

Capitol Forum Webinar

Cyber Risk Insurance: Evolving Legal and Regulatory Environment



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Agenda

- The cyber risk challenge and role of insurance
- Current state of the cyber insurance market
- Unlocking the potential of cyber insurance
- Resources for more information



Today's Speakers

- Edmund Douglas (moderator)
 - Chairperson, Academy Cyber Risk Task Force
- Wyatt Hoffman, Carnegie Endowment
- Scott Kannry, Axio
- Leigh Wolfrom, OECD





The Cyber Risk Challenge

The Cyber Risk Challenge—Evolution of the Threat

- ❑ Expanding cyber “attack surface” (growing technical complexity, Internet of Things, supply chain vulnerabilities)
- ❑ Proliferation of malicious capabilities and cybercrime markets
 - Ex: “Ransomware-as-a-service” (CrowdStrike)
- ❑ Growing threats from nation-state actors
- ❑ Escalating consequences from cyberattacks:
 - Theft and harassment → disruption and destruction
 - Ransomware alone predicted to cost \$11.5bn in damages in 2019 – rising to \$20bn by 2021 (Cybersecurity Ventures)



The Cyber Risk Challenge—The Case of NotPetya

- 2017 global ransomware attack
 - Attributed to Russia; targeted Ukrainian tax-filing software (reportedly 10% of all computers in Ukraine wiped within 24 hours)
 - Total insurance industry loss from NotPetya est. **\$3 billion**—around 90% from silent cyber impacts (PCS)
- An act of (cyber)war?
 - Mondelez International is suing Zurich America for denying a \$100 million claim by invoking war-risk exclusion
 - Merck is similarly suing 20 insurers for denying claims related to \$700 million in damages



The Private Sector Predicament

- ❑ Cyber risks cut across virtually all aspects of business operations and extend through relationships with suppliers, clients, etc.
- ❑ Governments are not solving the problem
 - “Enforcement gap”—only 0.3% of cyber incidents result in arrest (Third Way)
- ❑ Corporations struggle to manage constantly evolving cyber threats
- ❑ At the same time, commercial incentives tend to drive corporations to increase cyber risk exposure rather than mitigate or manage risk
- ❑ A solution requires both *enabling* and *motivating* better cyber risk management



Role of the Cyber Insurance Industry

1. Engineering risk
2. Channeling risk
3. Managing systemic risks
4. Harnessing collective insights to improve security
5. Shaping broader trends in the risk landscape
6. Harmonizing standards and practices internationally





The Cyber Insurance Market

The Cyber Insurance Market

- What's the current state of the market?
- What are some of the impediments to a more effectively functioning market?



Coverage for Cyber Impacts Across Business Lines

	First-Party Impacts	Third-Party Impacts
Financial Impacts	Your income and expenses	Others' income and expenses
Tangible Impacts	Your people, property, and environment	Others' people, property, and environment

	First-Party Impacts	Third-Party Impacts
Financial Impacts	<ul style="list-style-type: none"> Traditional "cyber" coverage Kidnap & Ransom Crime 	<ul style="list-style-type: none"> D&O Professional Liability EPL
Tangible Impacts	<ul style="list-style-type: none"> Property Workers' Comp Terrorism 	<ul style="list-style-type: none"> General Liability Umbrella Environmental Products Liability

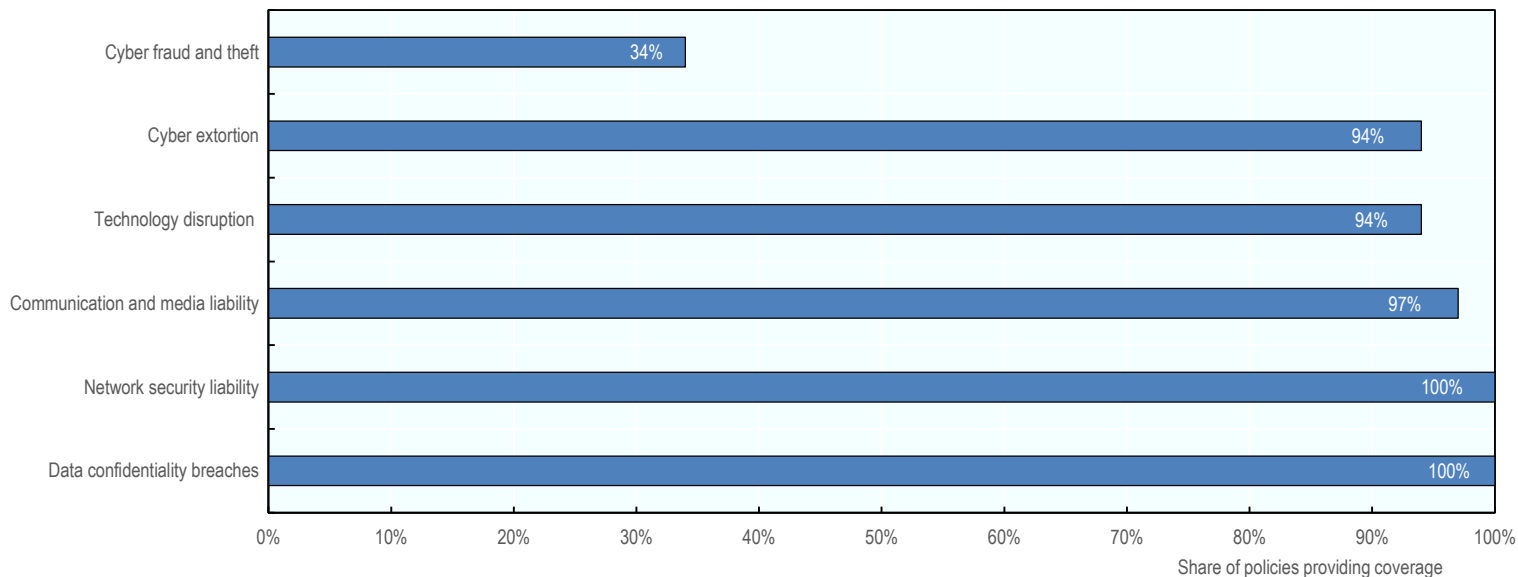


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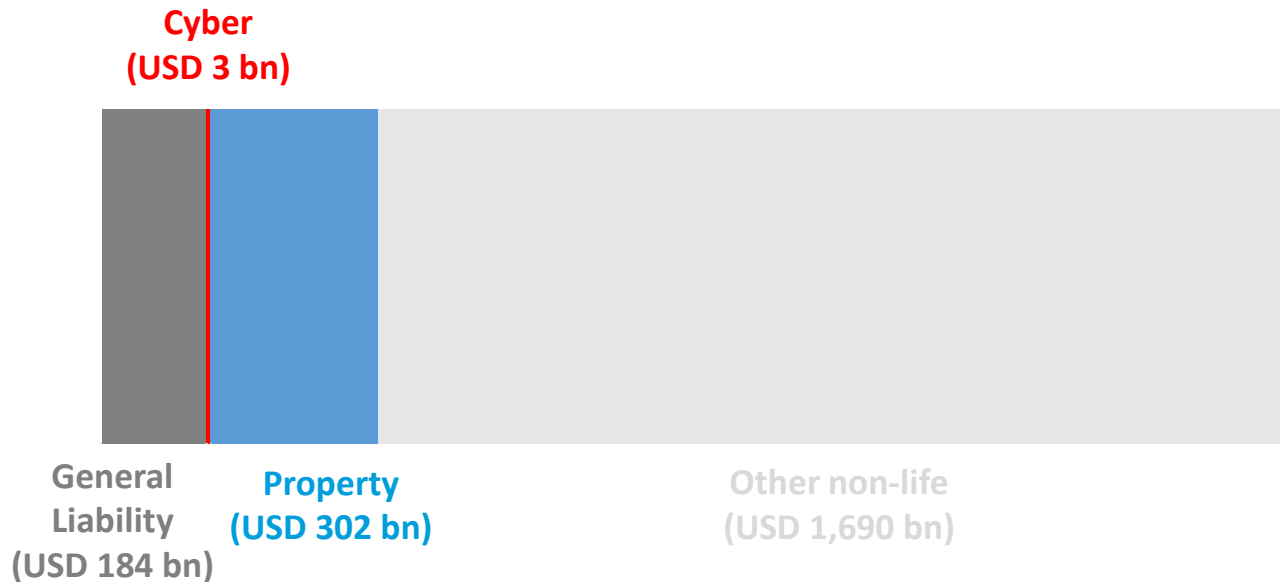
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What Is Covered in Affirmative Cyber Insurance Policies

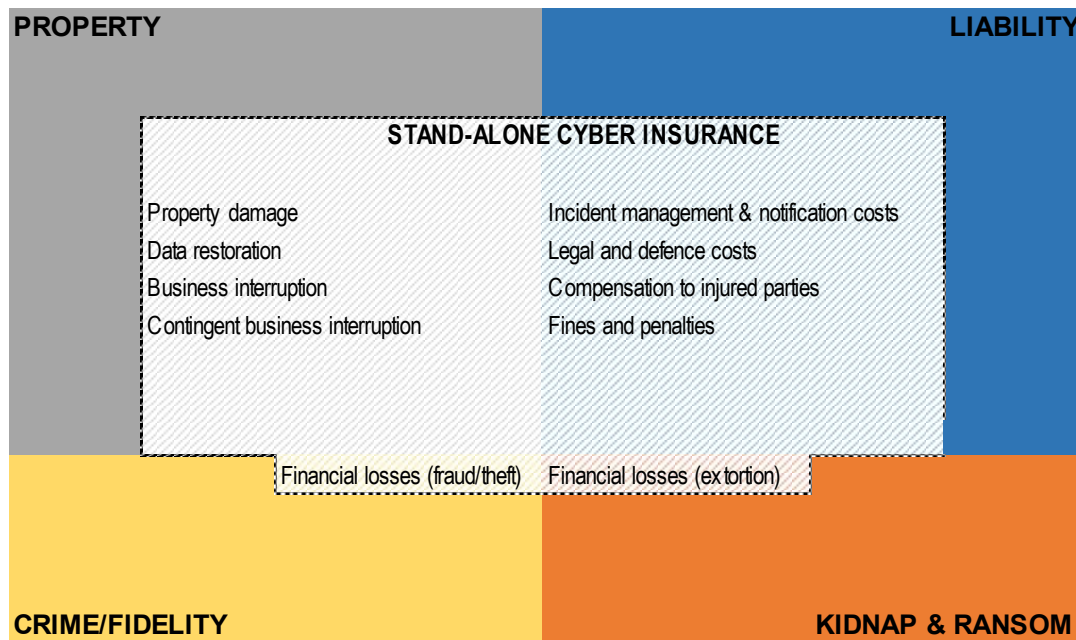


The relative size of the cyber insurance market

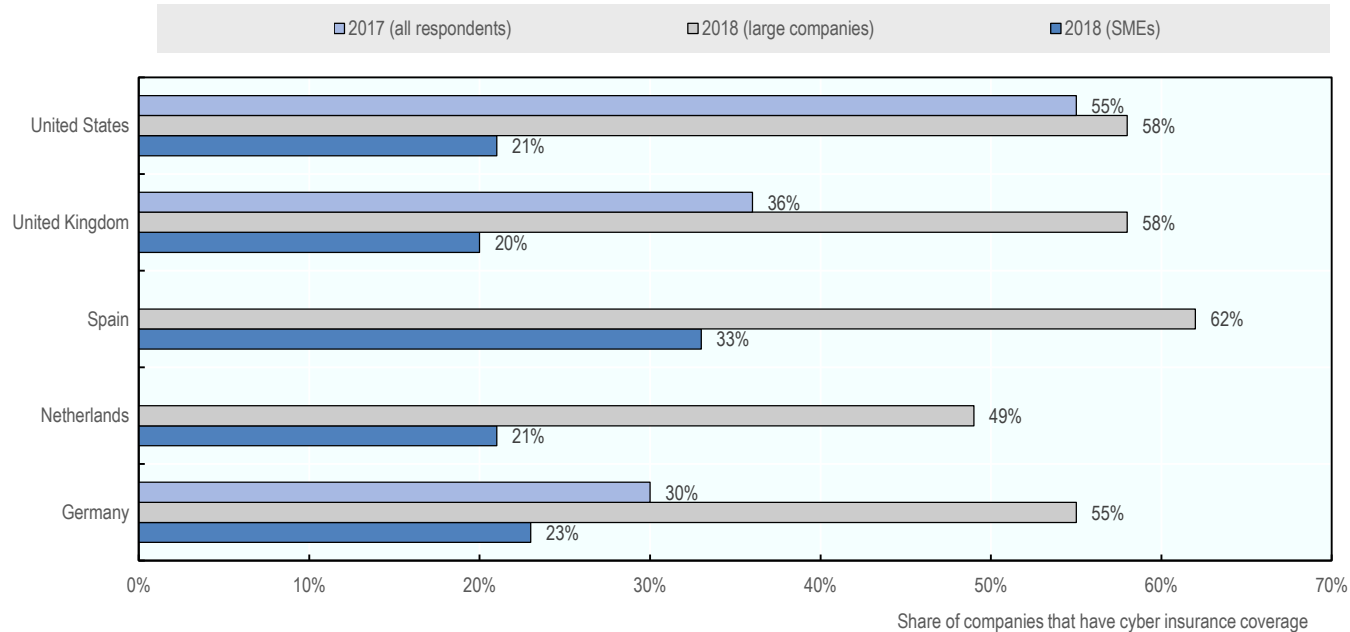
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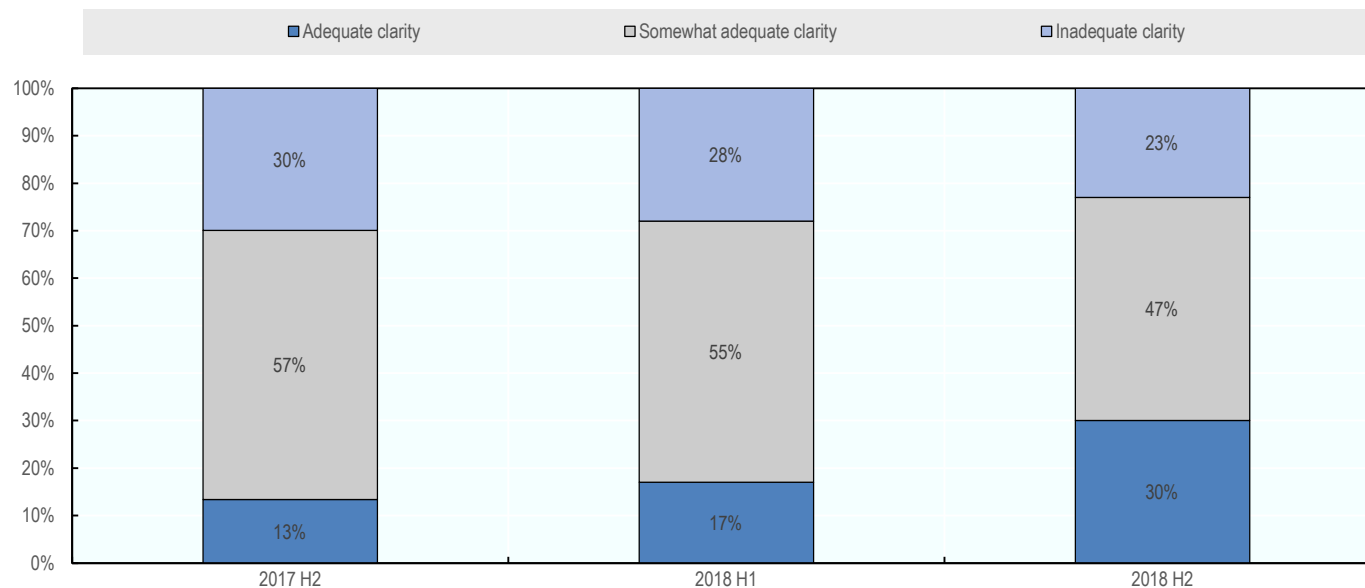
Coverage for Cyber Risks Across Business Lines



Estimates of Cyber Insurance Penetration



Brokers' Perspective on the Clarity of Policy Terms



Impacts on Cyber Coverage Complexity: Some Examples

- ❑ Evolving privacy and cyber security requirements
- ❑ Uncertain insurability of key costs (fines and penalties, ransoms)
- ❑ Public involvement in insuring (cyber) terrorism
- ❑ Litigation around exclusions (privacy from GL, BEC from crime, war)



Mondelez-Zurich Case

- Mondelez International (former unit of Kraft Foods) was one of the hundreds of companies impacted by the NotPetya cyberattack in 2017
 - ▣ Financial hit exceeded USD 100M related to lost orders and replaced computer equipment, which took weeks to recover from
- U.S. government assigned responsibility for NotPetya to Russia in 2018
 - ▣ White House described NotPetya as “part of the Kremlin’s ongoing effort to destabilize Ukraine”



Mondelez-Zurich Case—cont'd

- War exemption clause invoked by Zurich American Insurance Co.
 - ▣ Claim being made on a property policy as opposed to a standalone cyber insurance policy
- Lawsuit hinges on the question of whether the government's attribution of the cyberattack to Russia meets the bar for the war exclusion
- Similar litigation in the courts involving Merck, which was also impacted by NotPetya





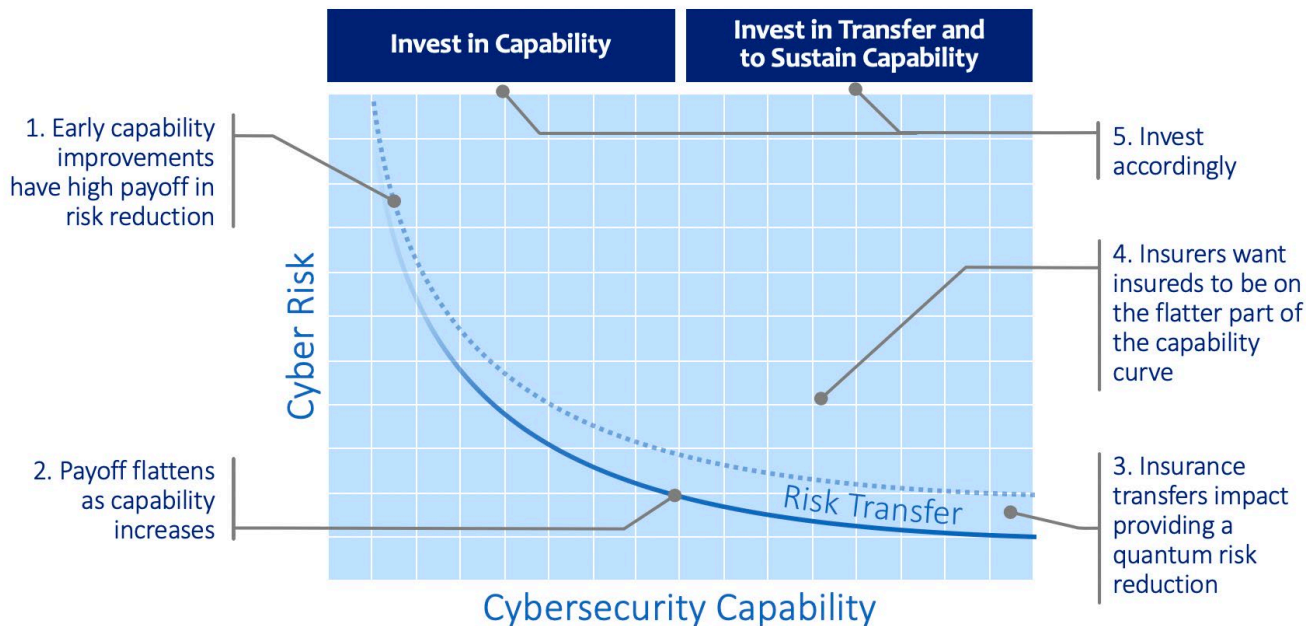
Unlocking the Potential of Cyber Insurance

Unlocking the Potential of Cyber Insurance via:

- Supporting the development of an effective (or a more effective) insurance market for cyber risk
- Addressing exposure to systemic and political cyber risks through public-private collaboration
- Using regulation and market mechanisms to encourage broad improvements to cyber security



Cyber Insurance is critical to cyber risk management





Resources for More Information

Resources for more information

- Academy's Cyber Risk Task Force Resource Guide
 - Resources organized by theme, ex. Insurance Market Size and Performance, Cyber Incidents and Costs, Accumulation Analysis
 - Link: <https://www.actuary.org/sites/default/files/2019-05/cyber-risk-insurance.pdf>
- OECD, *Enhancing the Role of Insurance in Cyber Risk Management*
 - Link: <http://www.oecd.org/publications/enhancing-the-role-of-insurance-in-cyber-risk-management-9789264282148-en.htm>
- Carnegie, *Addressing the Private Sector Cybersecurity Predicament*
 - Link: <https://carnegieendowment.org/2018/11/07/addressing-private-sector-cybersecurity-predicament-indispensable-role-of-insurance-pub-77622>



Cyber Risk Insurance

Q&A



Cyber Risk Insurance

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