combined experience and knowledge of all participants to develop a better understanding of strengths and potentials, as well as the weaknesses of the presented ideas.

To enable this creative process, a “social contract” is made at the start of the workshop and emphasized throughout: all participants (32 this year) stay at the same venue and do not arrive late or leave early. All participants attend all talks. They get to know each other at meals, breaks, and activities. Questions can be critical but first and foremost should be supportive of the learning process for the group. Grandstanding and ego-driven “questions” are not welcome. Comments on the order of typos and suggestions on helpful references are handled offline.

To allow sufficient discussion of ideas, each presentation is allocated a one-hour time period, but presenters are advised to plan for five to twenty minutes of actual presentation time, depending on how controversial or complete their work is. After a short grace period (usually five minutes), participants are invited to challenge assumptions, make supporting comments, or in general discuss the work’s merit. During the discussion, “scribes” take detailed notes of discussions, questions asked, and comments made during the presentation. After the workshop all presenters receive those notes. Authors then have the opportunity to re-write their paper based on the insights gained during the workshop. Only months after the workshop is the final version of the paper published.

Two other unique features of NSPW support this goal; it regularly aims at bringing together junior scientists with longstanding researchers in the field, and at fostering an open-minded discussion tradition. To enable this, participants are continuously encouraged to participate actively in the workshop—this is not an environment for those who simply want to sit on the fringe and observe. Participants often note this continuing exchange with other participants also outside the workshop sessions as the most outstanding feature. It is not by accident that many first-time contributors return to NSPW in following years.

2011 was, as usual, a wonderful year for NSPW, and the Marconi Conference Center, a California State Historical Park on Tomales Bay, in the town of Marshall, in Marin County, California, represented one
of the most perfectly beautiful places that we’ve seen to immerse attendees in social and technical discourse.

Many people contributed to this year’s success. We thank the program chairs Carrie Gates and Cormac Herley, and the program committee, who selected a “typical” NSPW program, causing intense discussions. Matt Bishop and Michael Locasto deserve special thanks for serving as scribes and ensuring documentation of the discussions of each paper. The articles in these proceedings would not have been possible without these notes. Many thanks also to the local chair, Sophie Engle, for taking care of all the incredibly important details that nobody else remembered. Thanks for the efforts of our publications chair Kosta Beznosov, who worked with the NSPW authors and chairs in order to get these proceedings published; our publicity chair, Christian Probst, who advertised the Call for Papers widely; and our web presence chair Anil Somayaji, who maintained the web site. And last, but not least, we thank the authors, panelists, attendees and other committee members who make NSPW so enjoyable and successful.

NSPW is sponsored by Applied Computer Security Associates (ACSA). We thank them, and especially Marshall Abrams, Jeremy Epstein, and Harvey Rubinovitz, for their constant assistance and support. We are also grateful to Financial Aid chairs Matt Bishop and Angelos Keromytis who organized the collection and disbursement of financial aid to help make it possible for students and others with limited funding to attend. We greatly appreciate the continued support of our financial aid providers, the U.S. National Science Foundation, CA Technologies, and Microsoft, Inc.

Sean Peisert
NSPW 2011 General Chair
University of California, Davis & Lawrence Berkeley National Lab

Richard Ford
NSPW 2011 Vice Chair
Florida Institute of Technology
The New Security Paradigms workshop (NSPW) is unique among conferences, focusing on work that directly challenges long-held beliefs about security, or that challenges attendees to look at problems – and their solutions – in entirely new ways. This year’s papers continue this tradition, with work that touches on many of the major challenges facing computer security today. Resilience, Usable Security and Human Factors, Privacy and Inference, Web Application Security… all these problems were examined, as well as less mature areas, including how we should approach solving security problems and how we can appropriately evaluate solutions. We even had a paper that explored what happens (or should happen) to your digital identity after death! Each paper in some way challenged previously-held assumptions, and forced attendees to carefully examine their beliefs.

As one might expect, reviewing papers that are designed to be provocative was a non-trivial undertaking. Our twelve program committee members (to whom we are extraordinarily grateful) each reviewed approximately eight papers, and then began a vigorous discussion on the merits of each, sometimes resulting in some committee members being asked for additional reviews of papers that seemed especially contentious. Unlike other security conferences, NSPW seeks those submissions that hold truly new paradigms, even if not proven, and so often the discussion over each paper can be very spirited as committee members discuss the novelty of the paradigms being presented. Once consensus had been reached, shepherds were assigned to each accepted paper, in order to help authors prepare for the workshop experience.

As a participant, the NSPW experience is unusual. Attendees agree to a “psychological contract,” where each person agrees to try to foster new thought, attend all sessions (without having one’s nose buried in a laptop!), and, above all, engage in the discussion. Presentations quickly deviate from their script as presenters respond to questions and comments from the audience, and it is not unheard of for the vast majority of each talk to be filled with a two-way conversation with the audience rather than a one-way transfer of information. Despite this vigorous discussion, however, NSPW remains above all a nurturing venue, and one in which we are happy (and proud) to place students as presenters.

In order to further help authors refine their ideas, all the discussions for each paper are recorded by two scribes, who then provide their notes to the authors for reference while they prepare the camera-ready versions of their papers. This is another area where NSPW deviates from traditional security conferences – papers are not submitted for publication until after the workshop has ended, and authors are expected to revise their submissions based on the feedback they received at the workshop.

As should be clear, NSPW thus required a significantly larger time and energy commitment from program committee members, authors, and participants than is the norm for security venues. We believe their effort was worthwhile; after reading these proceedings, we hope you will agree. In closing, we would like to thank the scribes, the organizers of the workshop, all the program committee members and external reviewers, other workshop attendees, and especially the authors for making this year’s workshop yet another success in the NSPW series. We hope to see you all again at next year’s workshop!

Carrie Gates  
NSPW 2011 Program Co-Chair  
CA Labs

Cormac Herley  
NSPW 2011 Program Co-Chair  
Microsoft Corporation
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