Oana Goga
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Research Interests

I work on problems related to AI and Society. I study how social media platforms and targeted advertising can be used to the detriment of humans' wellbeing and society and what we can do against it. To deal with the closed nature of online platforms and the limited access to data in the space, I look for innovative measurement methodologies and experimental designs to study different risks and phenomena involving online systems. I collect and work with data from real systems and humans.

I care about the problems I tackle, and my efforts go beyond scientific publications. I have worked with civil societies and European lawmakers to propose evidence-based legal measures based on my research. I develop software for the general public that helps users protect themselves from harm. I have engaged behavioral economists, cognitive scientists, social scientists, political scientists, communication scientists, and legal scholars to work with me on my research ideas to fully and deeply understand the problem.

Education

HDR (Habilitation á diriger des recherches)   January 2023
Université Grenoble Alpes, Grenoble, France
Thesis: "Assessing Security and Privacy Risks with Social Media Systems"
Committee: Ioana Manolescu (reviewer) – Research Director at Inria-Saclay, Emiliano De Cristofaro (reviewer) – Full Professor at University College London, Christo Wilson (reviewer) – Associate Professor at Northeastern University, Claude Castelluccia (member) – Research Director at Inria-Rhone-Alpes, Alessandro Acquisti (member) – Professor at Carnegie Mellon University, David Lazer Professor (member) – Professor at Northeastern University, Eric Gaussier (president) – Professeur at Univ. Grenoble Alpes

Ph.D. in Computer Science   May 2014
Université Pierre et Marie Curie, Paris, France
Thesis: "Matching User Accounts Across Online Social Networks: Methods and Application"
Advisor: Renata Teixeira
Committee: Anne-Marie Kermarrec (reviewer) – Research Director at Inria Rennes, Jon Crowcroft (reviewer) – Professor at University of Cambridge, Krishna Gummadi – Tenure-track Faculty at Max Plank Institute for Software Systems, Clemence Magnien (president) – Research Director at CNRS, Dina Papagiannaki (member) – Research Director at Telefonica, Renata Teixeira (advisor) – Research Director at Inria Paris

M.Sc. in Computer Networks   September 2010
Université Pierre et Marie Curie, Paris, France
Thesis: "Speed measurements of residential Internet access"
Advisor: Renata Teixeira

Engineering Degree in Computer Science   September 2008
Technical University of Cluj-Napoca, Cluj, Romania (5 years program, one of the top 3 Computer Science programs in Romania)
Diploma project: "VMdeploy: Improving Best-Effort Job Management in Grid'5000"
Advisors: Jérôme Gallard, Adrien Lèbre, Christine Morin (IRISA) and Vasile Dadarlat (UTCluj)

Employment

Directrice de Recherche Inria – Research Director   10/2024 – present

  –at Inria Saclay and Laboratoire d'Informatique de l'Ecole Polytechnique (LIX), Palaiseau, France   10/2024 – present

Chargée de Recherches CNRS – Research Scientist   10/2017 – 09/2024

  –at Laboratoire d'Informatique de l'Ecole Polytechnique (LIX), Palaiseau, France   09/2022 – 09/2024

  –at Laboratoire d'Informatique de Grenoble (LIG), Grenoble, France   10/2017 – 08/2022*

This is a full-time research position (equivalent to a tenured faculty position) that I obtained after a highly competitive national contest (5 positions in 2016 for 200+ computer science candidates). These are amongst the most desirable positions for doing fundamental research in France. I was admitted in June 2016 as CR CNRS, but I delayed my entry by one year due to childbirth.

* <u>Career Break:</u> interruption from June 2018 to January 2019 for maternity leave

External Expert 06/2023 – 02/2024
European Commission, remote, part-time

Post-doctoral Researcher 06/2014 – 09/2017*
Max Planck Institute for Software Systems (MPI-SWS), Saarbruecken, Germany
Advisor: Krishna P. Gummadi
Topic: Security and privacy in social computing systems
* <u>Career Break:</u> interruption from October 2016 to March 2017 for maternity leave

Ph.D. Student 10/2010 – 05/2014
Université Pierre et Marie Curie, Paris, France
Advisor: Renata Teixeira
Topic: Matching user accounts across online social networks

Research & Development Engineer 10/2008 – 09/2009
Inria & ENS Lyon, Lyon, France
Advisors: Pascale Vicat-Blanc Primet (research part), David Margery (engineering part)
Topic: Design and development of a network metrology platform for Grid'5000 (French national grid infrastructure dedicated to network and grid computing research)

System Administrator 10/2006 – 02/2008
Pusztai-Kalman Communications Centre, Technical University of Cluj-Napoca, Cluj-Napoca, Romania
Part-time during studies

Internships & Visiting Positions

Research Intern (during Ph.D., 8 months) 03/2013 – 10/2013
Max Planck Institute for Software Systems (MPI-SWS), Saarbruecken, Germany
Mentor: Krishna P. Gummadi
Topic: Applications of matching accounts on different social networks

Research Intern (during Ph.D., 3 months) 06/2012 – 09/2012
International Computer Science Institute (ICSI), Berkeley, CA, USA
Mentor: Robin Sommer
Topic: Investigate techniques to match accounts on different social networks

Research Intern (during Ph.D., 4 months) 07/2011 – 10/2011
International Computer Science Institute (ICSI), Berkeley, CA, USA
Mentor: Robin Sommer
Topic: Understanding and managing the impact of global inference on online privacy

Research Intern (during Ph.D., 6 months) 01/2011 – 06/2011
Intel Labs Berkeley, Berkeley, CA, USA
Mentors: Nina Taft, Jaideep Chandrashekar
Topic: Characterizing end-host application performance

Research Intern (during M.Sc., 6 months) 04/2010 – 09/2010
Université Pierre et Marie Curie, Paris, France
Mentor: Renata Teixeira
Topic: Speed measurements of residential Internet access

Intern (during last year of engineering studies, 6 months) 03/2008 – 08/2008
Institut de Recherche en Informatique et Systèmes Aléatoires (IRISA), Rennes, France
Mentors: Jérôme Gallard, Adrien Lèbre, Christine Morin
Topic: Development of a scheduler to improve best-effort job management in grids using virtualization

Intern (during second year of engineering studies, 3 months) 06/2004 – 09/2004
Brahms International, Brasov, Romania
Topic: Upgrading and repairing systems

Honors and Awards

2024: Winner of The Andreas Pfitzmann Best Student Paper Award, for PETS'24 [4]

2024: Runner-up for the **CNIL-Inria Award for Privacy Protection**, for CCS'23 [6]

2024: Outstanding Reviewer Award, The Web Conference 2024 (given to 40 reviewers)

2024: I received the **CNRS Bronze Medal**

2023: I received the **Lovelace-Babbage Award** from the French Academy of Science and the French Computer Society. It is given out annually to two researchers below the age of 40 that made significant contributions to Computer Science, from the most theoretical to the most applied. Here is a link to the award ceremony.

2021: **Awarded an ERC Starting Grant**, 2022–2027

ERC grants are the most prestigious fundamental research grants in Europe and are highly selective. They provide researchers with 1.5M€ for a period of 5 years.

2021: **CNRS Award for PhD Supervising and for Research (PEDR)**, awarded to the top 20% applicants

2020: **CNIL-Inria Award for Privacy Protection**, for WWW'20 [14]

Award given by the French data protection authority (CNIL) and Inria for papers of great scientific excellence and societal impact. Selected out of 50+ high-quality scientific papers that have one author in the EU.

2020: **Best Paper Honorable Mention Award**, The Web Conference, for WWW'20 [14]

2019: **Runner-up for the CNIL-Inria Award for Privacy Protection**, for NDSS'18 [19]

2019: **Runner-up for the Caspar Bowden PET award for Outstanding Research in Privacy Enhancing Technologies**, for S&P'18 [18]

The Caspar Bowden PET award is presented annually to researchers who have made an outstanding contribution to the theory, design, implementation, or deployment of privacy enhancing technology.

2019: **Member of two chairs of the Multidisciplinary Institute in AI in Grenoble** on "Explainable and Responsible AI" and "Contextual Recommendations in Action - Bridging AI and Real-Life Economics"

2017: **ANR Young Researcher Award (ANR JCJC)** (14.2% acceptance rate)

2017: **Best Paper Runner-up Award**, ASONAM, for ASONAM'17 [20]

2016: **Ranked 1st (ex-aequo) at the 2016 CNRS national permanent researcher computer science contest**, out of 200+ candidates

2016: **Data Transparency Lab Research Grant** (a 50k € grant, 11% acceptance rate)

2016: **Travel grant to attend the Data Transparency Lab Conference**, Colombia University, New York, November 2016 (given to the best 33% research proposals submitted to the Data Transparency Lab grant program)

2015: **Travel grant to attend the Data Transparency Lab Conference**, MIT, Boston, November 2015 (given to the best 33% research proposals submitted to the Data Transparency Lab grant program)

2010: **Travel grant to attend SIGCOMM**, New Delhi, August 2010

2009: **Best student demonstration award**, ACM SIGMETRICS/Performance, June 2009

2008: **Fellowship from Égide (now Eiffel) Scholarship Program of Excellence**, 6 months internship at IRISA, March – August 2008

2003 – 2008: **Merit-based student fellowship**, Technical University of Cluj-Napoca

Publications

Bibliometrics: https://scholar.google.com/citations?user=re_squoAAAAJ

<u>Note:</u> In my research community, conferences are more prestigious than journals and significantly more selective. The majority of my papers are published in the most selective conferences in my domain that are ranked Core A* or A. Out of my last ten papers published in the past years, four received awards. Author order: the first name (on occasions the first two names if equal contribution) indicates the student lead working on the project; faculty advisors are usually in alphabetic order at the end.

in italics Indicates the student or postdoctoral scholar whom I advised directly.

The PDFs of all my papers can be found on my webpage: https://www.lix.polytechnique.fr/~goga/.

Pre-prints

[Pre1] **Automated Discovery of Self-Proclaimed News Providers on Facebook**
Salim Chouaki, *Minh-Kha Nguyen*, Laura Edelson, Tobias Lauinger, Damon McCoy and Oana Goga
2023

[Pre2] **Understanding the (In)Effectiveness of Content Moderation: A Case Study of Facebook in the Context of the U.S. Capitol Riot**
Ian Goldstein, Laura Edelson, *Minh-Kha Nguyen*, Oana Goga, Damon McCoy, Tobias Lauinger
2023

HDR Thesis

[1] **Assessing Security and Privacy Risks with Social Media Systems**
Oana Goga
Université Grenoble Alpes, January 2023

Ph.D. Thesis

[2] **Matching User Accounts Across Online Social Networks: Methods and Applications**
Oana Goga
Université Pierre et Marie Curie, May 2014

Articles in International Refereed Conferences

[3] **Weaponizing the Wall: The Role of Sponsored News in Spreading Propaganda on Facebook**
Daman Deep Singh, Gaurav Chauhan, Minh-Kha Nguyen, Oana Goga, Abhijnan Chakraborty
International Conference on Advances in Social Networks Analysis and Mining (ASONAM), Sept. 2024 (B)

[4] **Client-side and Server-side Tracking on Meta: Effectiveness and Accuracy**
*Asmaa Elfraihi**, *Nardjes Amieur**, Walter Rudametkin, Oana Goga
Privacy Enhancing Technologies Symposium (PETS), July 2024 (**A**) ∗ equal contribution

Awards: Winner of The Andreas Pfitzmann Best Student Paper Award

[5] † **What News Do People Get on Social Media? Analyzing Exposure and Consumption of News through Data Donations**
Salim Chouaki, Abhijnan Chakraborty, Oana Goga, Savvas Zannettou
ACM The Web Conference (WWW), April 2024 (**A***)

▷ Today, social media has become the primary news source for many users worldwide. However, understanding the intricate influence of this news consumption on misinformation spread and ideological polarization is hindered by the lack of available data. We propose a measurement approach based on donations of personal data for scientific research. We demonstrate how it can provide a much-needed comprehensive picture of news exposure on social media. Notably, our findings indicate that individuals are more prone to encountering misinformation by actively choosing to follow low-quality news sources, rather than through their friends or platform algorithms. Additionally, we observe people's willingness to engage with ideologically opposing news, but keep it invisible to their social circles.

[6] † **Marketing to Children Through Online Targeted Advertising: Targeting Mechanisms and Legal Aspects**
Tinhinane Medjkoune, Oana Goga, Juliette Senechal
ACM Conference on Computer and Communications Security (CCS), November 2023 (**A***)

Awards: **Runner-up CNIL-Inria award for Privacy Protection 2024**, Accepted for presentation at CNIL Privacy Research Days 2024

▷ We showed that marketing to children is technically possible and legally allowed on online streaming platforms such as YouTube. This is the first study to look at this. Although there are no direct way to reach children, YouTube allows advertisers to instruct the platform to only place their ads on precise videos or channels – so advertisers can market to children by simply placing their ads on videos "made for kids". Regulations such as COPPA and DSA forbid advertising to children through profiling, but have overlooked reaching children through placement-based targeting.

▷ Paper done in collaboration with a legal scholar, Juliette Senechal.

[7] **Understanding the Privacy Risks of Popular Search Engine Advertising Systems**
Salim Chouaki, Oana Goga, Hamed Haddadi, Peter Snyder
ACM Internet Measurement Conference (IMC), November 2023 (A)

[8] **On Detecting Policy-Related Political Ads: An Exploratory Analysis of Meta Ads during the 2022 French Election**
Vera Sosnovik, *Romaissa Kessi*, Maximin Coavoux, Oana Goga
ACM The Web Conference (WWW), April 2023 (**A***)

[9] † **Collaborative Ad Transparency: Promises and Limitations**
Eleni Gkiouzepi, *Athanasios Andreou*, Oana Goga, Patrick Loiseau
IEEE Symposium on Security and Privacy (IEEE S&P), May 2023 (A*)

[10] **Exploring the Online Micro-targeting Practices of Small, Medium, and Large Businesses**
Salim Chouaki, *Islem Bouzenia*, Oana Goga, Beatrice Roussillon
ACM Conference on Computer-Supported Cooperative Work and Social Computing (CSCW), November 2022 (A)

▷ Paper done in collaboration with an economist, Beatrice Roussillon.

[11] **Can online attention signals help fact-checkers fact-check?**
Manoel Horta Ribeiro, Savvas Zannettou, Oana Goga, Fabricio Benevenuto, Robert West
MEDIATE workshop with ICWSM, June 2022

[12] † **Understanding Engagement with (Mis)Information News Sources on Facebook**
Laura Edelson*, *Minh-Kha Nguyen*, Ian Goldstein, Oana Goga, Damon McCoy and Tobias Lauinger
ACM Internet Measurement Conference (IMC), November 2021 (27% acceptance rate, A) *equal contribution

[13] † **Understanding the complexity of detecting political ads**
V. Sosnovik, O. Goga
The Web Conference (WWW), April 2021 (20% acceptance rate, A*)

▷ We show that the fundamental assumption made by lawmakers, that one can reliably distinguish political from non political ads, is not correct—and we do an in-depth analysis of the origin of the disagreement, pointing mainly to ads about social issues. This work led to an invitation by the European Commission to a consultation on the European Democracy Action Plan to discuss regulation of political ads.

[14] † **Facebook Ads Monitor: An Independent Auditing System for Political Ads on Facebook**
M. Silva, *A. Andreou*, O. Goga, P. O.S Vaz de Melo, L. Santos, F. Benevenuto
The Web Conference (WWW), April 2020 (19% acceptance rate, A*)

<u>Awards</u>: **Honorable Mention Paper Award**, **CNIL-Inria award for Privacy Protection 2020**

▷ We develop an independent monitoring system for the Brazilian 2018 elections and we show that the Political Ad Library provided by Facebook is severely incomplete. This work was used as central proof to ask the European Commission for universal transparency for all ads in the Digital Services Act (see Broader Impact section).

[15] **Auditing Offline Data Brokers via Facebook's Advertising Platform**
G. Venkatadri, P. Sapieżyński, E. Redmiles, A. Mislove, O. Goga, M. Mazurek, and K. Gummadi
The Web Conference (WWW), May 2019 (18% acceptance rate, A*)

[16] † **Measuring the Facebook Advertising Ecosystem**
A. Andreou, M. Silva, F. Benevenuto, O. Goga, P. Loiseau, A. Mislove
The Network and Distributed System Security Symposium (NDSS), February 2019 (17% acceptance rate, A*)

▷ Based on a large-scale measurement study using our tool [AdAnalyst], we shed light on the Facebook advertisers and their targeting practices. This work emphasizes the shift in the use of targeted advertising.

[17] **On Microtargeting Socially Divisive Ads: A Case Study of Russia-Linked Ad Campaigns on Facebook**
F. Ribeiro, K. Saha, M. Babaei, L. Henrique, J. Messias, O. Goga, F. Benevenuto, K. P. Gummadi, E. M. Redmiles
ACM Conference on Fairness, Accountability, and Transparency (ACM FAT*, now FAccT), January 2019 (24% acceptance rate, unranked top emerging conf)

[18] † **Privacy Risks with Facebook's PII-based Targeting: Auditing a Data Broker's Advertising Interface**
G. Venkatadri, *A. Andreou*, Y. Liu, A. Mislove, K. Gummadi, P. Loiseau and O. Goga
IEEE Symposium on Security and Privacy Symposium (IEEE S&P), May 2018 (11.5% acceptance rate, A*)

<u>Awards</u>: **Runner-up for the Caspar Bowden PET award for outstanding research in privacy enhancing technologies**

▷ We identify critical security issues in PII-based targeting (a key feature of the Facebook's advertising API)—e.g., site owners can use it to de-anonymize visitors—; and we propose provable solutions. Following this work, Facebook modified their API and implemented some of our recommendations.

[19] † **Investigating Ad Transparency Mechanisms in Social Media: A Case Study of Facebook's Explanations**
A. Andreou, G. Venkatadri*, O. Goga, K. Gummadi, P. Loiseau, A. Mislove
The Network and Distributed System Security Symposium (NDSS), February 2018 (21.5% acceptance rate, A*)

<u>Awards</u>: **Runner-up for the CNIL-Inria award for Privacy Protection**

▷ Through original active experiments, we show that Facebook's ad explanations are incomplete and misleading. This work is also the first to provides a set of clear criteria to audit explanations.

Postdoc Work

[20] **Identity vs. Attribute Disclosure Risks for Users with Multiple Social Profiles**
A. Andreou, O. Goga, P. Loiseau
IEEE/ACM International Conference on Advances in Social Networks Analysis and Mining (ASONAM), August 2017 (19% acceptance rate, B)

Awards: **Best Paper Award Runner-up**

[21] **On Profile Linkability despite Anonymity in Social Media Systems**
M. Backes, P. Berrang, O. Goga, K. Gummadi, P. Manoharan
Workshop on Privacy in the Electronic Society (WPES), October 2016 (19% acceptance rate)

[22] **Strengthening Weak Identities through Inter-Domain Trust Transfer**
*G. Venkatadri**, O. Goga*, C, Zhong, K. Gummadi, N. Sastry
World Wide Web Conference (WWW), May 2016 (16% acceptance rate, A*) * equal contribution

[23] **The Doppelgänger Bot Attack: Exploring Identity Impersonation in Online Social Networks**
O. Goga, *G. Venkatadri*, K. Gummadi
ACM Internet Measurement Conference (IMC), October 2015 (26% acceptance rate, A)

Ph.D. Work

[24] **On the Reliability of Large-Scale Profile Matching Across Online Social Networks**
O. Goga, P. Loiseau, R. Sommer, R. Teixeira, K. Gummadi
ACM SIGKDD International Conference on Knowledge Discovery and Data Mining (KDD), August 2015 (34% acceptance rate, A*)

[25] **Exploiting Innocuous Activity for Correlating Users Across Sites**
O. Goga, H. Lei, SHK. Parthasarathi, G. Friedland, R. Sommer, R. Teixeira
World Wide Web Conference (WWW), May 2013 (15% acceptance rate, A*)

[26] **Speed Measurements of Residential Internet Access**
O. Goga, R. Teixeira
Passive and Active Measurement Conference (PAM), March 2012 (30.5% acceptance rate, B)

[27] **Characterizing end-host application performance across multiple networking environments**
D. Joumblatt, O. Goga, R. Teixeira, J. Chandrashekar, N. Taft
IEEE INFOCOM Mini-Conference, March 2012 (24% acceptance rate, A*)

[28] **On the Impact of the Flow-Size Distribution's Tail Index on Network Performance with TCP Connections**
O. Goga, P. Loiseau, P. Goncalves
IFIP Performance, October 2011 (28% acceptance rate, A)

Other

[29] **FactCheckBureau: Build Your Own Fact-Check Analysis Pipeline**
Oana Balalau, Pablo Bertaud-Velten, Younes El-Fraihi, Garima Gaur, Oana Goga, Samuel Guimaraes, Ioana Manolescu, Brahim Saadi
Demo at ACM International Conference on Information and Knowledge Management (CIKM), October 2024

[30] **Beyond misinformation: using generative AI in advertising**
Sarra Bendaho, Nada Hanad, Nardjes Amieur, Asmaa El Fraihi and Oana Goga
Paper at Infox sur Seine, March 2024

[31] **Misinformation on Facebook: Who Gets Exposed and who Engages?**
Nardjes Amieur, Salim Chouaki and Oana Goga
Paper at Infox sur Seine, March 2024

[32] **Targeting Vulnerable Groups with Misinformation through Placement-Based Ads on YouTube**
Hiba Louzzani, Ines Abdelaziz, Asmaa El Fraihi, Nardjes Amieur and Oana Goga
Paper at Infox sur Seine, March 2024

[33] **The web of challenges of disinformation on Meta platforms in Brazil and France**
Samuel Da Silva Guimaraes and Oana Goga
Paper at Infox sur Seine, March 2024

[34] **Detecting propaganda and its impact on users**
O. Balalau, T. Galizzi, O. Goga, R. Horincar, and I. Manolescu
Paper at Infox sur Seine, March 2023

[35] **Selective, Incidental, Targeted or Algorithmic News: Measuring Exposure to Misinformation**
S. Chouaki, O. Goga
Paper at Infox sur Seine, March 2023

[36] **Benchmarks for Evaluating Political Ads Definitions**
V. Sosnovik, O. Goga
Paper at Infox sur Seine, March 2023

[37] **What makes Facebook groups resilient to misinformation?**
M. Mokhtari, L. Hamdad, and O. Goga
Paper at Infox sur Seine, March 2023

[38] **Selective, Incidental, Targeted or Algorithmic News: An Analysis of What News Users Actually See**
S. Chouaki, O. Goga
Paper at IC2S2, March 2023

[39] **How to Define Political Ads?**
V. Sosnovik, O. Goga
Paper at IC2S2, March 2023

[40] **Selective, Incidental, Targeted or Algorithmic News: An Analysis of What News Users Actually See**
S. Chouaki, O. Goga
Paper at ACM CoNEXT Student Workshop, December 2022

[41] **How to Define Political Ads?**
V. Sosnovik, O. Goga
Paper at ACM CoNEXT Student Workshop, December 2022

[42] **Exposing Impersonation Attacks in Online Social Networks**
O. Goga, G. Venkatadri, K. Gummadi
Poster at ACM Conference on Online Social Networks (COSN), October 2014

[43] **Automated Traffic measurements and analysis in Grid'5000**
P. Loiseau, R. Guillier, O. Goga, M. Imbert, P. Goncalves, P. Vicat-Blanc Primet
Demo at ACM SIGMETRICS/Performance, June 2009

Awards: **Best Student Demonstration Award**

[44] **The Doppelgänger Bot Attack: Exploring Identity Impersonation in Online Social Networks**
O. Goga, G. Venkatadri, K. Gummadi
Atelier sur la Protection de la Vie Privée (APVP), June 2017

[45] **Large-scale correlation of accounts across social networks**
O. Goga, D. Perito, H. Lei, R. Teixeira, R. Sommer
ICSI Technical report, April 2013

[46] **Improving Best-Effort Job Management in Grid'5000**
J. Gallard, A. Lebre, O. Goga, C. Morin
Grid'5000 Spring School, April 2009

[47] **Metroflux: a high performance system for very fine-grain flow analysis**
O. Goga, P. Loiseau, P. Goncalves, R. Guillier, M. Imbert, Y. Kodama, P. Vicat-Blanc Primet
Grid'5000 Spring School, April 2009

[48] **VMdeploy: Improving Best-Effort Job Management in Grid'5000**
J. Gallard, A. Lebre, O. Goga, C. Morin
INRIA Research Report RR-6764, December 2008

Invited Talks

Keynotes, plenary invited talks at conferences and workshops, tutorials (I=International; N=National):

(I) Keynote at the Joint Research Centre DISINFO Workshop of the European Commission, September 2024

(I) Plenary talk at SURI Sumer Research Institute on Systems, Security, and Privacy, EPFL, July 2024

(I) Keynote at HotPETS, July 2024

(N) Plenary talk at Journée Inria - Ministére des Armées, June 2024

(N) Plenary talk at Congrès Annuel de la Société Informatique de France, June 2024

(I) Plenary talk at CNIL Privacy Research Day, June 2024

(N) Plenary talk at Academie des Sciences, May 2024

(N) Panel at CPDP The Role of Research and Researchers in AI Governance, May 2024

(I) Plenary talk Meeting of the OECD Working Party on Digital Economics, Measurement, and Analysis, April 2024

(I) Plenary talk at Forum International de la Cybersécurité – FIC 2024, March 2024

(I) Panel at OECD report release Facts not Fakes: Tackling Disinformation, Strengthening Information Integrity, March 2024

(I) Plenary talk at DSA and Platform Regulation Conference, Feb 2024

(N) Plenary talk at Musée des Arts et Métiers – L'aventure des inventions, Feb 2024, general audience

(I) WSTEAM Panel AICCSA, Dec 2023 – non research

(I) Plenary talk for AIvolution, European Parliament, Bruxelles, November 2023, replay

(I) Plenary talk at the OECD event Tackling disinformation: Strengthening democracy through information integrity, OECD, Paris, November 2023, replay, 400+ participants, I presented along government officials with high functions such as chancellors and state secretaries

(I) Plenary talk at Atelier 2 - Projet de recherche collective - Vers un droit neuroéthique?, Paris, November 2023, replay

(I) Keynote at Journées Nationales GDR Securité, Paris, June 2023

(F) Plenary talk at VIGINUMM on "Rencontres et débats autour des manipulations de l'information", Paris, June 2023

(F) Plenary talk at Conférence Arcom x CNNum on "Role de la société civile dans la régulation numérique nationale et européenne", Paris, June 2023

(I) Keynote at 7th ASF/RSD Winter school, Sept Laux, January 2023

(I) Keynote at Colloque Big Data ISTC, Lille, October 2022

(I) Plenary talk for AI4Media Workshop on "Human- and Society-centred AI", online, June 2021

(I) Plenary talk for Researching Discrimination in E-Commerce and Online Advertising Interdisciplinary Workshop organized by Maastricht Law & Tech Lab, online, March 2021

(I) Plenary talk for AI & Democracy track at the EPFL Applied Machine Learning Days (AMLD), online, Jan 2021, replay, 2000+ participants

(I) Plenary talk for MPI Intersectional Symposium on Computing and Society, online, Jan 2021, I was invited to speak next to some of the most respected researchers in my domain such as Jon Kleinberg, Alessandro Acquisti, Adrian Weller, and Iyad Rahwan

(N) Keynote at Junior Conference on Data Science and Engineering, Paris, France, September 2019

(N) Plenary talk for Building trust in AI, building trust with AI workshop (with Global Challenge Science Week), Grenoble, June 2019

(I) Plenary talk for Facebook's Digital Advertising Workshop, Menlo Park, USA, July 2019, invited to the Facebook's HQ to talk about the NDSS'18 paper

(N) Plenary talk for Journeé Transparence et Opacité des Systèmes d'Information, Lyon, France, April 2018

(N) Tutorial at EGC 2018 winter school, Paris, France, Jan. 2018

(I) Plenary talk for Entretien Jacques Cartier, Montreal, Canada, Oct. 2017

(I) Plenary talk for Dagstuhl Seminar on Cybersafety, Germany, Sept. 2017

(I) Plenary talk at Data Transparency Lab (DTL) Conference, Barcelona, USA, Nov. 2017

(I) Plenary short talk at Data Transparency Lab (DTL) Conference, Boston, USA, Nov. 2015

(I) Plenary talk at ISMA 2011 AIMS Workshop, CAIDA, San Diego, USA, Feb. 2011

*Selected invited talks in seminars (**in bold** more important talks):*

(I) ProperData UC Irvine, June 2024 (reported to September)

(N) **Centre Internet et Societé Seminar**, Paris, Mai 2024

(N) ENS Lyon, SIESTA seminars, Lyon, March 2024

(N) Seminar DataScale master, Versailles, Dec 2023

(N) LIX Lab Seminar, Palaiseau, April 2023

(N) Inria PETRUS Team Seminar, Versailles, April 2023

(N) **PEREN–Pole d'Expertise de la Regulation Numerique** (Academic Seminar), Quai de Bercy, Paris, March 2023

(N) Université Dauphine (Seminar "Responsabilité Sociale des Algorithmes"), Paris, February 2023

(N) INSA Lyon (DRIM@LIRIS Seminar), Lyon, October 2022

(N) LIG (GETALP team seminar), Grenoble, April 2021

(N) **Ambassadeur pour le numérique**, Quai d'Orsay, Paris, March 2022

(N) GT-PVP seminar (privacy protection working group) part of GDR Sécurité Informatique, online, Dec. 2021

(I) **Max Planck Institute for Human Development**, online, Jan 2021

(N) **CNIL (Commission Nationale Informatique & Libertés, the French Data Protection Agency)**, online, Dec. 2020

(I) **Facebook FAIR**, online, Nov. 2020

(N) GDR CIS Journée de restitutions, Sept. 2020

(N) GDR MaDICS Actions et Ateliers, July 2020

(N) Inria (SPIRALS team), Lille, France, Sept. 2019

(I) **Brave Reading Group**, online, May 2019

(I) **Princeton Center for Information Technology Policy Seminar, Princeton**, USA, Feb. 2018

(N) APVP, Autrans, Vercors, France, June 2017

(N) LAAS, Toulouse, France, Feb. 2016

(N) Inria, Grenoble, France, Dec. 2015

(N) LIG, Grenoble, France, Dec. 2015

(N) LIP6, Paris, France, Dec. 2015

(I) MPI-SWS SysNet Seminar, Saarbrucken, Germany, Oct. 2013

(N) LINCS Seminar, Paris, France, Nov. 2013

(N) LINCS Seminar, Paris, France, Feb. 2012

(I) Technicolor Palo Alto Research Lab. Seminar, Palo Alto, USA, Jan. 2011

Professional Service

Scientific Responsibilities:

2020–present, Co-lead the Action PLATFORM in GDR CIS and in GDR MaDICS (2020–2021). GDRs are French research networks build to structure research activities around important (interdisciplinary) themes. My action is part of both the computer science research network and the social sciences one.

We organized a series of seminars where we invited speakers across disciplines (computer science, law, economics, applied mathematics) to present their work (related to platforms). The goal was to establish a common background and a common language across disciplines, as well as expectations on how we can collaborate.

2017–present, Leader (or leader of a local partner) of multiple EU and ANR projects (see Research Funding section).

Organization:

• 2023–2024, Co-organizer of Infox sur Seine, at Sorbonne Centre on AI

The goal of this event is to gather the French research community across a wide set of disciplines that work on issues related to misinformation and fact-checking.

• 2019, Organizer *Data systems and their influence on human behavior workshop*, at Univ. Grenoble Alpes

My goal was to bring together local researchers from psychology, economy, law, marketing, and computer science interested in the subject.

• 2019, Co-organizer *Building trust in AI, building trust with AI Workshop* (with [Global Challenge Science Week](#)), Grenoble

Service:

PC Co-chair: WWW Ph.D. Symposium (2015)

PC Member: *The Web Conference* (2023, 2024), *CCS* (2021, 2022, 2024), *USENIX Security* (2023), ConPro (2021, 2022, 2023, 2024), FAccT (2020, 2023), IC2S2 (2023, 2024), Infox sur Seine (2023, 2024), SePAR (2024), CoNEXT Student Workshop (2022), ICISS (2019), APVP (2017, 2018, 2019), WebSci (2016, 2017), IEEE TrustCom (2016), SIMPLEX (2015)

Reviewer: Policy and Internet, Elsevier Online Social Networks and Media, IEEE Transactions on Multimedia, IEEE/ACM Transactions on Networking, ACM Transactions on the Web, Communications of the ACM, IEEE Transactions on Knowledge and Data Engineering

External Reviewer: CHI (2020), AAAI (2017), FC (2015), Euro S&P (2015), INFOCOM (2013), NDSS (2013), S&P (2013)

Grant Reviewing: HORIZON-CL2-2024-TRANSFORMATIONS-01-06 (2024), ANR - Comité d'évaluation CE39 (2023), Max Planck Society Project (2023), ERC Starting Grant (2022), [German National Research Center for Applied Cybersecurity ATHEN](#) (2022, 2023), Inria Associate Team Proposals (2021)

Commissions of Trust:

Advisory Boards:

Member of Conseil Scientifique of [Regalia](#) (2023)

Member of the Science Advisory Committee for the NSF-funded Mid-scale RI-1 project (a 15 million US $ project): [Observatory for online human and platform behavior](#) (2022-2023).

Member of the **OECD Task Force on Global Challenge to Build Trust in the Age of Generative AI** (2024).

External Expert with contract for the European Commission (DG Connect & ECAT), to advise on the [Delegated Act](#) addressing the implementation of the DSA Article 40 that gives vetted researchers access to data from very large online platforms and very large search engines (2023-2024).

Consultant for the European Commission (DG Justice and Consumers) on the European Democracy Action Plan. I offered my expertise and opinion on regulating political advertising.

Consultant for two NGOs ([Panoptykon Foundation](#) and the [European Partnership for Democracy](#)) on regulating ad transparency mechanisms and political advertising (2020). Together, we lobbied the European Commission on regulating online advertising. Our asks are part of Article 39 of the DSA.

Institute Evaluation Committee: Evaluation of the Max Planck Graduate Center Computer Science (Jan 2023)

Award Committee: [Caspar Bowden PET Award](#) (2023), [CNIL-Inria Privacy Protection Award](#) (2021, 2022, 2023, 2024), [Data Transparency Lab](#) – an inter-institutional effort, the aim of which is to create a global community of technologists, researchers, legislators, and industry representatives to improve the transparency of personal data through research, innovation, and design (2017).

Selection Committee: tenure Mobin Javed at LUMS (2024), recruitment of an Assistant Professor at ENSEA (2020), recruitment of an Assistant Professor at INSA Lyon (2020)

Ph.D. Committee: Evan Dufraisse (September 2024), Alireza Mohammadinodooshan (June 2024), Naif Mehanna (May 2024) – as jury member, Moitree Basu (Jan 2024) – as jury member, Anne Josiane (May 2023) – as jury member, B. Khalfoun (Oct. 2022) – as jury member, I. Fouad (June 2021) – as jury member, C. Henin – mid-term (2020)

Teaching Activities

My position does not have teaching duties, but I am allowed to teach and create lectures.

Foundations of Data Science (Co-created with Eric Gaussier, Feb. 2022 – June 2022, Graduate Course (M1 MOSIG), Univ. Grenoble Alpes, 6h of lecture & 9h of labs)

Foundations of Data Science (Co-created with Eric Gaussier, Feb. 2021 – June 2021, Graduate Course (M1 MOSIG), Univ. Grenoble Alpes, 6h of lecture & 9h of labs)

Introduction to Data Analysis (Co-created with Eric Gaussier and Patrick Loiseau, Feb. 2020 – June 2020, Graduate Course (M1 MOSIG), Univ. Grenoble Alpes, 3h of lecture & 9h of labs, http://lig-membres.imag.fr/loiseapa/courses/IntroDS/)

Human vs. Algorithmic-Decision Making: Bias, Fairness & Transparency (Teaching assistant, Oct. 2015 - Feb. 2016, Graduate Seminar, University of Saarland, 8 hours of lecture, http://courses.mpi-sws.org/hadm-ws15/)

Advising

Postdocs:

1. Andreou Athanasios (2019–2020, 100% supervision rate) → then research engineer at Algorithmic Transparency Institute → Postdoc at New York University; Publications: WWW'20 [14] (core A*, 2 awards), S&P'23 [9] (core A*); Topic: *Auditing social media targeted advertising* (ANR PRoTecT)

Ph.D. Students:

1. Abir Benzaamia (since March 2024, 100% supervision rate)

   Topic: *Privacy-oriented Personalization of Online Services (ANR PROPEOS)*

2. Asmaa Elfraihi (since Feb. 2023, 100% supervision rate)

   Topic: *Assessing algorithmic risks of AI-driven information targeting* (ERC MOMENTOUS)

   Publications: PETS'24 [4]

3. Nardjes Amieur (since Feb. 2023, 100% supervision rate)

   Topic: *Assessing human risks of AI-driven information targeting* (ERC MOMENTOUS)

   Publications: PETS'24 [4]

4. Salim Chouaki (since Nov. 2021, 100% supervision rate);

   Publications: CSCW'22 [10] (core A), IMC'23 [7] (core A), WWW'24 [5] (core A*), IC2S2'23 [38], CoNEXT Student Workshop'23 [40], pre-print [Pre1];

   Topic: *Analyzing risks associated with incidental and targeted exposure to information on social media* (H2020 Trust aWare)

5. Vera Sosnovik (Oct. 2019–Sept. 2023, 100% supervision rate) → then postdoc at UNIL, Swiss;

   Publications: WWW'21 [13] (core A*), WWW'23 [8] (core A*), IC2S2'23 [39], CoNEXT Student Workshop'23 [41].

   Ph.D. thesis from UGA successfully defended on 4 Sept 2023: Detection and analysis of online issue and political ads (ANR MIAI @ Grenoble Alpes)

6. Andreou Athanasios (2015–2019; co-advised with P. Loiseau; 50% supervision rate);

   Publications: ASONAM'17 [20] (core B, award), NDSS'18 [19] (core A*, award), S&P'18 [18] (core A*, award), NDSS'19 [16] (core A*);

   Ph.D. thesis from UPMC successfully defended on 17 June 2019: Auditing, Measuring, and Bringing Transparency to Social Media Advertising Ecosystems

7. Minh-Kha Nguyen (2019–2022; 100% supervision rate, thesis on hold due to personal reasons);

   Publications: IMC'21 [12] (core A), pre-print [Pre2]

   Topic: *Sponsored news: analyzing dissemination, exposure and security risks* (ANR PRoTecT)

8. I also advised Giridhari Venkatadri, Ph.D. student at MPI-SWS before he changed Ph.D. program (2013–2016; co-advised with Krishna Gummadi) to complete it at Northeastern University.

   Publications under my supervision: IMC'15 [23] (core A), WWW'16 [22] (core A*), NDSS'18 [19] (core A*, award).

Research Engineers:

1. Tinhinane Medjkoune (2022–2023; 100% supervision rate) – work on the H2020 Trust aWare project, developed AdAnalyst for YouTube;

   Publications: CCS'23 [6] (core A*)

2. Islem Bouzenia (2020–2021; co-advised with Beatrice Roussilion (a behavioral economist), 50% supervision rate) – work on setting up an experimental platform to perform randomized controlled trials online;

   Publications: CSCW'22 [10] (core A)

3. Salim Chouaki (2020–2021; 100% supervision rate) – work on extending and maintaining AdAnalyst

4. Eleni Gkiouzepi (2019–2021; co-advised with P. Loiseau, 50% supervision rate);

   Publications: S&P'23 [9] (core A*)

Research Interns:

1. Samuel Guimaraes, at LIX, visiting student from UFMG Brazil, Jan. 2024 – July 2024

2. Nada Hanad, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

3. Sarra Bendaho, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

4. Anis Mahmahi, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

5. Noureddineilyes Hattabi, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

6. Hiba Louzzani, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

7. Ines Abdelaziz, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2024 – July 2024

8. Abir Benzaamia, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2023 – July 2023

9. Melissa Mokhtari, at LIX from ESI Alger (6 months internship for eng. school diploma), Jan. 2023 – July 2023

10. Asmaa Elfraihi, at LIG from ESI Alger (6 months internship for eng. school diploma), Jan. 2022 – July 2022

11. Nardjes Amieur, at LIG from ESI Alger (6 months internship for eng. school diploma), Jan. 2022 – July 2022

12. Romaissa Kessi, at LIG from ESI Alger (6 months internship for eng. school diploma), Jan. 2022 – July 2022

13. Aya-Nour-Elimene Shabi, at LIG from ESI Alger (6 months internship for eng. school diploma), Feb. 2021 – Aug. 2021

14. Abdelbasset Aidouni, at LIG from ESI Alger (6 months internship for eng. school diploma), Feb. 2021 – Aug. 2021

15. Rosa Khennichei, at LIG from ESI Alger (6 months internship for final eng. school diploma), Dec 2019 – June 2020

16. Salim Chouaki, at LIG from ESI Alger (6 months internship for final eng. school diploma), Dec. 2019 – June 2020

17. Tinhinane Medjkounei, at LIG from ESI Alger (6 months internship for eng. school diploma), Dec. 2019 – June 2020

18. Avijit Ghosh, at LIG from IIT (summer intern), April – July 2019

19. Ikram Najeh, at LIG from Pau Univ. (full-time internship for M.Sc. thesis), Feb. – July 2018

20. Minh-Kha Nguyen, at LIG from MoSIG Grenoble Alpes Univ. (6 months internship for M.Sc. thesis), Feb. – July 2018

21. Andreou Athanasios, at MPI-SWS from EURECOM (6 months internship between M.Sc. and Ph.D.), Feb. – Sept. 2015 (co-advised with Krishna Gummadi)

Master Projects:

Typically 2 months of full-time work spread across several months.

1. Amirreza Nakhjavani, University Grenoble Alpes Master 1 internship "Characterization of Misinformation Sources", part-time Feb. 2022 – June 2022

2. Nadine Zaatary, University Grenoble Alpes Master 1 internship "Characterization of the Facebook News Ecosystem", part-time Feb. 2022 – June 2022

3. Carlos Fernandez-Yago, University Grenoble Alpes Master 1 internship "Algorithms for efficient generation of all possible targeting formulas", part-time Feb. 2019 – June 2019

4. Laura Aguilar, University Grenoble Alpes Master 1 internship "Assess accountability of identities using black market prices", part-time Feb. 2018 – July 2018

5. Dennis Mintah Djan, University Grenoble Alpes Master 1 internship "Build platform to bring transparency to targeted advertising on Twitter", part-time Feb. 2018 – July 2018

6. Andreou Athanasios and Shukla Rajat, EURECOM semester project on "Collection and analysis of dynamic data on Twitter", part-time Sept. 2013 – June 2014 (co-advised with Patrick Loiseau)

7. Sara Kaddouri, Ubinet (UNice) end of study project on "Study of the vulnerability of social business analytics", part-time Sept. 2013 – Feb. 2014 (co-advised with Patrick Loiseau)

8. Rohan Kathe and Priyanka Malekar, EURECOM semester project on "Large-scale study of popularity across social networks", part-time Sept. 2014 – June 2015 (co-advised with Patrick Loiseau)

9. Delali Toussa, EURECOM semester project on "Robust learning algorithms for social business analytics", part-time Sept. 2014 – Feb. 2015 (co-advised with Patrick Loiseau)

Research Funding / Collaborative Projects

I have listed only projects for which I am the PI, co-PI or local PI. I raised over 2.7M €.

PI – *PhD financed by the Agence Militaire d'IA pour la Défense*   2024 – 2027
"Detection of coordinated influence campaigns" (approx. 120,000 €)

Local PI for LIX partner – *ANR PRC*   2022 – 2026
"FeedingBias: A multi-platform mixed-methods approach to news exposure on social media" (my part: 162,000 €)
▷ This is an interdisciplinary project in collaboration with Gilles Bastin (social scientist), Emmanuel Marty (communication scientist), and Paolo Fresca (computer scientist).

PI – *ERC Starting Grant*   2022 – 2027
"MOMENTOUS: Measuring and Mitigating Risks of AI-driven Information Targeting" (1,499,952 €)

Local PI for LIG partner – *ANR PRCE*   2021 – 2025
"PROPEOS: Privacy-oriented Personalization of Online Services" (my part: 202,720 €)

Local PI for CNRS partner – *EU H2020*   2021 – 2024
"Trust aWARE: Enhancing Digital Security, Privacy and TRUST in softWARE" (my part: 461,000 €)

PI – *CNRS INS2I* (12 months CDD engineer)   2020 – 2021
"AdAnalyst: A tool to bring transparency to targeted advertising" (60,000 €)

co-PI (with Martial Mermillod and Laurent Beague) – *Pole Grenoble Cognition*   2020 – 2021
Support for new interdisciplinary collaboration (2,800 €)

co-PI (with Martial Mermillod and Laurent Beague) – *Maison Sciences Humaines (MSH)*   2020 – 2021
Support for user experiments (1,000 €)

PI – *ANR JCJC (Jeunes chercheuses – Jeunes chercheurs)*   2017 – 2021
"PRoTecT: Privacy and Trust in the User-Centric Internet" (267,000 €)

PI – *IDEX IRS (Accueil Nouveau Arrivants)*   2017 – 2018
"PRoTecT: Privacy and Trust in the User-Centric Internet" (15,000 €)

co-PI (with Patrick Loiseau) – *Data Transparency Lab Research Grants (Telefónica)*   2016 – 2017
"TranspAd: A Collaborative Tool to Bring Transparency to Targeted Advertising" (50,000 €)

Note: I have submitted 19 other national and international collaborative projects as (co-/local-)PI that have been rejected since 2015, and I was part of several other projects as a participant.

Software

My group made several public releases of software code, apps, and system deployments.

Elections2022   It is a website that presents statistics about political ads targeted in France before the 20222 Presidential Election. The website was developed by Romaissa Kessi (intern) and Vera Sosnovik (Ph.D. student). The website is based on algorithms that detect the social issue discussed in the ads (the paper is under submission), and, among many statistics, it shows with what ads different demographic groups have been targeted with.

CheckMyNews   A mixed-method platform to measure the impact of social media information on humans by combining active measurements (surveys) with passive measurements (user behavior). CheckMyNews is a browser extension that has been build on top of the AdAnalyst code (see below); but with significant extensions. My group is currently using this platform to perform several measurements and experiments (e.g., we monitored the U.S 2020 presidential elections).

AdAnalyst   A platform to audit targeted advertising practices. AdAnalyst collects the ads people see when they browse their Facebook timeline and provides users with statistics about who targets them and why. AdAnalyst is a transparency enhancing tool.

Impact: AdAnalyst contributed to many of the research contributions I made in the past 4-5 years. Most notably, AdAnalyst was **presented in the Brazilian Senate and was included in a list of software to protect election integrity before the 2018 Presidential Election.**[1] More than 2000 volunteers have installed our tool. More recently, we helped New York University release a similar tool (AdObserver), that has a significant user base in the U.S.[2] *AdAnalyst provided data for papers* [10],[14],[19],[16] *(who received three awards; and had an impact on European law; and pushed Facebook to implement better transparency mechanisms).* AdAnalyst also make users more aware and helps them control the data they share and the ads they get. We were the only group worldwide in 2019 with solutions to collect ad targeting information.[3] We shared this solution with the community.

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[1] https://www.youtube.com/watch?v=eGScrdi5hhU&t=3450s
[2] https://cybersecurityfordemocracy.org/
[3] https://www.propublica.org/article/facebook-blocks-ad-transparency-tools

Impersonation Discovery on Twitter (no longer maintained as of 2022) A service that allows users to check if they have been impersonated on Twitter (or check if someone else is impersonated). Identity impersonation attacks can have very negative consequences for users. This service enables users to protect themselves. The service implements the algorithms we proposed in [23]; and provides real-world validity to our results.

Datasets

WWW21 Dataset	http://lig-membres.imag.fr/gogao/www21.html
WWW20 Dataset	https://lig-membres.imag.fr/gogao/political_ads.html
KDD15 Dataset	https://lig-membres.imag.fr/gogao/data.html
WWW13 Dataset	https://lig-membres.imag.fr/gogao/data.html

Outreach

I have authored several pieces describing my research to a wider audience and I participated in podcast and TV interviews:

March 2024, Interview for CNRS Bronze Medal Award: Oana Goga récompensée pour l'étude des risques liés aux plateformes en ligne

February 2024, Seminar at Musée des Arts et Métiers – L'aventure des inventions

October 2022, Participation to podcast La data dans tous ses états

February 2022, Interview at B SMART TV–Smart TECH

February 2022, Speaker at Cafés Sciences et Citoyens de l'Agglomération Grenobloise , Les réseaux sociaux nous enferment-ils dans nos bulles ?

June 2021, Les enjeux de la publicité politique ciblée, Journal du CNRS (also covered by Liberation)

March 2021, Far-right news sources on Facebook are more engaging, Medium (also covered by Wired, CNN, USA TODAY)

January 2021, Facebook n'est pas compétent pour déterminer si une publicité est politique ou non, interview for LINC CNIL

June 2019, Publicité en ligne : reprenons la main, Le Blog Binaire in Le Monde

May 2019, Facebook's 'transparency' efforts hide key reasons for showing ads, The Conversation

Broader Impact

Datasets and software: Four datasets from my group's empirical studies have been made publicly available to support reproducibility and were used by many research groups. My group made three public releases of software code, apps, and system deployments, among which a system to detect impersonation attacks on Twitter and a system called AdAnalyst to collect the ads people see when they browse their Facebook timeline and provide statistics about who targets them and why. AdAnalyst was presented in the Brazilian Senate and was included in a list of software to protect election integrity before the 2018 Presidential Election.[4] More than 2000 volunteers have installed our tool. More recently, we helped New York University release a similar tool (AdObserver).

Work with civil societies and impact on law:

• June 2023, **I was hired as External Expert (with contract) by the European Commission (DG Connect & ECAT), to advise on the Delegated Act addressing the implementation of the DSA Article 40 that gives vetted researchers access to data from very large online platforms and very large search engines.** This mission is extremely important as the lack of access to data is the biggest problem the extended research community that works on assessing risks with online platforms has.

• June 2022, we answered the ARCOM "Public consultation on access to data from online platforms". The new Digital Service Act provides legal grounds for researchers to ask for data from online platforms. The ARCOM proposed several procedures to access this data. We wrote a document highlighting the problems with the current procedures. The fact that together with Beatrice Roussillon and Juliette Senechal we organized a community of social scientists, computer scientists, and legal scholars around online platforms allowed us to be in the perfect position to provide clear and informed answers to the consultation.

• March 2022, I was invited to discuss with the **Ambassadeur pour le numérique (Henri Verdier) at Quai d'Orsay** my work on political advertising and discussed what some adapted regulations are. I advised that they should push to include "Click Through Rate" in ad transparency requirements as they can help detect manipulatory practices (as discussed in my work FAT* [17]). I explained why it is impossible to ban political advertising (as I showed in WWW'21 [13]). "Click Through Rate" is now a requirement in the current draft of the "Regulation of the European Parliament and of the Council on the transparency and targeting of political advertising".

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[4] https://www.youtube.com/watch?v=eGScrdi5hhU&t=3450s

• Sept.–Nov. 2021, Following our IMC'21 [12] paper, my U.S. co-authors have been invited to provide a testimony to the Investigations & Oversight Subcommittee Hearing on "The Disinformation Black Box: Researching Social Media Data" of U.S. House Science [5] as well as the Joint Committee on the Draft Online Safety Bill of UK's House of Parliament [6]. We emphasized that the biggest problem is that researchers do not have access to data essential to fully assess risks with online systems and design better protective technologies; and that lawmakers could be able to provide such access through regulation.

We have discussed findings from IMC'21 [12].

• March 2021, **I was invited by the European Commission (DG Justice and Consumers) to consult them on the European Democracy Action Plan** and offer my expertise and opinion on regulating political advertising.

I have discussed findings from WWW'20 [14] and WWW'21 [13].

• August 2020, I wrote a statement together with civil societies asking for Universal Advertising Transparency by Default

The European Commission is working on two pieces of legislation that aim, in part, to regulate online political advertising: the European Democracy Action Plan and the Digital Services Act. We worked on a statement that was submitted to the DSA consultation (8th Sept. 2020) where we ask for universal ad libraries and meaningful transparency. Our paper (WWW'20 [14]) is used as central evidence to motivate why we need ad libraries that include all ads, and many of the technical requests we mention in the paper to improve transparency are reflected in the statement. The statement was signed by 30 civil societies, including Privacy International and the World Leadership Alliance - Club de Madrid (whose members are ex-presidents and prime ministers). **Several of our propositions are reflected in the current DSA draft.**

• 2020–2021, I was a consultant for two NGOs (Panoptykon Foundation and the European Partnership for Democracy) on regulating ad transparency mechanisms and political advertising. Together we tried to transform some of my research findings and expertise into concrete solutions for EU legislators.

Press Coverage (selection)

Note: My work has been covered by press, the following is a *selection* of articles that talk about my research. For some articles I have been interviewed by the journalists.

Jan 13, 2024 – Santé mentale des plus jeunes : les réseaux sociaux sur le banc des accusés, *Les Echos*

Dec 5, 2023 – Vidéos pour enfants : un ciblage publicitaire qui contourne la réglementation, *Le Monde*

March 14, 2023 – COMMENT BERCY PLANCHE SUR LA RÉGULATION DES PUBLICITÉS POLITIQUES, *Stratégies*

Sept 5, 2021 – New study: Misinformation gets 6x more clicks than news, *CNN*

Sept 2, 2021 – Misinformation on Facebook got six times more clicks than factual news during the 2020 election, study says, *Washington Post*

August 31, 2021 – Thousands of posts around January 6 riots go missing from Facebook transparency tool, *Politico*

March 4, 2021 – What's popular on Facebook? Extreme far right political views and lies, study says, *USA TODAY*

March 4, 2021 – Right-wing misinformation on Facebook is more engaging than its left-wing counterpart, research finds, *CNN*

March 4, 2021 – Fake News Gets More Engagement on Facebook?But Only If It's Right-Wing, *Wired*

Jan. 18, 2021 – It's Too Easy to Hide Bias in Deep-Learning Systems, *IEEE Spectrum*

Oct. 21, 2019 – Is Facebook planning to expose its microtargeting techniques for political ads?, *Quartz*

March 31, 2019 – La industria del eufemismo: quién tiene y cuánto cuestan tus datos, *El Pais*

Apr. 10, 2018 – Tout ce que Facebook sait de moi (et de vous), *Le Figaro*

Apr. 06, 2018 – "Why am I seeing this ad" explanations on Facebook are incomplete and misleading, a study says, *Quartz*

March 26, 2018 – Does Facebook's Ad Tool Mislead Voters?, *Bloomberg Businessweek*

March 23, 2018 – Facebook will no longer show audience reach estimates for Custom Audiences after vulnerability detected, *Marketing Land*

March 22, 2018 – To understand digital advertising, study its algorithms, *The Economist*

March 19, 2018 – "It might work too well": the dark art of political advertising online, *The Guardian*

March 18, 2018 – Is Facebook being honest with you about how it targets ads?, *Australian Broadcasting Corporation*

March 06, 2018 – Researchers Discovered Data Leak In Facebook's Ad Software, *Fast Company*

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[5] https://science.house.gov/hearings/the-disinformation-black-box-researching-social-media-data, https://republicans-science.house.gov/legislation/hearings/investigations-oversight-subcommittee-hearing-disinformation-black-box
[6] https://committees.parliament.uk/oralevidence/2816/html/

Jan. 09, 2018 – Facebook bug let advertisers find users' phone numbers, *The Telegraph*

Jan. 09, 2018 – Facebook bug could have exposed your phone number to marketers, *Naked Security*

Jan. 08, 2018 – Une faille dans Facebook laissait les annonceurs récupérer nos numéros de téléphone, *Siecle Digital*

Jan. 07 2018 – Facebook Bug Could Let Advertisers Get Your Phone Number, *WIRED*

Jun. 1, 2015 – Algorithms Are Getting Better at Matching Your Different Social Media Profiles, *Vice Motherboard*

References

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