

National Security After 9/11: Technology & the Law

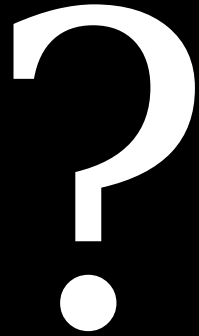
Ladue Chapel Presbyterian Church

R. Scott Granneman

Denise Lieberman

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- TV crime drama compound highlights immune cells' misdeeds
- Teach For America founder Wendy Kopp to deliver Washington University's 148th Commencement address
- Men repeat as Div. III champs, women fall short
- View all news stories/news media resources



Technique measures heat transport in the Earth's crust

Events & Announcements

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- McDonnell International Scholars Academy
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Legal Director of ACLU-EM
1997-2005

Courts & Civil Liberties
National Security, Civil Liberties
& the Law
Gender & Law
Sexuality & Law
Technology & the Law



Missouri Voter Protection Coordinator



Technology
never gets worse.
It only gets better.

Bruce Schneier



Law
is like
cement

Civil Liberties & Crisis

Throughout history,
conflicts have coincided
with curbs on civil liberties

1861

President Lincoln
suspends Habeas Corpus



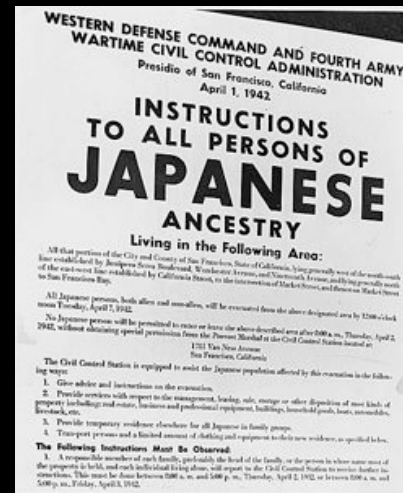
World War I
Espionage Act
Restrictions on
German & Russian immigrants



WWII

Internment of Japanese Americans

Military Tribunals



Cold War

Surveillance & investigation
of political groups

House Un-American
Activities Committee



Vietnam War & Civil Rights Movements

Targeting of protesters
Expansion of FBI powers



9/11



How is
9/11
different?

Technology...
changes how threats operate
changes how governments respond

Nature of threats different

Non-state-sponsored

Less hierarchical

Dispersed

Anonymous

Our response is different
Near-constant surveillance

Year	Incident	Deaths
1983	Beirut barracks	242
1985	Air India Flight 182	329
1993	World Trade Center	6
1995	Oklahoma City	168
1998	U.S. embassies in Kenya & Tanzania	224
1998	Lockerbie Bombing	270
2001	9/11	3000

Operation Aurora

Cyber attacks
2nd half of 2009

NORTHROP GRUMMAN

Google



YAHOO!



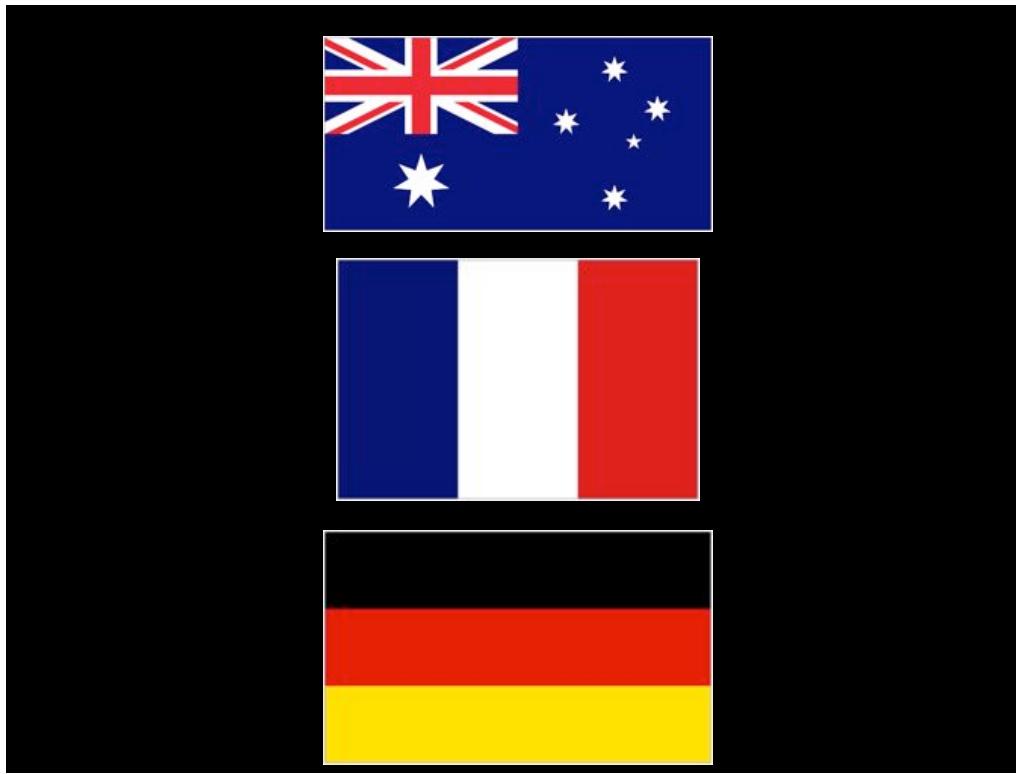
A Adobe



Google's programming code stolen
Gmail accounts of dissidents hacked

Attackers used
zero-day vulnerabilities
in Internet Explorer

Microsoft later admitted
it had known about the holes
since September 2009

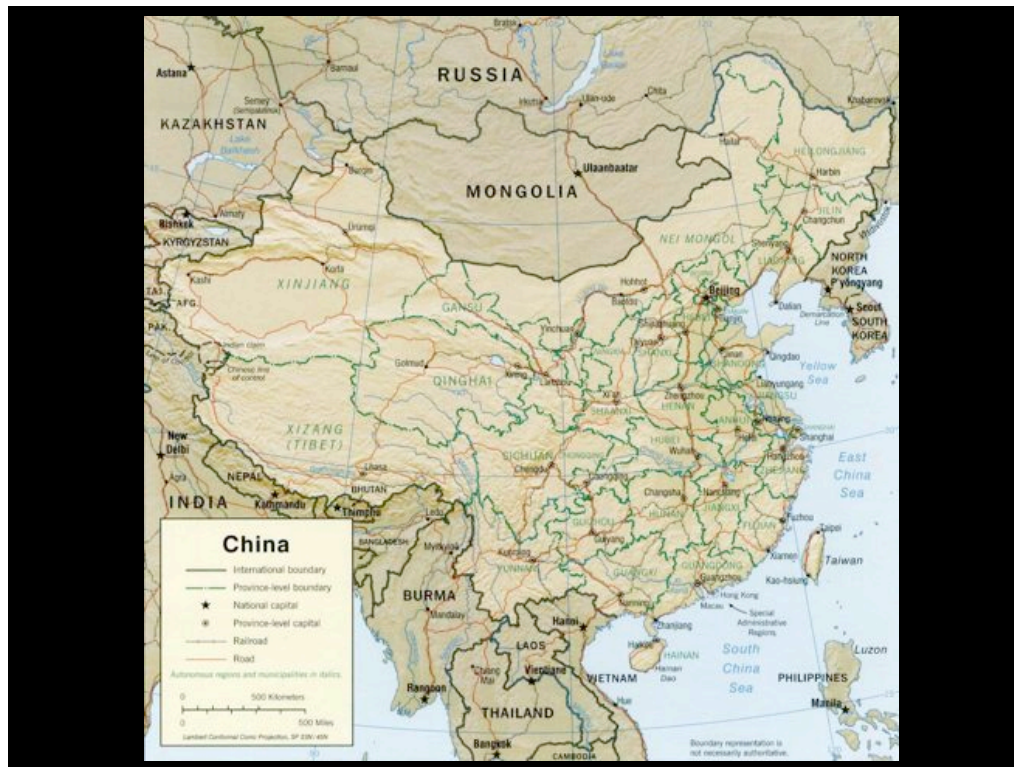


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Australia, France, & Germany warned Windows users



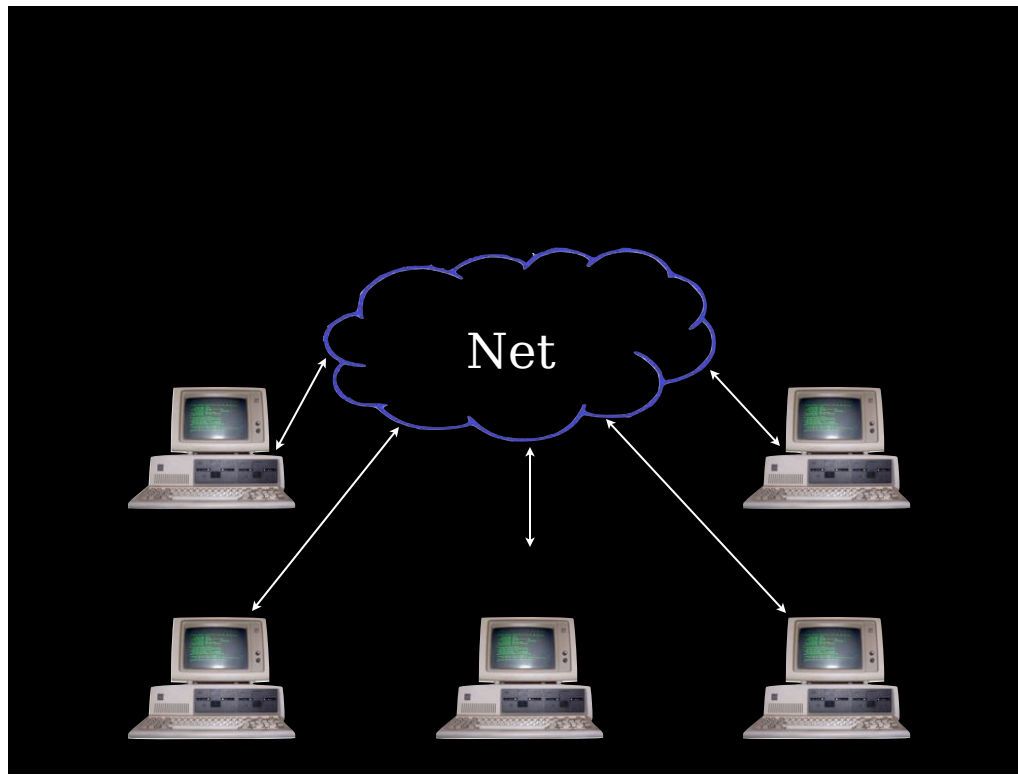


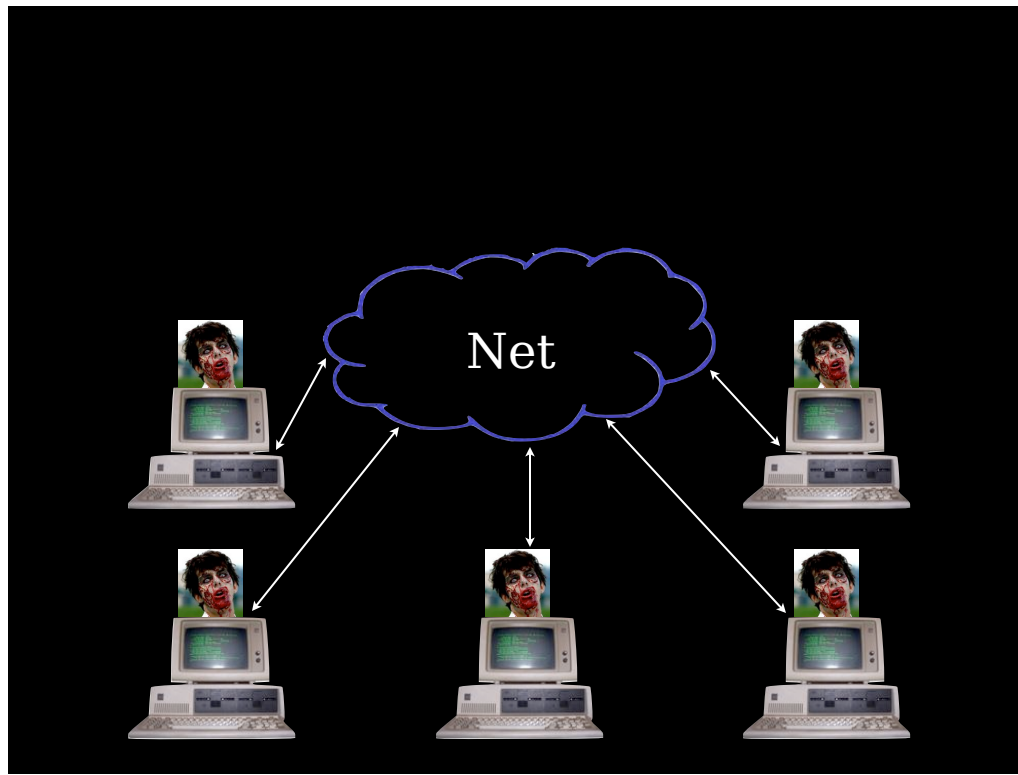


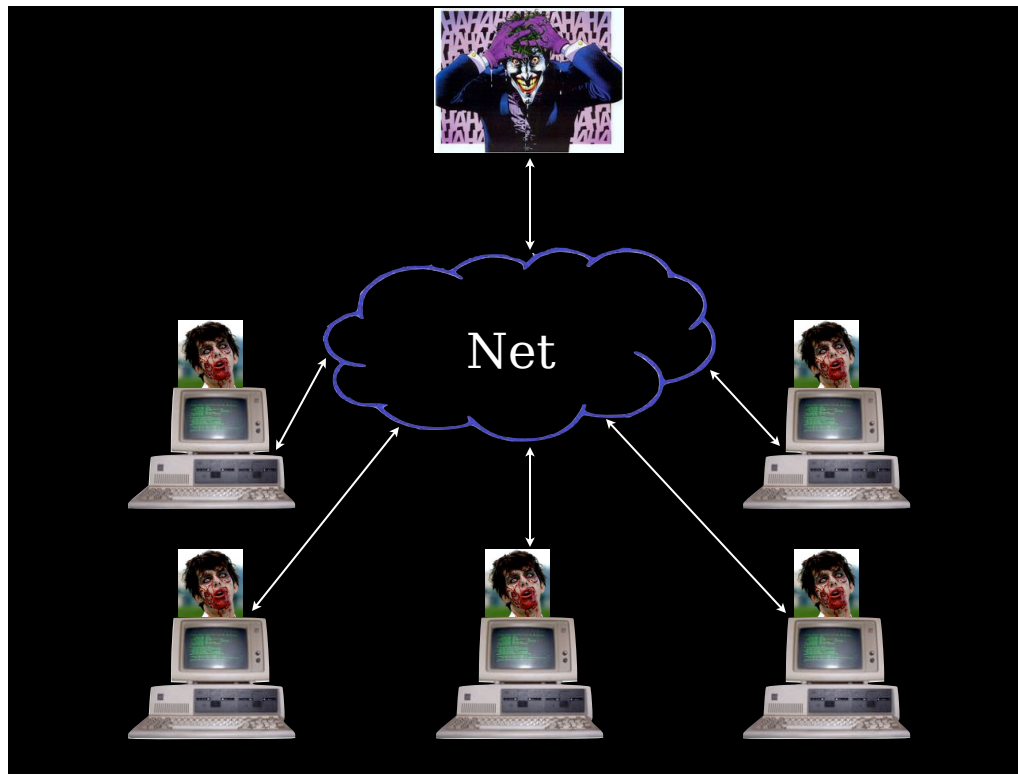
Botnets

June 2007
FBI announces botnet
containing
over 1 million Windows PCs

What Botnets Are





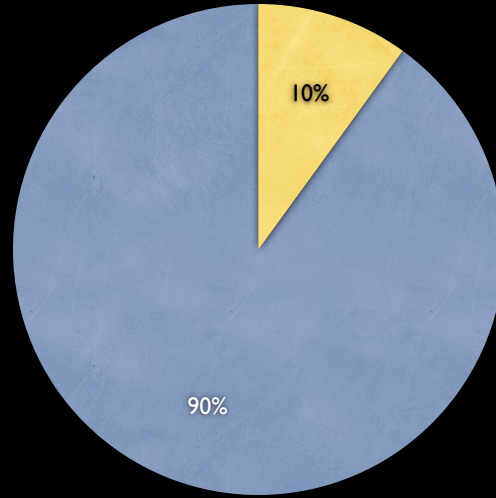


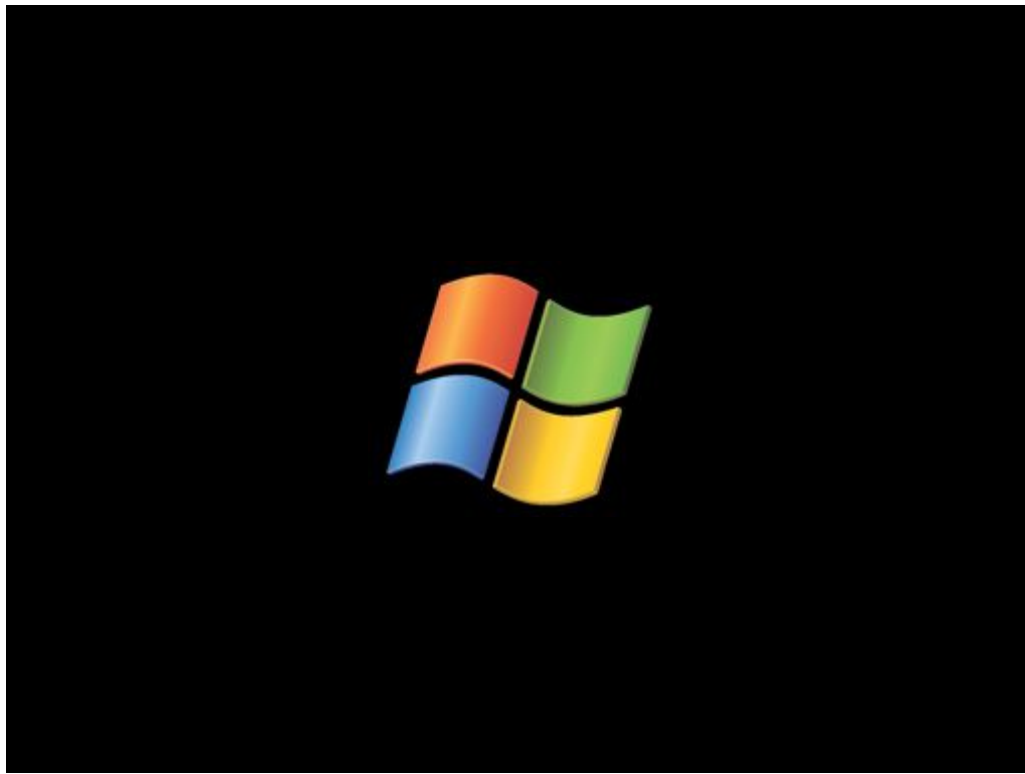
How Botnets Spread

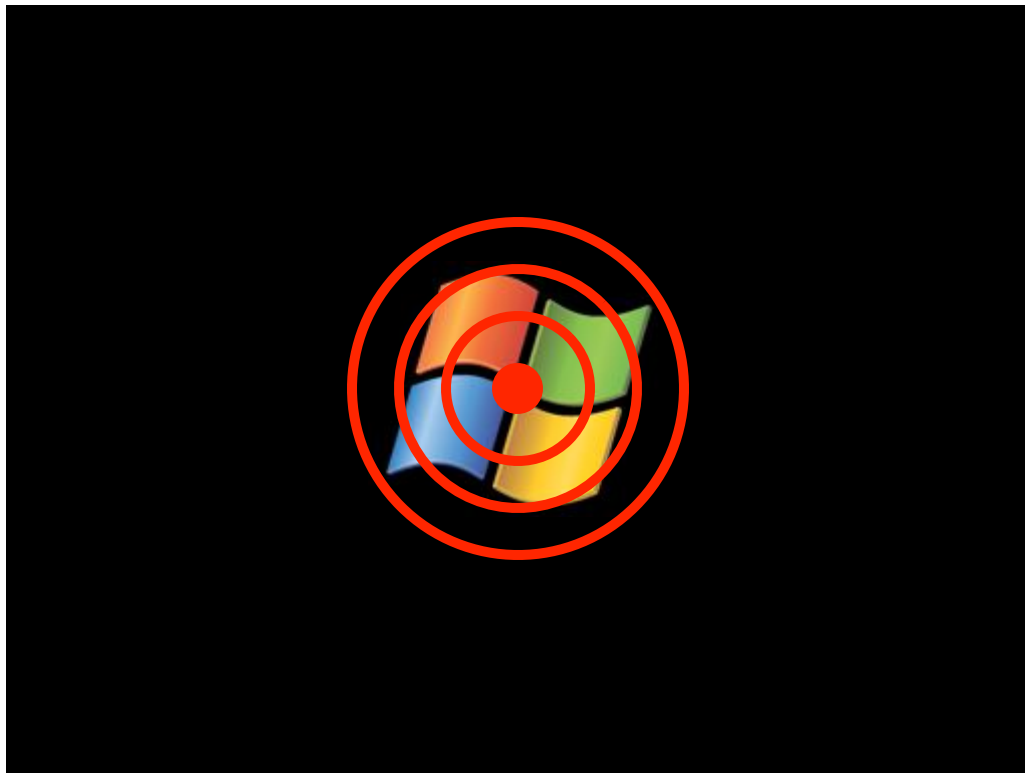
Google researchers examined 4,500,000 web pages

<http://www.networkworld.com/community/?q=node/15121>
http://www.usenix.org/events/hotbots07/tech/full_papers/provos/provos.pdf

● Malware or Malware Installs ● Safe

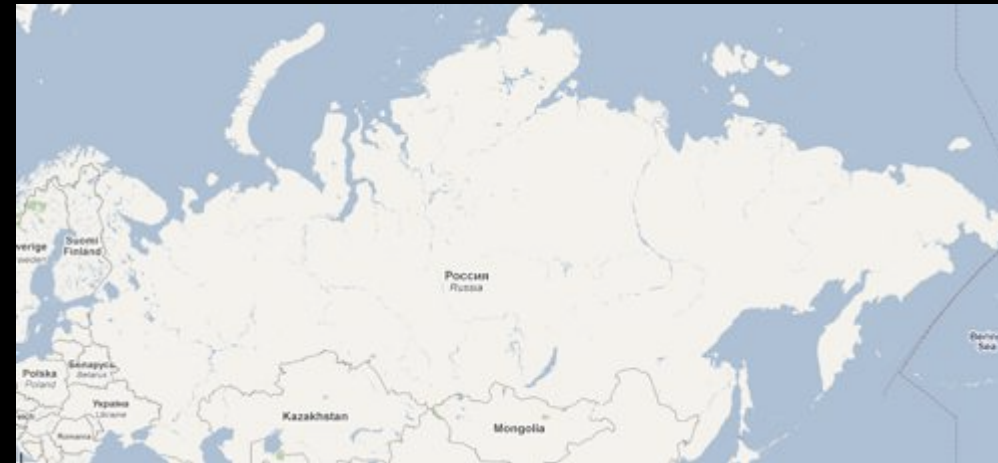




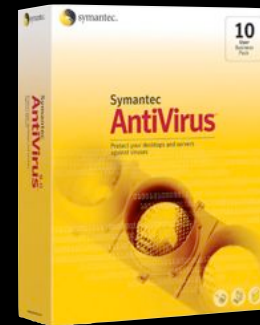
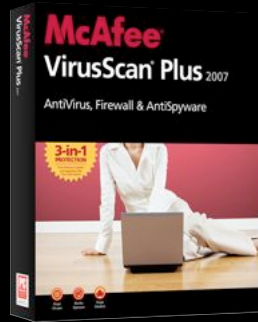


Storm

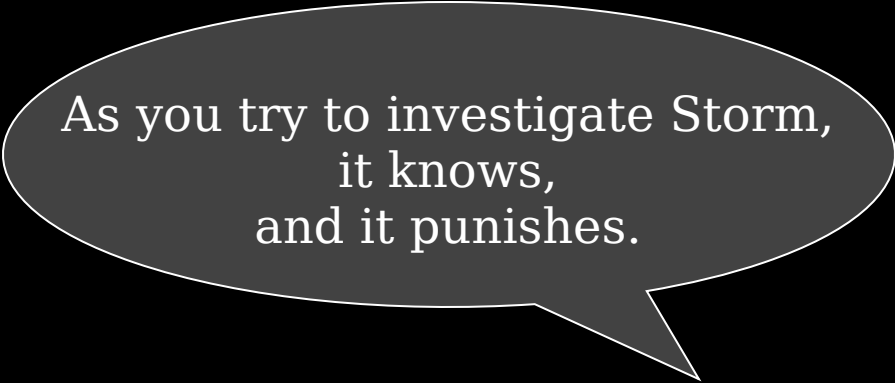
“Professionalized crimeware”



Works like peer-to-peer network
No central location
& no one command point to take out
Communications encrypted







As you try to investigate Storm,
it knows,
and it punishes.

Security
researcher

Who?



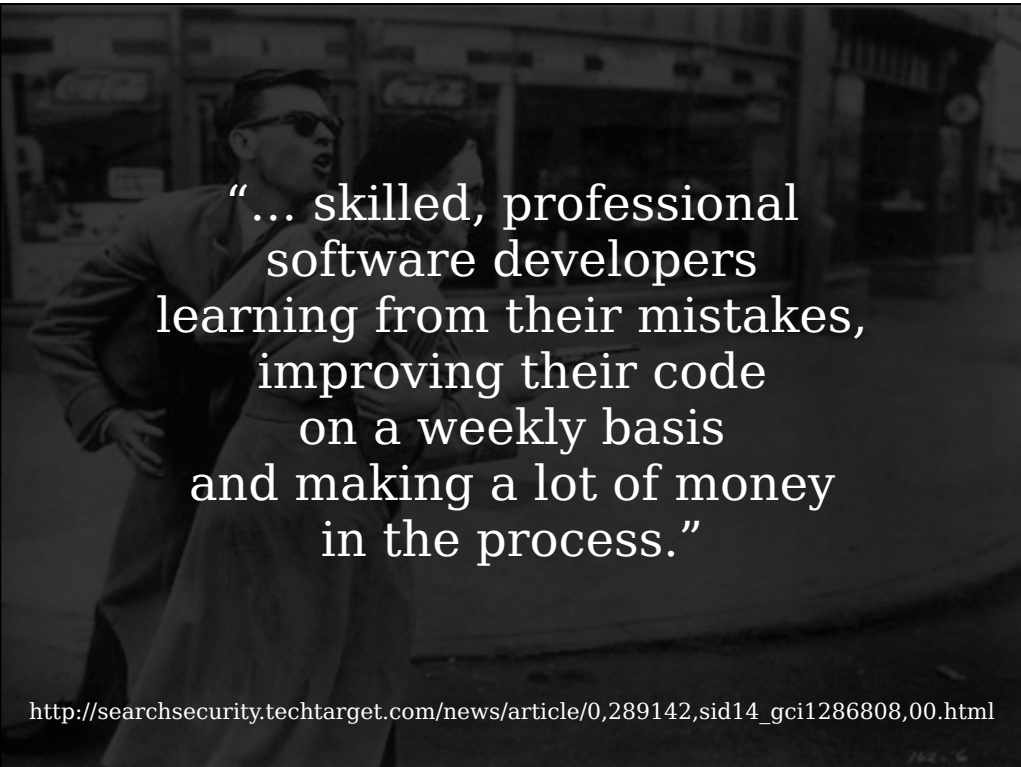
MGM/UA
ENTERTAINMENT CO.

WAR GAMES

UIP







“... skilled, professional software developers learning from their mistakes, improving their code on a weekly basis and making a lot of money in the process.”

http://searchsecurity.techtarget.com/news/article/0,289142,sid14_gci1286808,00.html

Why?





Spam

Keylogging

Phishing

Porn

DDoS

Infiltration

$\frac{\$100}{\text{day}}$	DDoS attacks
\$1000	10,000 bots for spam

56

Source: Espiner, Tom. "Cracking open the cybercrime economy". ZDNet (14 December 2007). http://news.zdnet.com/2100-1009_22-6222896.html. Accessed 20 April 2008.

\$1	Credit card & CVV
\$10	Credit card, CVV, & SSN
\$50	Full bank account

57

Source: Espiner, Tom. "Cracking open the cybercrime economy". ZDNet (14 December 2007). http://news.zdnet.com/2100-1009_22-6222896.html. Accessed 20 April 2008.

Surveillance



You have zero privacy anyway.
Get over it.

Scott McNealy,
Sun, 1999



Better & Better





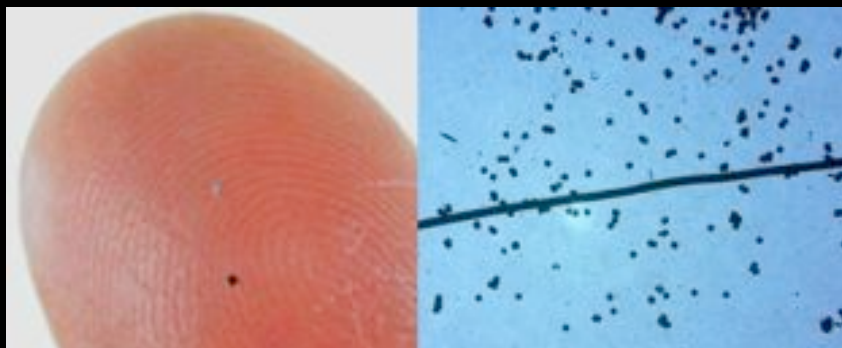


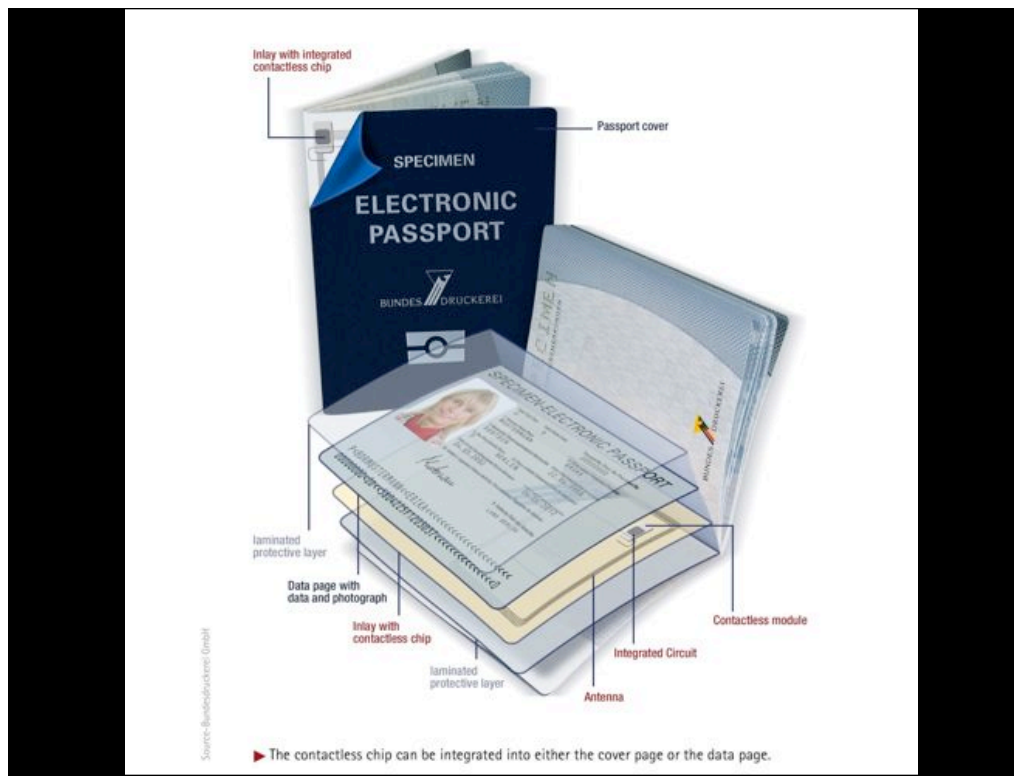




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VeriChip

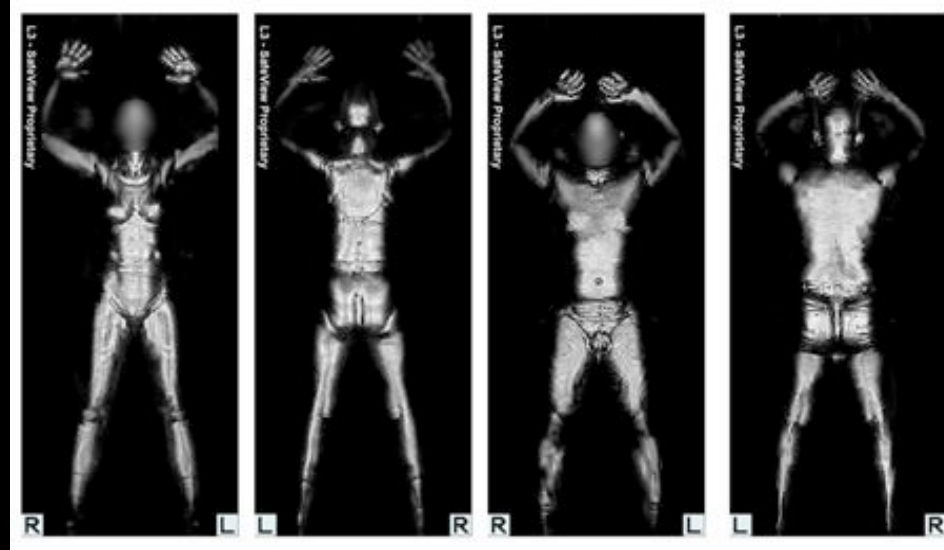




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3 million RFID passports issued in UK – cracked in a few days
Can suck the data off the passport in 4 seconds
Easy to clone passport or detect user

Virtual strip searches?



Virtual strip searches?



Virtual strip searches?



2009
TSA claims
“scanned images
cannot be stored or recorded.”

67

Source: McCullagh, Declan. “Feds admit storing checkpoint body scan images”. CNET News.com (4 August 2010). http://news.cnet.com/8301-31921_3-20012583-281.html. Accessed 07 November 2010.

2010

US Marshals saved 10s of 1000s
of images

TSA requires all scanners
to be able
to store & transmit images

68

Source: McCullagh, Declan. "Feds admit storing checkpoint body scan images". CNET News.com (4 August 2010). http://news.cnet.com/8301-31921_3-20012583-281.html. Accessed 07 November 2010.

Heathrow Airport,
March 2010

Airport worker
photographs woman's image
as she goes through a scanner

69

Source: Tran, Mark. "Airport worker given police warning for 'misusing' body scanner". The Guardian (24 March 2010). <http://www.guardian.co.uk/uk/2010/mar/24/airport-worker-warned-body-scanner>. Accessed 07 November 2010.

The Miami Herald
7 May 2010

“Miami airport screener
accused of attack
after jeers at genitals”

70

Source: Ovalle, David. “Miami airport screener accused of attack after jeers at genitals”. *The Miami Herald* (7 May 2010). <http://www.miamiherald.com/2010/05/06/1617423/miami-airport-screener-beats-co.html>. Accessed 07 November 2010.

The Daily Mail
October 18, 2009
“Child porn fears
scupper airport ‘nude X-ray’ scans”

71

Source: Lewis, Jason. “Child porn fears scupper airport ‘nude X-ray’ scans”. The Daily Mail (18 October 2009). <http://www.dailymail.co.uk/news/article-1221111/Nude-X-ray-scans-scuppered-child-porn-fears.html>. Accessed 7 November 2010.

See also <http://www.inquisitr.com/43215/u-k-airport-bans-nude-x-ray-photos-of-kids-over-child-porn-fears/>

US Government's Response

PATRIOT Act

Expanded government access
without probable cause of a crime

- ✓ Business documents
- ✓ 3rd party documents
- ✓ Electronic communications

FBI given greater latitude
to go on “fishing expeditions”

74

Monitor groups, communications, & data mine

NSA wiretapping
of all international phone calls

No,
all domestic phones calls
& emails!

Objections

Will bad guys
“take down the Internet”?

77

Terrorists use the Net too!

Governments & military want to spy on enemies – only take down in extraordinary circumstances

“If you’re not doing anything wrong,
then you won’t object
if the government watches you.”

2 maxims about power

2 maxims about power

Power corrupts,
& absolute power
corrupts absolutely

2 maxims about power

Power corrupts,
& absolute power
corrupts absolutely

Quis custodiet custodes ipsos?
(Who will watch the watchers?)

Cardinal Richelieu:

“If one would give me six lines
written by the hand
of the most honest man,
I would find something in them
to have him hanged.”

*Malo periculosam libertatem
quam quietum servitium*

(I prefer liberty with danger
to peace with servitude.)



Thank you!

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