Informing the design of cookie consent interfaces with research

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A usable consent interface should

1. Address user needs
2. Require minimal user effort
3. Make users aware of what choices exist and where to find them
4. Convey choices and their implications so users understand them easily
5. Satisfy users and engender trust
6. Allow users to change their decision due to errors or changing their mind
7. Avoid nudging users towards less privacy-protective options
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**Functionality Allowed**
- Provide secure log-in
- Remember how far you are through an order
- Remember your log-in details
- Remember what is in your shopping cart
- Make sure the website looks consistent
- Allow you to share pages with social networks
- Allow you to post comments
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Preferences (8)
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<td>Cookiebot</td>
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“Okay, whatever”: An Evaluation of Cookie Consent Interfaces

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ABSTRACT

Many websites have added cookie consent interfaces to meet regulatory consent requirements. While prior work has demonstrated that they often use dark patterns—design techniques that lead users to less privacy-protective options—other usability aspects of these interfaces have been less explored. This study contributes a comprehensive, two-stage usability assessment of cookie consent interfaces. We first inspected 191 consent interfaces against five dark pattern heuristics and identified design choices that may impact usability. We then conducted a 1,109-participant online between-subjects experiment exploring the usability impact of seven design parameters. Participants were exposed to one of 12 consent interface variants during a shopping task on a prototype e-commerce website and answered a survey about their experience. Our findings suggest that a fully-blocking consent interface with in-line cookie options accompanied by a persistent button enabling users to later change their consent decision best meets several design objectives.

CCS CONCEPTS

- Security and privacy → Usability in security and privacy;  
- Social and professional topics → Computing / technology policy;  
- Human-centered computing → Empirical studies in HCI.

KEYWORDS

cookie consent, GDPR, privacy choice, privacy notice
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