



18ο Συνέδριο

infocom | infocom
world 2016 | media

Τετάρτη

2 Νοεμβρίου
2016

Divani Caravel
Hotel



Digital
Economy: The Highway of
NGN

PRIVACY: THE END USER PERSPECTIVE



PRIVACY FLAG

Infocom World 2016 _ Athens, Greece, Nov.02, 2016
Privacy Flag - based Special Session

Dr. Andreas Drakos
Senior Technical Project Manager

Innovation @  velti

AGENDA

Is Privacy an issue?

Are people aware of their privacy risks?

How to inform people on their privacy risks?

THE PROBLEM...

A large majority of Europeans engage with Online Social Networks (OSNs)

- 74% of users consider that they **do not have sufficient control**
- 70% **are concerned with the way** such data are handled by



UNDERSTANDING PRIVACY FROM END-USERS POINT OF VIEW

I will NOT share this with an app:

86% credit card or bank info



64% medical records



56% home address



35+ are more concerned with sharing all pieces of personal info EXCEPT their location

49% children/s' name



35% physical location



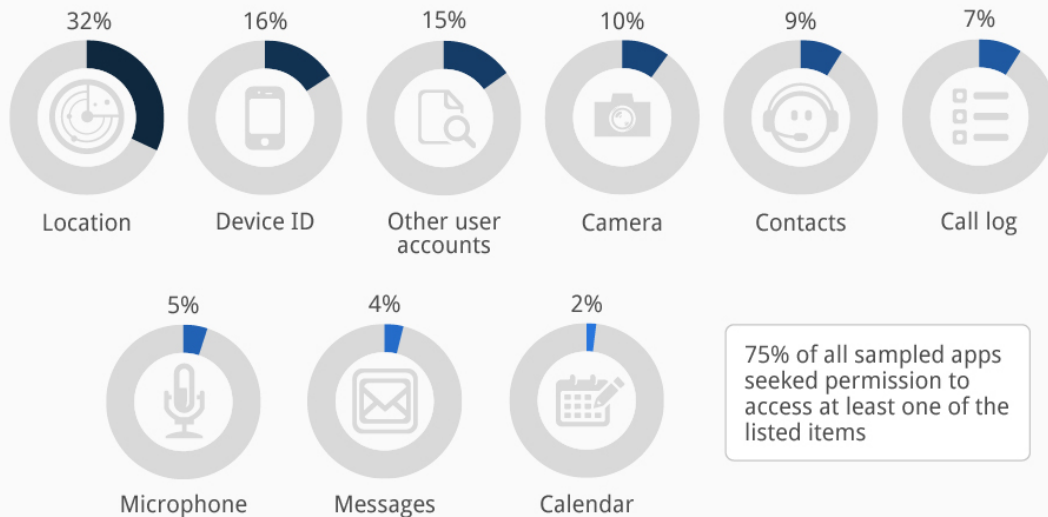
24% birth date



UNDERSTANDING PRIVACY FROM APPLICATION'S POINT OF VIEW

75% Of Mobile Apps Want Access To User Data

Percentage of apps seeking permission to access the following data



Based on an analysis of 1,211 Android and iOS apps in May 2014

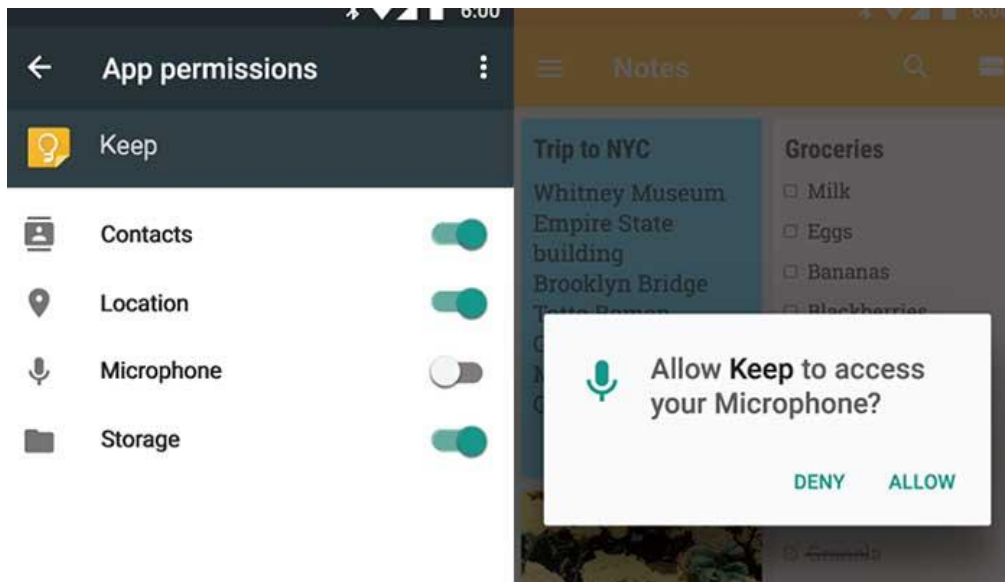
@StatistaCharts

Source: Global Privacy Enforcement Network

statista

ANDROID 6+ - NEW PERMISSION SETTINGS

- ❖ From Android 6 and up
- ❖ Users are informed on installation to **allow/deny permissions** for specific information/services
- ❖ Problem 1: Why should an app use Microphone ?
- ❖ Problem 2: If denied the app won't install



TERMS OF AGREEMENT / SERVICES

- ❖ Used in all services
- ❖ Complex language (legal text)
- ❖ Usually long texts
- ❖ No one actually reads them

Terms of Service

BEFORE SUBMITTING ANY VIDEOS FOR THE FIRST TIME, YOU MUST READ AND AGREE TO THE TERMS OF THIS SUBMISSION AGREEMENT, WHICH APPLIES TO ALL VIDEOS UPLOADED FROM YOUR ACCOUNT AT ANY TIME.

By submitting any videos to Facebook, you hereby agree to be bound by, and that all videos will fully comply with, the Facebook Code of Conduct and Terms of Use. Without limiting the foregoing, you understand that Facebook Video is intended to be used to post and share videos of a personal nature that is (i) of you or your friends, (ii) is taken by you or your friends, or (iii) is original art or animation created by you or your friends. Therefore, you agree not to upload any videos other than original works created by you or your friends.

You further agree not to upload any videos that infringe upon or violate the copyright, trademark, publicity, privacy or other rights of any third party and not to attempt to circumvent any content filtering techniques we may employ.

FAILURE TO ADHERE TO THE CODE OF CONDUCT AND TERMS OF USE MAY RESULT, AMONG OTHER THINGS, IN TERMINATION OF YOUR ACCOUNT AND THE DELETION OF CONTENT THAT YOU HAVE POSTED ON FACEBOOK, WITH OR WITHOUT NOTICE, AS DETERMINED BY FACEBOOK IN ITS SOLE DISCRETION.

I AGREE I have read and agree to all of the terms and conditions above and the Facebook Code of Conduct and Terms of Use.

Agree

Do Not Agree

OSN SHARING AND PRIVACY CONFLICTS

- ❖ How to control personal data sharing

- ❖ Simple notifications will not work



**This Group = closed
privacy is a big concern
for us & our members.**

Do not share photos that have member info.

Clicking to share a post will not work. The phrase "Attachment Unavailable" will be displayed.

If you like a post, then click to save it, or click
*Share External on android devices.

▲ Screenshots must be cropped so member names are not posted on the internet.

Comments, any personal discussions or statements & personal photos or profile names are private and not to be shared.

FACEBOOK ADVERTS

https://www.facebook.com/ads/preferences/?entry_product=ad_settings_screen

Your Facebook advert preferences

Your advert preferences help you understand what information influences the adverts you see and give you the controls to influence future adverts.

See the topics we think you're interested in and some of the advertisers who think you might be interested in their products, services and causes.



Your info

The adverts you see are influenced by a variety of factors, the most basic of which is demographic information, such as age, gender and location, from your profile and activity. We take great care to keep your information secure.

[Edit Profile](#)



Interests

[News and entertainment](#) 72 [Business and industry](#) 64 [Technology](#) 31 [Hobbies and activities](#) 29 [Travel, places and events](#) 15 [More](#)



Advertisers

[Advertisers with your contact info](#) 4 [Advertisers whose website or app you've used](#) 0

PRIVACY NEEDS TO INVOLVE USERS' PERSPECTIVE

Visualising a License Agreement (DataBait)

Hereby agree:

(D) The USEMP consortium partners will do scientific research to predict what kind of information Facebook or other third parties with access to Your postings and online behavioural data could or might infer from the said data. These inferences will be shared with You in an intuitive manner, thus providing an online presence awareness tool, embedded in the "DataBait-GUI".

⏪ Back

⏩ Continue Reading

Hereby agree:

(E) The USEMP consortium will also do scientific research to estimate the monetary value of Your data, based on the said data and their inferences. The "DataBait-GUI" will alert You that some of Your online behaviours may be monetisable, for example in the context of personalized advertising or in the context of selling Your data or profile to data brokers, credit rating companies or others willing to pay for access to the data or inferred profiles. This way the DataBait-GUI also acts as an economic value awareness tool.

⏪ Back

⏩ Continue Reading

PRIVACY FLAG



Privacy Flag engages with the crowd



Crowd provides feedback through PF tools



PF site



Android app



Browser add-on



The information is combined with



Automated privacy enablers



Privacy Flag experts input



Users get privacy risks analysis for:

- Sites the visit
- Mobile Apps they use
- IoT registered networks

THE CASE OF PRIVACY FLAG

UPRAAM



UPRAAM
questionnaire



PF site



Android app



Browser
add-on



ID	Question	Yes	No	I don't know	The question is vague
D1.2	Is there clear information on:				
D1.2.1	the purpose and scope for which the data are collected?				
D1.2.2	who is collecting the data?				
	What is their contact details?				
D1.2.3	the privacy policy?				
D1.2.5	the period (or criteria) for which the personal data will be stored?				
D1.3	Is there a clear information on your rights, including:				
D1.3.1	the right to access and rectify personal data?				
D1.3.2	the right to object to the processing of your own data?				
D1.3.3	the right to submit a complaint with a supervisory authority?				
D1.3.4	the right to data portability (i.e. your ability to reuse your data with other service providers)?				
D1.3.5	the right to withdraw consent at any time?				
D1.4	If the application or service is designed to address users with different languages, is the information on privacy provided in these various languages?				

PRIVACY FLAG CHALLENGES

- ❖ How to communicate UPRAAM of 20+ questions in a quick and user friendly way?

- ❖ How to simplify the interaction with the end user?

Overview

Evaluation

Dropdown ▾

When using a service (site, app, etc.) are you aware of the terms and conditions related to your personal data

☒ No

☐ Yes

«	1	2	3	4	5	»
---	---	---	---	---	---	---


Overview

Evaluation

Dropdown ▾

<http://www.in.gr/>

 Users Evaluation

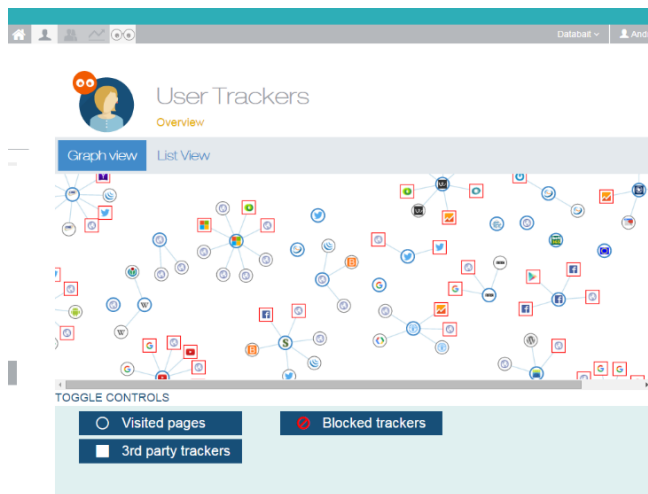
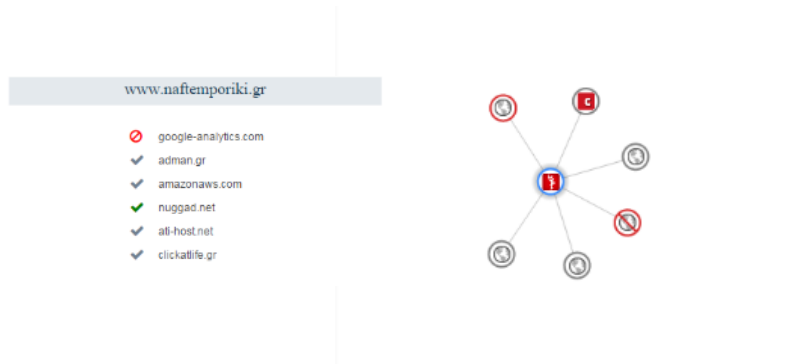
 Not safe

 Sytem Evaluation

 Secure

PRIVACY FLAG CHALLENGES

- ❖ How to explain to users trackers / cookies / super cookies ?
- ❖ How to show case them when their personal data are being used and how?



THANK YOU

 @andr_drakos

www.privacyflag.eu