Embed Privacy – by Design, or Risk Losing Privacy Forever

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The Decade of Privacy by Design

www.privacybydesign.ca
Adoption of “Privacy by Design”
as an International Standard

Landmark Resolution Passed to Preserve the Future of Privacy


JERUSALEM, October 29, 2010 – A landmark Resolution by Ontario's Information and Privacy Commissioner, Dr. Ann Cavoukian, was approved by international Data Protection and Privacy Commissioners in Jerusalem today at their annual conference. The resolution recognizes Commissioner Cavoukian's concept of Privacy by Design - which ensures that privacy is embedded into new technologies and business practices, right from the outset - as an essential component of fundamental privacy protection.

Full Article:
http://www.science20.com/newswire/landmark_resolution_passed_preserve_future_privacy
Why We Need *Privacy by Design*

Most privacy breaches remain undetected – as regulators, we only see the tip of the iceberg.

The majority of privacy breaches remain unchallenged, unregulated ... unknown.

*Regulatory compliance alone, is unsustainable as the sole model for ensuring the future of privacy.*
| 7. Dutch        | 20. Maltese        | 33. Lithuanian      |
| 8. Estonian     | 21. Greek          | 34. Farsi           |
| 13. Arabic      | 26. Turkish        |                    |

Privacy by Design: Proactive in 38 Languages!
Positive-Sum Model: *The Power of “And”*

Change the paradigm from a zero-sum to a “positive-sum” model:
Create a win-win scenario, not an either/or (vs.) involving unnecessary trade-offs and false dichotomies …

replace “vs.” with “and”
Privacy by Design: The 7 Foundational Principles

1. Proactive not Reactive: Preventative, not Remedial;
2. Privacy as the Default setting;
3. Privacy Embedded into Design;
4. Full Functionality: Positive-Sum, not Zero-Sum;
5. End-to-End Security: Full Lifecycle Protection;
6. Visibility and Transparency: Keep it Open;
7. Respect for User Privacy: Keep it User-Centric.

Privacy by Design is a concept I developed back in the 90's, to address the ever-growing and systemic effects of Information and Communication Technologies, and of large-scale networked data systems.

Privacy by Design advances the view that the future of privacy cannot be assured solely by compliance with regulatory frameworks; rather, privacy assurance must ideally become an organization's default mode of operation.

Initially deploying Privacy Enhancing Technologies (PETs) was seen as the solution. Today, we realize that a more substantial approach is required — extending the use of PETs to PETS Plus — taking a positive-sum (full functionality) approach, not zero-sum. That's the "Plus" in PETS Plus: positive-sum, not the either/or of zero-sum (a false dichotomy).

Privacy by Design extends to a "Trilogy" of encompassing applications: 1) IT systems; 2) accountable business practices; and 3) physical design and networked infrastructure.

Principles of Privacy by Design may be applied to all types of personal information, but should be applied with special vigour to sensitive data such as medical information and financial data. The strength of privacy measures tends to be commensurate with the sensitivity of the data.

The objectives of Privacy by Design — ensuring privacy and gaining personal control over one's information and, for organizations, gaining a sustainable competitive advantage — may be accomplished by practicing the following 7 Foundational Principles (see over page):
Operationalizing *Privacy by Design*

9 *PbD* Application Areas

- CCTV/Surveillance cameras in mass transit systems;
- Biometrics used in casinos and gaming facilities;
- Smart Meters and the Smart Grid;
- Mobile Communications;
- Near Field Communications;
- RFIDs and sensor technologies;
- Redesigning IP Geolocation;
- Remote Home Health Care;
- Big Data and Data Analytics.
“Privacy by Design is considered one of the most important concepts by members of the Japanese Information Processing Development Center …

We have heard from Japan’s private sector companies that we need to insist on the principle of Positive-Sum, not Zero-Sum and become enlightened with Privacy by Design.”

— Tamotsu Nomura, Japan Information Processing Development Center, May 28, 2014
“Many scholars and politicians believe privacy by design may turn out to be a strong contribution to improved privacy protection. However, what are the prerequisites and what guidelines should we adopt to make good privacy designs for information systems? The author of this article discusses the significance and potentials of regulatory design for implementing privacy in information systems. He also suggests and demonstrates a general method of privacy by design.”

Dag Wiese Schartum
International Journal of Law and Information Technology
February, 2016

http://ijlit.oxfordjournals.org/content/early/2016/02/23/ijlit.eaw002.abstract
“Privacy and international issues will remain important parts of the FTC’s agenda. **Privacy by Design is now a key pillar of our privacy work** ... as we work to champion the interests of consumers.”

– Edith Ramirez
Chairwoman, U.S. Federal Trade Commission,
April 3, 2013.

In 2011, the FTC issued a report, under former Chairman, Jon Leibowitz, **Protecting Consumer Privacy in an Era of Rapid Change**, recommending 3 best practices – the first being that companies adopt a **Privacy by Design** approach by building privacy protections into their everyday business practices.
E.U. General Data Protection Regulation

• The language of “Privacy/Data Protection by Design” and “Privacy as the Default” will now be appearing for the first time in a privacy statute, that was recently passed in the E.U.
  – Privacy by Design
  – Data Protection by Design
  – Privacy as the Default
The Similarities Between PbD and the GDPR

“Developed by former Ont. Information & Privacy Commissioner, Ann Cavoukian, Privacy by Design has had a large influence on security experts, policy markers, and regulators ... The EU likes PbD ... it’s referenced heavily in Article 23, and in many other places in the new regulation. It’s not too much of a stretch to say that if you implement PbD, you’ve mastered the GDPR.”
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