



# DIGITAL JOURNALISM TRAINING

*Tools for Newsgathering & Reporting Across Cultures*

21-22 April 2013  
Amman, Jordan

Hosted by:



Jordan Media Institute • معهد الإعلام الأردني

In partnership with:



University of Missouri  
Missouri School of Journalism

We are pleased to welcome you to this  
**DIGITAL JOURNALISM TRAINING**

**Google**  
and the  
**United Nations Alliance of Civilizations**

in association with  
**The World Bank Institute**

Hosted by  
**The Jordan Media Institute**

21-22 April, 2013  
Amman, Jordan



Google is eager to see journalism flourish in the digital age, in all forms and on all continents. In Africa, we've partnered on a series of projects to spur innovation in African journalism, working with newsrooms across the continent to show journalists how the Internet can help them be better reporters -- whether it's doing advanced searches and analysis for investigative stories or incorporating great data-based visuals and citizen voices into their reporting. As media organizations continue to adapt to the new digital world, we're committed to working with journalists to help them use technologies to gather information and tell important stories.



The United Nations Alliance of Civilizations (UNAOC) is an initiative of the UN Secretary-General, which aims to improve understanding and cooperative relations among nations and peoples across cultures and religions. It also helps to counter the forces that fuel polarization and extremism. Established in 2005, the Alliance Secretariat, based in New York, works in four program areas to support such projects: youth, media, education, and migration. The UNAOC Media Program amplifies the constructive role of media in furthering public understanding of political, cultural and religious issues through a series of projects.



The World Bank Institute (WBI) is a global connector of knowledge, learning and innovation. It is part of the World Bank Group. We connect practitioners, networks and institutions to collaboratively find solutions to challenges. We link knowledge from around the world and scale up innovations, including with global, regional and national institutions and practitioner networks. WBI's Global Media Program is a partnership-driven initiative which collaborates with media practitioners (journalists, editors, media owners/managers, students, developers, and more) to strengthen the role of media as a key driver

of the global knowledge economy, and as a tech-enabled, institution of transparency and accountability



Jordan Media Institute • معهد الإعلام الأردني

JMI's goal is to become a Centre of Excellence in journalism education in Jordan and the region. JMI provides two pillars of services – a one year practical MA in Journalism and journalism training programmes, in Arabic. JMI offers the Master's Programme in cooperation with University of Jordan in accordance with the academic agreement between the two institutions. JMI's goal is to offer the best standards of journalistic practice with an emphasis on the traditional aspects of journalism, such as writing, reporting, ethics and community issues. This, combined with new media courses, will enable JMI's graduates to compete regionally and internationally.

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## An intercultural training

This Bootcamp will convene a group of editors, journalists and bloggers from the MENA region during two days. Make the most of your time at this workshop by interacting with each other and acquiring knowledge and tools that will strengthen your ability to communicate across different cultures. Take advantage of this opportunity to interact with the other participants and notice how diversity can be an asset for intercultural exchange. From this, mutual trust, better understanding and innovative mindsets can emerge. You will also have the chance to compare approaches to online journalism and digital tools, while learning many other supplementary tools (some of which we think we know, but don't!) that will help you in newsgathering and reporting across cultures.

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## Stay Connected!

Interested in one or more of the presentations? Want to know more? Please talk, listen, mix, and voice your opinion at this workshop by interacting with each other. Let's stay connected!

@googlearabia  
@unaoc  
@siebergd  
@mahagaber  
@JoMedIns  
@craighammer  
@steffidurand  
@vanessagene  
@nickdigital  
@globalexperts

Hashtag: #dbootcamp... and tweet about the workshop

Couldn't come to the bootcamp? You can still attend the workshops by joining our **Google Hangout** on the **Google for Media page** – join us April 21 & 22 at [plus.google.com/+googleformedia](https://plus.google.com/+googleformedia)

# RESOURCES

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## Free Resources for new open data journalists: step-by-step tutorials

- **The Guardian DataBlog** – ‘How to Be a Data Journalist’:  
<http://www.guardian.co.uk/news/datablog/2010/oct/01/data-journalism-how-to-guide>
  - **The Knight Digital Media Center** – a series of free, step-by-step tutorials:  
<http://multimedia.journalism.berkeley.edu/tutorials/cat/data>
  - **The Open Data Manual** – an online handbook that walks readers through using open data:  
<http://opendatamanual.org/index.html>
  - **The World Bank’s Open Data Platform** – a ‘one-stop-shop’ for a *vast* amount of country data:  
<http://data.worldbank.org/>
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## Some Helpful Google Tools

- **Google Fusion Tables** is an experimental data visualization web application to gather, visualize, and share larger data tables. <https://developers.google.com/fusiontables/>
  - **Google Refine** is a power tool for working with messy data, cleaning it up, transforming it from one format into another, extending it with web services, and linking it to databases like Freebase.  
<http://code.google.com/p/google-refine/>
  - **Google Correlate** finds search patterns which correspond with real-world trends.  
<http://www.google.com/trends/correlate>
  - **Google Trends** shows how often a particular search-term is entered relative to the total search-volume across various regions of the world, and in various languages.  
<http://www.google.com/trends/>
  - **Google Hangouts**: Hangouts let you video chat with up to nine people, face-to-face-to-face and add applications to your conversations to have more meaningful interactions online. Journalists can take advantage of this tool to gain access to sources that are far away and make positive connections with their audience.
  - **YouTube**: An online platform allowing users to share their videos with friends, family, and the world. Journalists can link to source material, connect with viewers, and reach new audiences.
  - **Google Maps/Earth**: This feature allows users to find local businesses, view maps, get driving directions, and view satellite imagery, terrain and 3D images. Maps are an excellent compliment to any story that help readers track developing issues in real time or get a better sense of the stories going on around them.
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## Open Data Journalism Handbook

The **Open Data Journalism Handbook** is a free online resource (underwritten by the European Journalism Centre and the Open Knowledge Foundation).

The Handbook aims to answer questions like: Where can I find data? How can I request data? What tools can I use? How can I find stories in data? How can I make data journalism sustainable? Development of the Handbook was launched at the Mozilla Festival in London in November 2011 with 50 contributors, including data journalists and professors from a range of publications (now including The New York Times, The Financial Times, The Guardian, The Chicago Tribune, The Medill School of Journalism, The Cronkite School of Journalism, The BBC, City University London, Scraperwiki, Zeit Online, and more. You can access the free **Open Data Journalism Handbook** at: <http://datajournalismhandbook.org/1.0/en/index.html>

# CONFERENCE AGENDA

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## Day 1: Sunday, 21 April 2013 Digital Journalism Bootcamp *Hands-On Training*

TIME	SESSION TOPIC	LEAD SPEAKERS/ TRAINERS
9:00am-9:20am	Opening/ Key Note Speech: “Successes and Challenges of Arab Media”	HRH Princess Rym Ali, Founder of the Jordan Media Institute

9:20am-9:30am	Welcome words from organizers	Maha Abouelenein (Google) Daniel Sieberg (Google) Stephanie Durand (UNAOC) Craig Hammer (WBI)
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9:30am-10:30am	Keeping the Net Free and Open	Bill Echikson (Google)
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Not long ago, a powerful elite controlled all forms of communication. The Internet overthrew this accepted top down order, providing each one of us with the ability to leap borders, to disregard convention, and to engage in unprecedented debate on everything from movies to the monarchy. More than two billion people are active online today, and any one of them can publish their ideas that can be discovered and consumed. More information generally translates into more choice, and ultimately more power for the individual.

Unfortunately, many governments and institutions are uncomfortable losing control, which means the year ahead may be marked by an accelerated crackdown on web freedoms. At Google, we already see free expression stifled almost every day. Our products—from search and Blogger to YouTube and Google Docs—have been blocked in more than 25 of the approximately 150 countries where we offer our services. At least 17 countries have blocked Youtube at one time or another and it remains off limits today in China, Iran and North Korea.

10:30am-10:50am	Social Media—Opportunities & Challenges to cross-cultural dialogue: A United Nations Perspective.	Stephanie Durand (UNAOC)
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Social media are not just social: they are global. They affect us as consumers of information, as journalists, companies, activists, etc. While representing a tremendous opportunity to be more aware and sensitive to individuals and diverse cultures, social media can also contribute to promoting intolerance and misinformation across societies and communities. How can we ensure that social media help both news consumers to get exposed to new ideas and a diversity of opinions, and help journalists to broaden the conversation and interact with wider audiences? The UNAOC's work in media aims to facilitate the use of digital tools through the power of technologies and social media in order to build trust and dialogue, thereby supporting accurate, balanced and informative reporting, and understanding of complex cross cultural issues.

10:50am-11:00am	Coffee Break	
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11:00am-12:30pm	Finding the Hot Keyword	Daniel Sieberg (Google)
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Journalists use search engines to do their jobs every day, from finding story ideas to locating sources. This workshop will help journalists receive more accurate search results on the web by exploring which “trigger” words to use, how to filter out unwanted content from their search queries. They will also learn the benefits of using more advanced tools like **Google Trends** to compare what keywords people are searching for on a daily basis and how often. It’s important for journalists to monitor hot topics and gain a snapshot of the public’s collective mind, which this workshop will give them the tools to do.

12:30pm-2:00pm	Lunch Break - JMI Cafeteria	
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2:15pm-3:30pm	Mapping out your story : Mapping tools for Journalists	Vanessa Schneider (Google)
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A map can be a great complement to the right story. Whether you're comparing local demographic data, setting the scene in a broadcast story, or looking to display satellite imagery of an affected disaster area, a map can help bring your data to life for your reader. This workshop will provide an introduction to **Google Maps**, **Google Earth** and **Google Fusion Tables** — three mapping tools that can help you tell your story in a compelling and visual way. We'll also review several examples of how newsrooms around the world are already using these tools.

3:30pm-4:30pm	An Introduction to Data Journalism	Daniel Sieberg (Google)
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It’s no secret that data-gathering and journalism go hand in hand – but then what? This workshop will give journalists the nuts and bolts training on spreadsheets, acquiring data from local open data portals, cleaning up data and creating visualizations with it. Some of the tools explored in this workshop will be: **Google Correlate**: mines similar patterns in search data terms. It allows comparisons of search terms over a specific time series or specific location. You can also compare your data set and map it against Google’s search terms. **Google Refine**: when working with messy data, this tool enables users to clean it up, transform it from one format to another, extend it with web services and link to databases. This tool is particularly useful for comparing geo-coding results, satellite imagery, etc.

4:30pm-6:00pm	How to tell stories with data	Craig Hammer (World Bank)
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In recent months central and local governments around the world have ‘opened’ data, for free, as part of the Open Government Partnership. While this has resulted in intense excitement from software developers, hackers, development practitioners, and government sponsors, much of the public has been left behind. The level of informed public debate on data-related issues across ‘opened’ sectors remains variable at best. This partnership-driven Data Journalism Bootcamp is designed around a deceptively simple question: “Now that data has been ‘opened’, how can it capture the attention and imaginations of the full spectrum of users?” In other words, how can we focus on the other side - the demand side - of the open data phenomenon? How can we grow communities of data users, and encourage data 'ownership' by the media, civic hackers, community groups, NGOs, labor unions, professional associations, universities, and more?



6:00pm-6:15pm	Wrap-up Day 1	Yasar Durra, Training Manager, JMI
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8:30 pm	Dinner Hosted by Google in Amman	All participants
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## Day 2: Monday, 22 April 2013

### Digital Journalism Bootcamp

#### *Hands-On Training*

9:00am-10:00am	Keynote: “From Arab Street to Arab Stream”	Faisal Abbas (Al Arabiya English)
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“From Arab Street to Arab Stream”: People around the world were taken by surprise when they saw young Arabs revolting in such a uniform, organized manner in 2011, however, this sudden “outburst” wasn’t sudden at all; it had been brewing online for a while. The lecture seeks to discuss the impact that social media and digital platforms have had on what is commonly referred to as the ‘Arab Street’ and discusses the impact that new technology has had on communication, lobbying and censorship in the region, paving the way for the rise of the ‘online citizen’.

10:00am-11:15am	How to get the best sources in your newsroom	Daniel Sieberg (Google)
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The rise of technology has meant a lot of things for journalism, one being raising the bar in terms of sources for stories. With just a phone or video call you can have some of the leading experts weighing in on your story, or first hand witnesses giving an account to your viewers – even if they’re all the way around the world. Some of the tools this workshop will help journalists explore and master, in terms of professional newsgathering, are **YouTube** and **Google Hangouts**.

11:15am-12:45pm	My First Fusion Tables Visualization	Vanessa Schneider with Daniel Sieberg & Nicholas Whitaker (Google)
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Looking to tell a visual story with your data? In this interactive workshop, we’ll teach you how to get started with Fusion Tables, a tool to help you host, visualize and publish your data as maps, charts and timelines. The session will start with a brief overview of Fusion Tables and related tools, including Google Refine. Then we’ll dive into some hands-on examples to get you familiar with how easily your data can be turned into a visualization with impact. Pre-requisite: Please make sure to create a Google account ahead of this session — you’ll need it in order to do the exercises:

[google.com/accounts/NewAccount](https://accounts.google.com/Accounts/NewAccount)

1:00pm-2:00pm	Lunch Break – JMI Cafeteria	
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2:00pm-3:30pm	Ethical Issues in Online Journalism	Charles Davis (Missouri)
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This course will look at the ethics of online engagement. It will focus on the notion of journalistic independence and the challenge of social media. It will also tackle balancing the personal and professional online presence, in addition to examining online journalism versus online advocacy. The unit will address many of the ethical issues confronting digital journalists, from transparency of method

to sponsored content to distortion and digital manipulation/enhancement, and will conclude with a practical framework for considering questions of applied ethics. Examples and anecdotes will illustrate the cross-cultural complexes of digital journals in real time.

Topics for the presentation include:

- The philosophical foundations of media ethics
- The fundamentals of ethics codes
- Anonymity/Confidentiality
- Objectional/Questionable Content
- Independence vs. Your Online Presence
- Management of the Digital Footprint
- A Framework for Ethical Decision Making

<b>3:30pm-5:00pm</b>	<b>Friend, Follow, Watch and Learn: Social Media &amp; Cross-Cultural Dialogue for Journalists</b>	<b>Melody Moezzi (UNAOC Global Expert)</b>
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### **Creating a Cross-Cultural Buzz**

The use of social media, like Facebook and Twitter, in daily reporting is a growing trend providing journalists with the opportunity to communicate directly with their audience. It has also been used to bring various protests and revolutions to the forefront in world events. This newfound open dialogue gives the opportunity to promote cross-cultural communication and understanding, but if not executed correctly can do exactly the opposite. The platform can inhibit awareness while potentially promoting intolerance and misinformation across cultures. The workshop will help journalists understand the scope and limitations of this type of media and provide practical skills in order to facilitate effective interactive news coverage.

### **Putting it in Practice – A Competition**

Participants will divide into small groups; each assigned a different global issue. The groups will take 20 minutes to come up with a social media strategy that promotes intercultural dialogue and understanding on the subject while using the information they have just acquired. Each group will present their plan to the rest of the participants. The team with the best idea, to be decided by a vote from their peers, will win a small prize.

### **Social Networking**

Other journalists are important sources for media professionals. This portion of the course will give the chance to collect the contact information (Twitter handles, Facebook, Google+, YouTube channels, email) from the other participants. It comes with the reminder that their collaboration with one another will promote intercultural dialogue and understanding while helping them improve their own reports.

<b>5:00pm-5:15pm</b>	<b>Wrap up of two-day training</b>	<b>Yasar Durra, Training Manager, JMI</b>  <b>Few Words by Google, UNAOC and WBI</b>
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# HOSTS AND ORGANIZERS

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## **MAHA ABOUELENEIN / Google**

Maha Abouelenein is the Head of Global Communications & Public Affairs for Google in the Middle East & North Africa. With more than 20 years of experience in corporate communications, PR strategy and campaign management, Maha drives the Google communications apparatus for 18 countries. Maha holds a Masters Degree in Communications from Minnesota State University - Mankato, USA and an undergraduate degree in International Business & Marketing with a minor in French.



## **HHR PRINCESS RYM ALI / Jordan Media Institute**

Her Royal Highness Princess Rym Ali, an internationally renowned journalist, is the founder of JMI. Prior to marrying His Royal Highness Prince Ali Bin Al Hussein, Her Royal Highness worked extensively for international broadcasters including CNN, BBC, Dubai TV, Bloomberg TV, Radio Monte Carlo Moyen Orient and United Press International-UPI. A graduate of Columbia University's School of Journalism, Princess Rym Ali also holds a MPhil in Political Science from the Institut d'Etudes Politiques (Sciences Po) in Paris and a MA in English Literature from the Sorbonne. Princess Rym Ali has received many prestigious journalism-related awards including the Alumni Award from the Columbia University School of Journalism, the "Best International Journalist" prize at the 32nd Ischia International Journalism Awards Ceremony and the Excellence in Media Award from the Global Thinkers Forum.



## **STEPHANIE DURAND / UNAOC**

Stephanie Durand is Strategic Media Partnerships Manager at the United Nations Alliance of Civilizations. She is in charge of media partnerships/ projects management & development, from meeting of media leaders, training of journalists, innovative projects, and manages over 150 strategic media partners worldwide. She previously worked at Sciences Po Paris as associate director at the international affairs office and as head of international development at the School of Journalism. She holds a master's degree from Sciences Po Paris and the London School of Economics in International Affairs with a focus on international media, and an executive master in media management from Sciences Po.

## **YASAR DURRA / Training Manager, Jordan Media Institute**



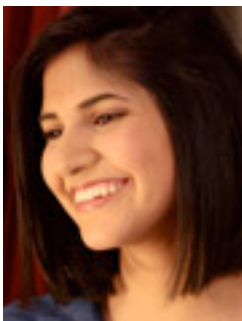
**CRAIG HAMMER / World Bank Institute**

Craig Hammer is Program Leader of The World Bank Institute's Global Media Development program, a partnership-driven initiative, which focuses on information and media as drivers of good governance. A licensed attorney, his work at the World Bank has included strengthening laws, policies, and regulations to enhance the enabling environment for media, as well as collaborative approaches with media practitioners (journalists, editors, media owners/managers, students, developers, and more) to strengthen the role of media as a key driver of the global knowledge economy, and as a tech-enabled, institution of transparency and accountability.



**DANIEL SIEBERG / Google**

Emmy-nominated Daniel Sieberg is a tech expert and author who now works with Google marketing as spokesperson and leads media outreach across products like Google+, Google Earth/Maps, Google's Politics & Elections team and more. Dating back to 2000, Sieberg was previously a tech contributor at ABC News and MSNBC, the CBS News science and technology correspondent, and the technology correspondent for CNN. His written work has appeared in several publications including Time, Salon and Details. He started his journalism career as a daily reporter at the Vancouver Sun covering tech/business/civics in 1998. His first book titled, The Digital Diet: the four-step plan to break your tech addiction and regain balance in your life, was published in May 2011 with additional printings in the UK, Japan and Korea. Sieberg has a bachelor's degree in writing/communications (UVic, '98) and master's degree in journalism with a focus in technology (UBC, '00).



**MEENAKSHI DALAL / UNAOC Assistant Coordinator**

Meenakshi Dalal is a 22-year-old broadcast journalist from the Missouri School of Journalism, currently working with the UNAOC's media program. She also writes, produces and edits for newsy.com, which provides multi-source mobile news analysis to multiple media partnerships. Through Newsy, Dalal creates content for The Huffington Post, AOL, About.com and others. In addition she produces shows and reports for the NBC affiliate station KOMU.

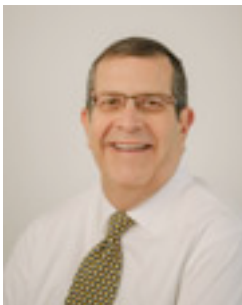
# EXPERT PROFILES

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**FAISAL J. ABBAS/ Al Arabiya News Channel's English online service**

Faisal J. Abbas is the Editor-in-Chief of Al Arabiya News Channel's English online service English.Alarabiya.Net; an award-winning journalist and avid blogger renowned for his contributions for the US-based Huffington Post. His previous work includes reporting and producing for Future Television and founding the paper's acclaimed Media Supplement section of Asharq Al Awsat, a London based pan-Arab Daily. Faisal also worked for Al Hayat, an international Arab newspaper. He contributes commentary to Foreign Policy magazine, Financial Times, The Times and International Herald Tribune; as well as regular appearances as a pundit on Middle Eastern affairs for CNN, BBC, and Sky, among others. During the Arab Spring, Faisal focused on examining the role of social media during the revolutions and the impact they have on Arab societies. He has given many lectures and talks about this topic at Cambridge, LSE, SOAS and other academic institutions and is currently researching a book on the same topic.



**CHARLES N. DAVIS / Missouri School of Journalism, Reynolds Journalism Institute**

Charles N. Davis focuses his scholarly research at the Missouri School of Journalism on access to governmental information and media law. His work appears in law reviews and scholarly journals on issues ranging from federal and state freedom of information laws to libel law, and privacy. He earned a Sunshine Award from the Society of Professional Journalists for his work in furthering freedom of information. He was a co-investigator for an award from the U.S. Department of State for a curriculum reform project for Moscow State University in Russia. He is a member of the Association for Education in Journalism and Mass Communication, the Society of Professional Journalists and Investigative Reporters and Editors.



**WILLIAM ECHIKSON / Google**

William Echikson is Google's Head of Communications and Public Affairs for Free Expression in Europe, Middle East and Africa. In that role, he is responsible for leading the company's outreach on its Transparency Report and in its relations with international organizations. Previous work included working as European foreign correspondent for a series of US publications including the Christian Science Monitor, Wall Street Journal, Fortune, and BusinessWeek. From 2001 until 2007, he managed the Brussels bureau for Dow Jones as bureau chief. William also has written, directed and produced for television documentaries for America's Public Broadcasting Service. He has published four books of narrative non-fiction, including a work on the collapse of communism and the history of the Bordeaux wine

region. He graduated from Yale College with a Magna Cum Laude degree in history.



**MELODY MOEZZI / Writer, Activist, award-winner author and UNAOC Global Expert**

Melody Moezzi is an Iranian-American writer, activist, attorney and award-winning author. She is a United Nations Global Expert with the UN Alliance of Civilizations; a member of the British Council's Our Shared Future Opinion Leaders Network, and a member of the U.S. State Department's Generation Change initiative. Moezzi blogs for The Huffington Post, Ms. and Bipolar Magazine. Her writings have appeared in The Washington Post, The Guardian, The Christian Science Monitor, CNN, NPR, Al Arabiya, Parabola, and the Yale Journal for Humanities in Medicine, among other outlets. Moezzi has provided on-air commentaries for NPR's All Things Considered, BBC, CNN, and many other broadcast news programs.



**VANESSA SCHNEIDER / Google**

Based in Mountain View, California, Vanessa Schneider's been with Google for two years, working on outreach for Google Maps. Before becoming a Googler, Vanessa worked at The New York Times for several years as a community and user-generated content specialist, Time Inc. as a researcher and reporter, and at New York startup Hot Potato, acquired by Facebook in summer 2010. Vanessa has a bachelor's degree in Journalism and Culture & Communication (Ithaca College, '07).



**NICHOLAS WHITAKER / Google**

Before joining Google as senior producer on Google Earth and Google+ Hangouts, Nicholas Whitaker spent the past decade producing, shooting, directing and editing hundreds of videos for non-profits, fortune 500 companies and government agencies. Since 2008, Nicholas has also been a professor at Eugene Lang College The New School for Liberal Arts, and Marymount Manhattan College where he teaches courses in video production, new media and media theory.

Nicholas earned his bachelor's degree in media studies/documentary video production (New School University, 2005) and a master's degree in media, culture and communications with a focus in political communication and new media (NYU, 2008) Nicholas is currently based out of Brooklyn, New York.



# GLOSSARY

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**Access:** A privilege to use computer information in some manner. For example, a user might be granted *read access* to a file, meaning that the user can read the file but cannot modify or delete it. Most operating systems have several different types of access privileges that can be granted or denied to specific users or groups of users.

**Acquisition:** An asset or object bought or obtained, typically of one company acquiring another.

**Affiliate:** A type of inter-company relationship in which one of the companies owns less than a majority of the other company's stock, or a type of inter-company relationship in which at least two different companies are subsidiaries of a larger company.

**Application:** An application is a program or group of programs designed for end users. Application software can be divided into two general classes: *systems software* and *applications software*. Systems software consists of low-level programs that interact with the computer at a very basic level. This includes operating systems, compilers, and utilities for managing computer resources.

**Authentication:** A security measure designed to protect a communications system against acceptance of a fraudulent transmission or simulation by establishing the validity of a transmission, message, or originator.

**Bandwidth:** The amount of data that can be transmitted in a fixed amount of time. For digital devices, the bandwidth is usually expressed in bits per second (bps) or bytes per second. For analog devices, the bandwidth is expressed in cycles per second, or Hertz (Hz).

**Blog:** A Web site that contains an online personal journal with reflections, comments, and often hyperlinks provided by the writer.

**Bookmark:** An address for a website stored on a computer so that the user can easily return to the site.

**Browser:** A software application used to locate, retrieve and also display content on the World Wide Web, including Web pages, images, video and other files.

**Cache:** A fast storage buffer in the central processing unit of a computer. Also called *cache memory*.

**Cloud Computing:** A model for delivering information technology services in which resources are retrieved from the internet through web-based tools and applications, rather than a direct connection to a server. Data and software packages are stored in servers. However, cloud computing structure allows access to information as long as an electronic device has access to the web. This type of system allows employees to work remotely.

**Code:** A system of symbols and rules used to represent instructions to a computer; a computer program.

**Community Guidelines:** A set of rules and guidelines set by Internet and mobile providers on their services in order to help users enjoy their services without harming others.

**Contact:** The entity responsible for providing and maintaining the connection of a network which allows other users to interact with one another.

**Cookies:** A message given to a Web browser by a Web server. The browser stores the message in a text file. The message is then sent back to the server each time the browser requests a page from the server.

**Crawler:** A Web crawler is a computer program that browses the World Wide Web in a methodical, automated manner or in an orderly fashion.

**Cyber-Bullying:** The electronic posting of mean-spirited messages about a person often done anonymously.

**Digitize:** To transcribe (data) into a digital form so that it can be directly processed by a computer

**Domain:** A group of networked computers that share a common communications address.

**Download:** To copy data from one computer to another or to a disk.

**Drag-And-Drop:** In computer graphical user interfaces, drag and drop is a pointing device gesture in which the user selects a virtual object by "grabbing" it and dragging it to a different location or onto another virtual object. In general, it can be used to invoke many kinds of actions, or create various types of associations between two abstract objects.

**Ecosystem:** A digital ecosystem is a distributed adaptive open socio-technical system with properties of self-organization, scalability and sustainability inspired from natural ecosystems. As an emerging field of study, "digital ecosystems" is informed by knowledge of natural ecosystems and is still being defined.

**Embed:** To make images, sound, or computer software a part of other software.

**Encode:** To convert (a message) from plain text into code.

**Encryption:** Encryption is a process which is applied to text messages or other important data, and alters it to make it humanly unreadable except by someone who knows how to decrypt it. The complexity of the algorithms used means that a strongly encrypted message might require thousands of years of processing by very fast computers to break the encryption.

**Feed:** A Web document that is a shortened version of a Web page that has been created for syndication. Feeds usually end in .xml or .rss.

**Firewall:** A system designed to prevent unauthorized access to or from a private network. Firewalls can be implemented in both hardware and software, or a combination of both. Firewalls are frequently used to prevent unauthorized Internet users from accessing private networks connected to the Internet, especially *intranets*. All messages entering or leaving the intranet pass through the firewall, which examines each message and blocks those that do not meet the specified security criteria.

**Gadget:** A gadget is a small tool such as a machine that has a particular function, but is often thought of as a novelty.

**Gateway:** Software or hardware that enables communication between computer networks that use different communications protocols. Also called *router*.

**Hits:** A hit is a request for a file made by a user-agent. User-agents include web browsers and search engine indexing programs, or spiders. Each time a web page is viewed a user-agent requests the individual files that make up the page from the computer where the website is stored (web server). A record of the hits received is automatically created and saved as part of monitoring the web server performance. This record is called a web server log.

**IP Address:** *IP address is short for Internet Protocol (IP) address.*

An IP address is an identifier for a computer or device on a TCP/IP network. Networks using the TCP/IP protocol route messages based on the IP address of the destination.

**Keyword:** A word that acts as the key to a cipher or code.



**Link:** a link is a reference to another document. Such links are sometimes called *hot links* because they take you to other document when you click on them.

**Malware:** Software that is intended to damage or disable computers and computer systems.

**Notification:** A signaling technique used by data transmission systems in order to indicate the status of anything from changes to updates.

**Online:** Controlled by or connected to another computer or to a network.

**Open Source:** *Open source* refers to a program in which the source code is available to the general public for use and/or modification from its original design free of charge, i.e., open. Open source code is typically created as a collaborative effort in which programmers improve upon the code and share the changes within the community. Open source sprouted in the technological community as a response to proprietary software owned by corporations.

**Phishing:** Phishing is the act of attempting to acquire information such as usernames, passwords, and credit card details (and sometimes, indirectly, money) by masquerading as a trustworthy entity in an electronic communication.

**Platform:** A computing platform includes a hardware architecture and a software framework (including application frameworks), where the combination allows software, particularly application software, to run.

**Plug-In:** A hardware or software module that adds a specific feature or service to a larger system. The idea is that the new component simply *plugs in* to the existing system.

**Post:** A message published in an online forum or newsgroup.

**Privacy Policy:** A privacy policy is a legal document that discloses some or all of the ways a party gathers, uses, discloses and manages a customer's data

**Profile:** (Profiles) are the information that you provide about yourself when signing up for a social networking site. As well as a picture and basic information, this may include your personal and business interests, a “blurb” about yourself, and tags to help people search for like-minded people.

**Rate/Rating:** A classification or ranking of someone or something based on a comparative assessment of their quality, standard, or performance.

**Server:** A computer or computer program that manages access to a centralized resource or service in a network.

**Snippet:** Snippet is a programming term for a small region of re-usable source code, machine code or text.

**Spam:** Spam is most often considered to be electronic junk mail or junk newsgroup postings. Some people define spam even more generally as any unsolicited email.

**Spyware:** Software that self-installs on a computer, enabling information to be gathered covertly about a person's Internet use, passwords, etc

**Tag/ Tagging:** Commonly used in blogs, site authors attach keyword descriptions (called tags) to identify images or text within their site as a categories or topic. Web pages and blogs with identical tags can then be linked together allowing users to search for similar or related content.

**Theme:** A template designed specifically for use to enhance the visual appearance and usability of a blog. Many blogging software providers offer a selection of themes for bloggers to choose from for their blogs.

Alternatively, predesigned blog themes can be found through a variety of websites, and many web designers create custom themes for blogs.

**Trends:** A general direction in which something is developing or changing

**Update:** A manipulation involving adding, modifying, or deleting data to bring a file or database up to-date.

**Upgrade:** Raise (something) to a higher standard, in particular improve (equipment or machinery or even software) by adding or replacing components.

**Upload:** To transmit data from a computer to a bulletin board service, mainframe, or network. For example, if you use a personal computer to log on to a network and you want to send files across the network, you must upload the files from your PC to the network.

**URL:** Uniform (or universal) resource locator, the address of a World Wide Web page.

**Webmaster:** A person who designs and develops Web sites