



UNIVERSITÀ
DEGLI STUDI
DI TERAMO

Verification source –
Criteria for evaluating evidence

Prof CECARO MASSIMO

Wikipedia vs Peer-Reviewed Medical Literature for Information About the 10 Most Costly Medical Conditions

Robert T. Hastly, DO; Ryan C. Garbalosa, DO; Vincenzo A. Barbato, DO; Pedro J. Valdes Jr, DO; David W. Powers, DO; Emmanuel Hernandez, DO; Jones S. John, DO; Gabriel Suci, PhD, MSPH; Farheen Qureshi, DO; Matei Popa-Radu, DO; Sergio San Jose, DO; Nathaniel Drexler, DO; Rohan Patankar, DO; Jose R. Paz, DO; Christopher W. King, DO; Hilary N. Gerber, DO; Michael G. Valladares, DO, MS; and Alyaz A. Somji, DO

From the Campbell University Jerry M. Wallace School of Osteopathic Medicine in Buies Creek, North Carolina (Dr Hastly); the Department of Cardiology at Deborah Heart and Lung Center in Browns Mills, New Jersey (Dr Garbalosa); the Nova Southeastern University College of Osteopathic Medicine (NSU-COM)/ Palmetto General Hospital Internal Medicine Residency (Drs Barbato, Valdes, Powers, Hernandez, John, Qureshi, Popa-Radu, San Jose, Drexler, Patankar, Paz, King, and Somji) and the Traditional Rotation Internship (Dr Gerber) in Hialeah, Florida; the Department of Biostatistics at the NSU-COM in Fort Lauderdale, Florida (Dr Suci); and the Larkin Community Hospital Gastroenterology Fellowship Program in South Miami, Florida (Dr Valladares).

Financial Disclosures:

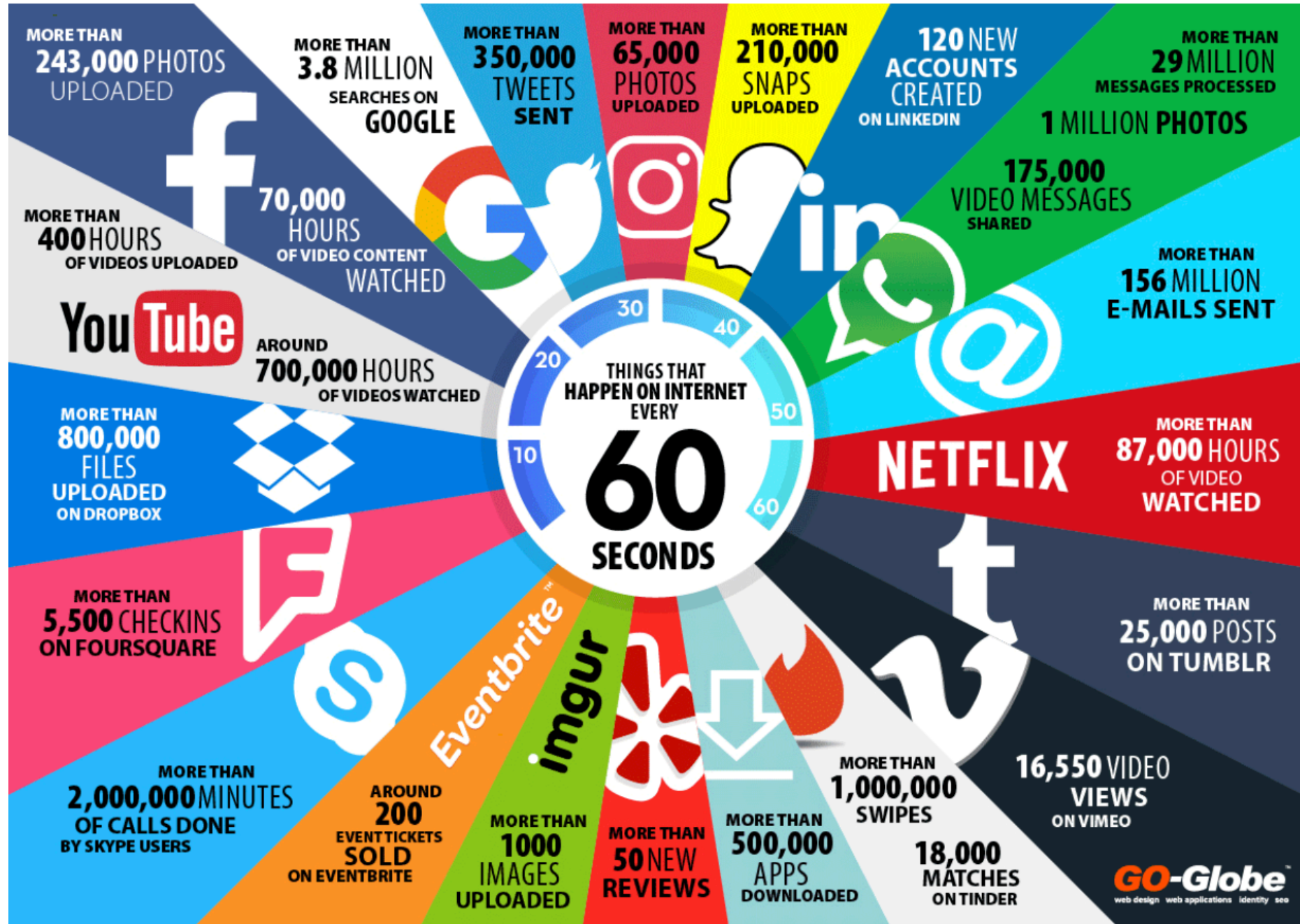
None reported.

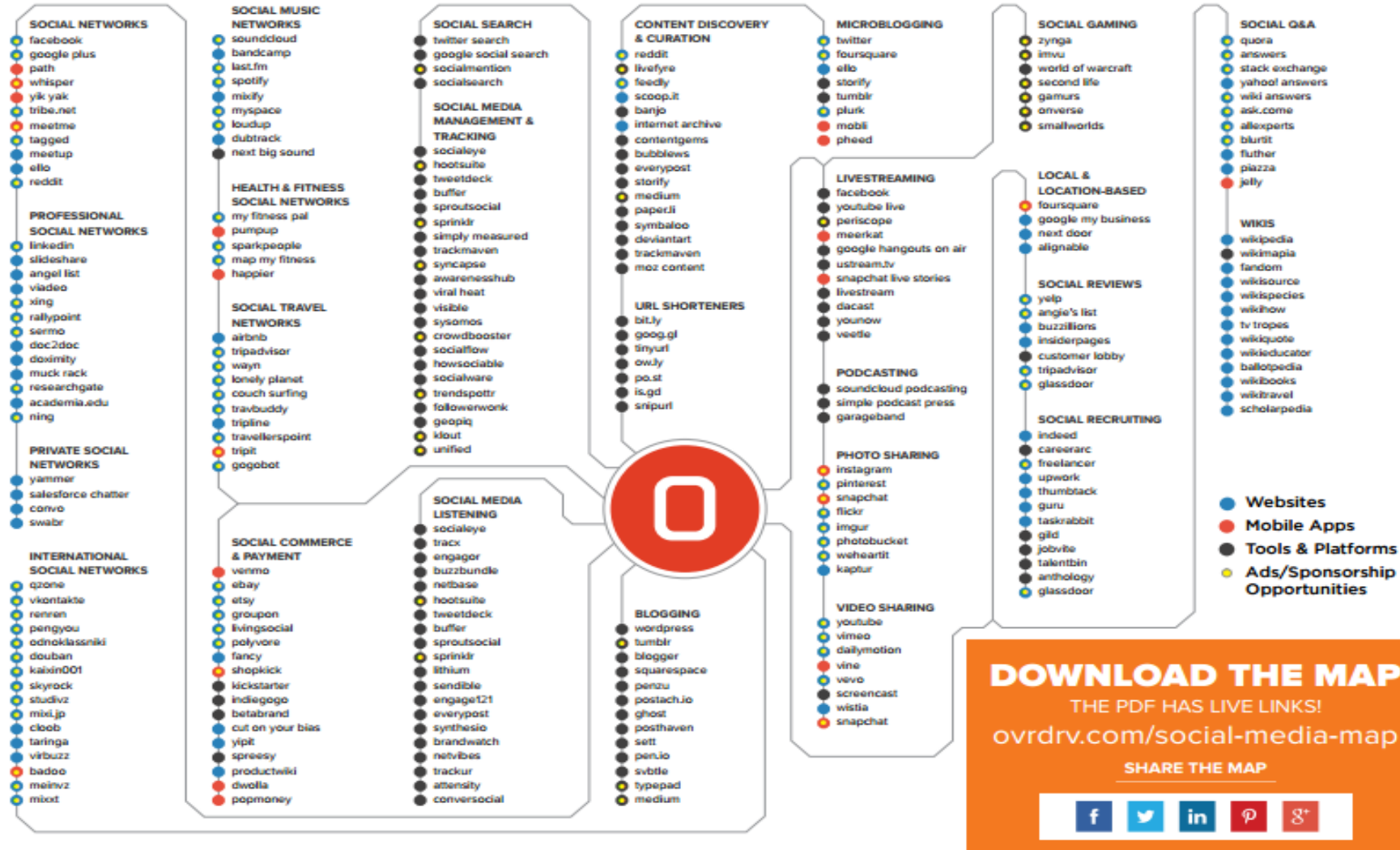
Context: Since its launch in 2001, Wikipedia has become the most popular general reference site on the Internet and a popular source of health care information. To evaluate the accuracy of this resource, the authors compared Wikipedia articles on the most costly medical conditions with standard, evidence-based, peer-reviewed sources.

Methods: The top 10 most costly conditions in terms of public and private expenditure in the United States were identified, and a Wikipedia article corresponding to each topic was chosen. In a blinded process, 2 randomly assigned investigators independently reviewed each article and identified all assertions (ie, implication or statement of fact) made in it. The reviewer then conducted a literature search to determine whether each assertion was supported by evidence. The assertions found by each reviewer were compared and analyzed to determine whether assertions made by Wikipedia for these conditions were supported by peer-reviewed sources.

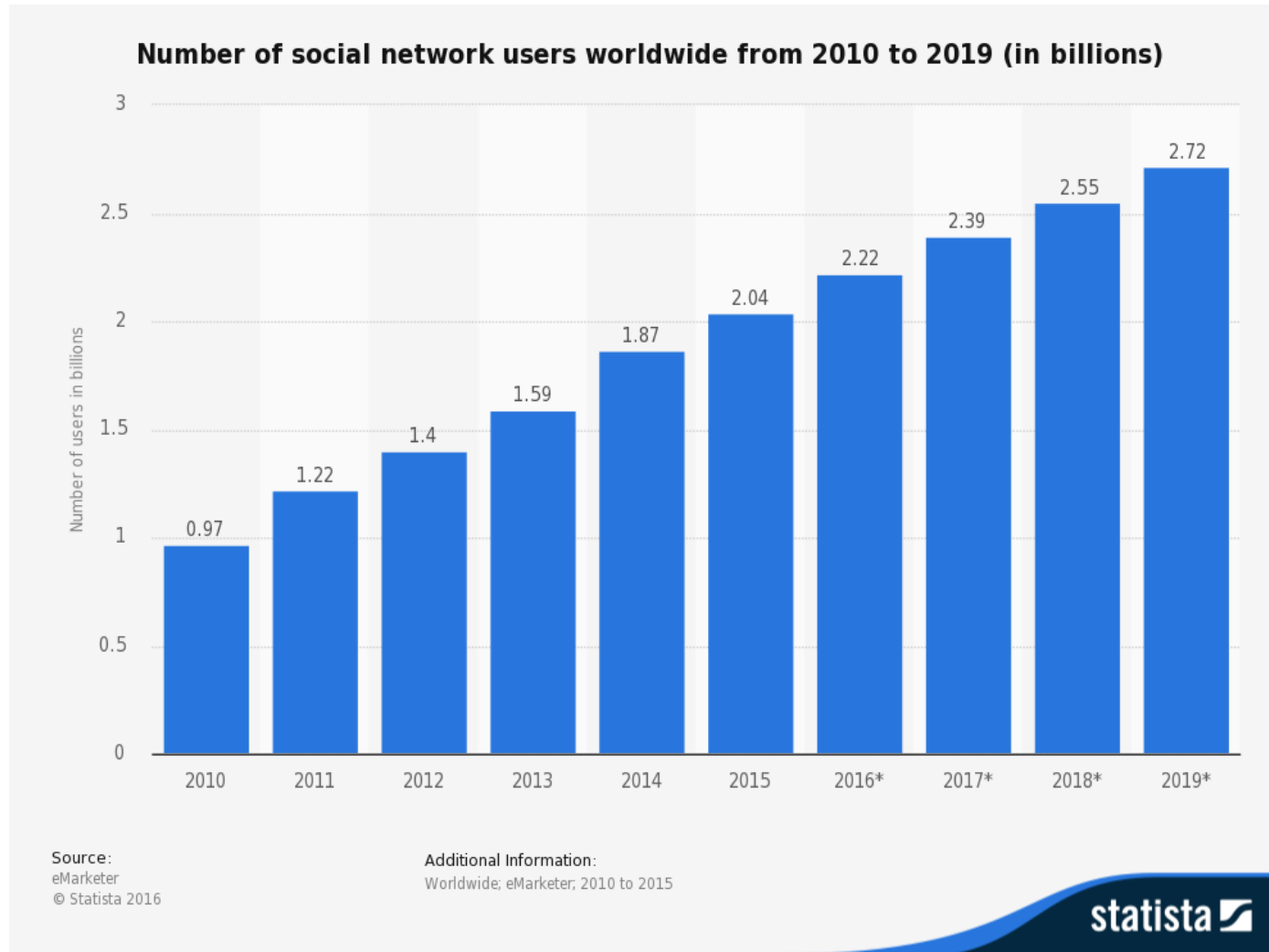
Results: For commonly identified assertions, there was statistically significant discordance between 9 of the 10 selected Wikipedia articles (coronary artery disease, lung cancer, major depressive disorder, osteoarthritis, chronic obstructive pulmonary disease, hypertension, diabetes mellitus, back pain, and hyperlipidemia) and their corresponding peer-reviewed sources ($P < .05$) and for all assertions made by Wikipedia for these medical conditions ($P < .05$ for all 9).

Conclusion: Most Wikipedia articles representing the 10 most costly medical conditions in the United States contain many errors when checked against standard peer-reviewed sources. Caution should be used when using Wikipedia to answer questions regarding patient care.



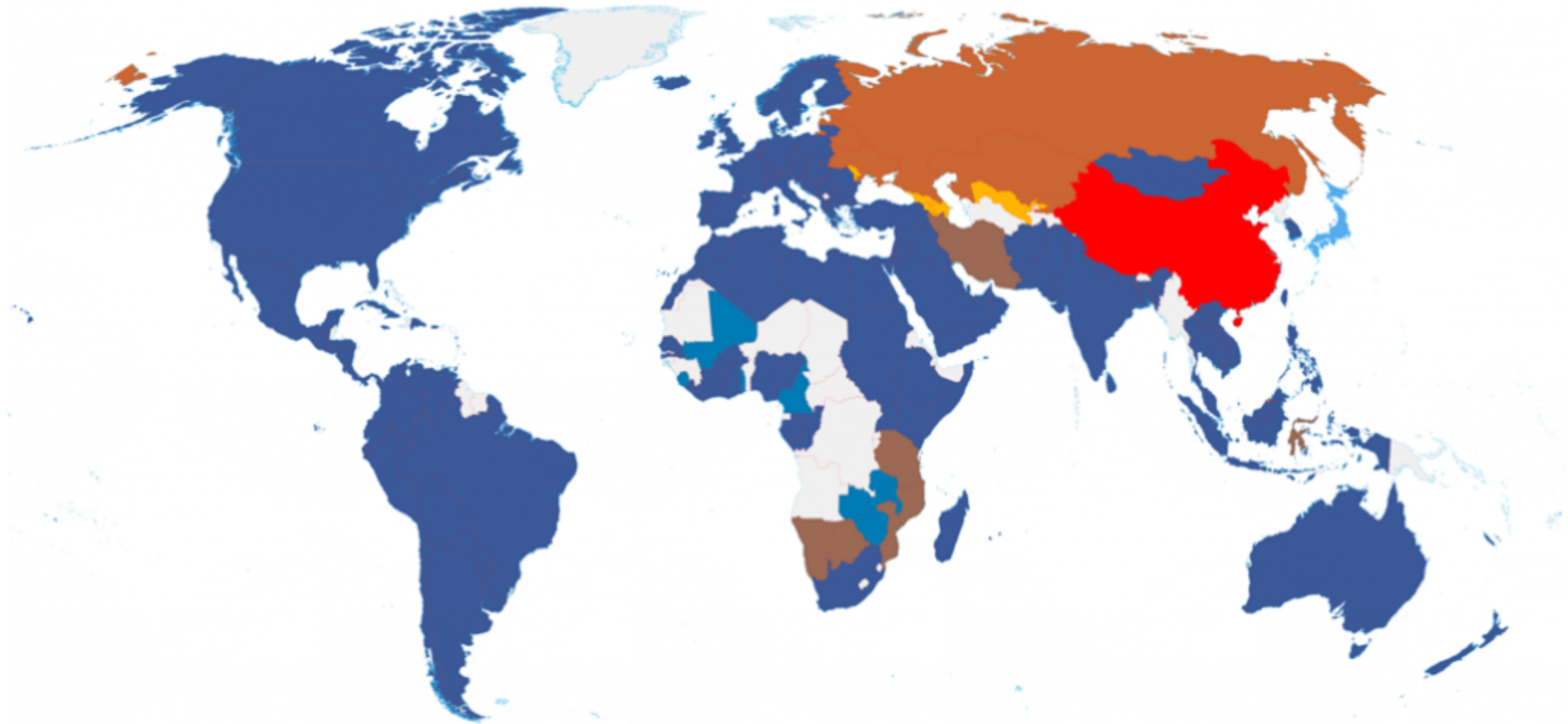


User Projection social network 2010-2019



WORLD MAP OF SOCIAL NETWORKS

January 2017



Facebook

QZone

V Kontakte

Odnoklassniki

Twitter

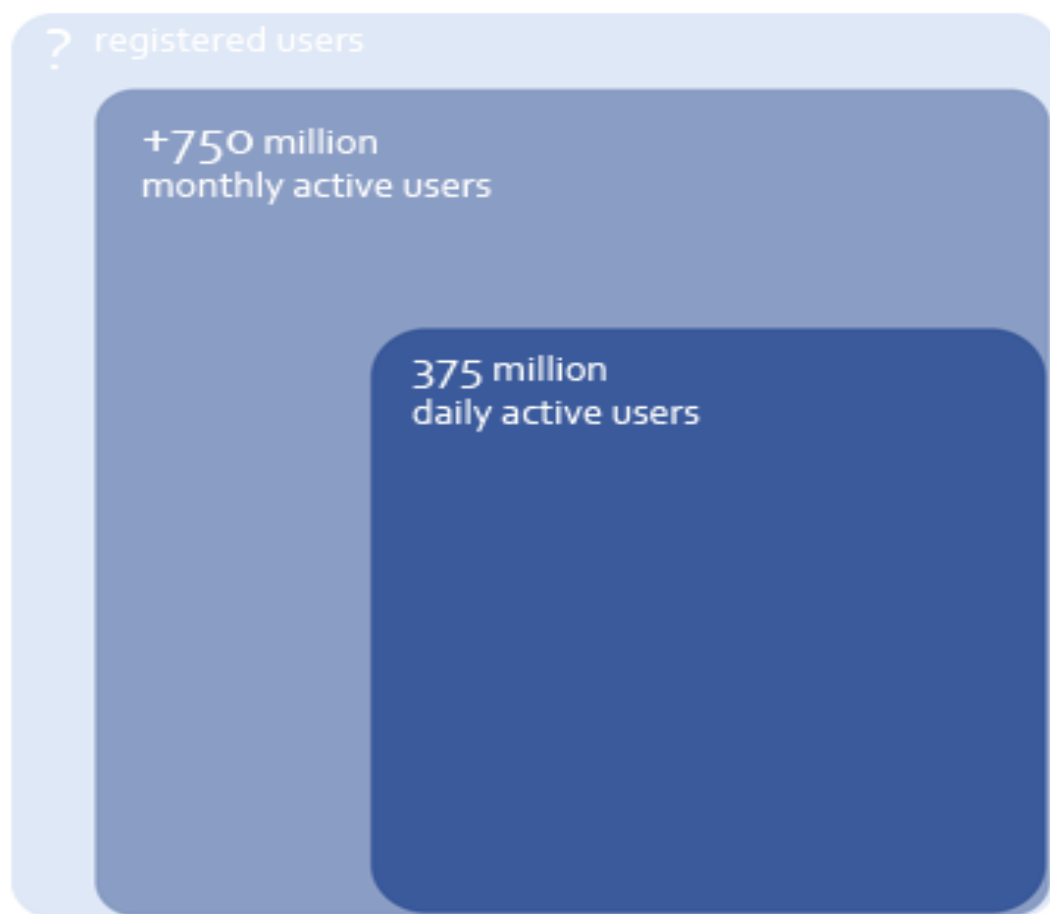
LinkedIn

Instagram

Facebook/Twitter Minimal Stats

vincos.it

facebook



twitter



Source: [facebook.com/press/](https://www.facebook.com/press/) / blog.twitter.com

licence: CC-BY-NC



FAKE

NEWS

Verification is based on a mixture of three factors:

1. The ingenuity and perseverance of the individual, skepticism and professional skills.
2. The familiarity with the sources, with their reliability and honesty, and the quantity, variety, and authority of each source you can find and convince to speak.
3. The documentation

.....Do you think the photo has been digitally altered?

Not All Pictures Are Real

(....Why not?)

- Modified to **influence opinions**
- Enhanced to convey a point
- Designed to show techniques

.....Many people can't tell when photos are fake. Can you?

SOME SUGGESTIONS.....





[Upload](#)
[Tutorials](#)
[History](#)

Submit a JPEG or PNG for Forensic Analysis

Image URL:

or

Upload File:

 nessuno selezionato



This free research service is **public**. For privacy and more, try [Lab](#).
See the [FAQ](#) for [submission guidelines](#). See the [tutorials](#) for analysis instructions.

Unique images: 2,101,325
Banned users: 12,585
Statistics last updated 11 minutes ago


Copyright 2012-2017 Hacker Factor, All Rights Reserved.

 • [System Status](#) • [Blog](#) • [FAQ](#) • [Contact](#)

Google
Immagini





 Geo Search Tool

Location

e.g. City, Intersection, Address

- Any Time
- Past Hour
- Past 3 Hours
- Past 6 Hours
- Past 9 Hours
- Past 12 Hours
- ✓ Past 24 Hours
- Past Week
- Past 30 days
- Past Year
- Custom Range

Search



Youtube DataViewer

© 2017 Amnesty International USA | 5 Penn Plaza, New York, NY 10001 | 212.807.8400

Dr Cecaro Massimo

<http://www.amnestyusa.org/citizenevidence/>



TOOLS

YOUTUBE DATA VIEWER

🕒 JULY 1, 2014 👤 CHRISTOPH KOETTL

The *YouTube Data Viewer* is a simple **tool to extract hidden data from videos hosted on YouTube**. It allows you to extract the following variables, which are most useful for tracking down original content:

1. Exact Upload Time

Useful to determine original video when confronted with several copies of the same video from the same date; and to determine actual upload date in same cases (can be different from public timestamp).

2. All Thumbnails

Useful to find older versions of the same video, by conducting a [reverse image search](#)

(Please [contact us](#) if you are interested in further developing this tool with us).



Tracks on FACEBOOK...

STUCK IN FACEBOOK GRAPH?

Welcome to this **experimental** Facebook Graph Search Engine made by [Henk van Ess](#). I'll work on this search engine on a **daily basis**, so check out often to see if there are more options. If you need anything included, just send me a [mail](#) or contact me through [LinkedIn](#), [Facebook](#) or [Twitter](#).

To make this work, you need your language settings on US ENG and you need a Facebook ID of the person. How?

1. Log in to Facebook first
2. Change your LANGUAGE in Facebook into US English!
3. Type in the name of the person in Facebook and look at the URL.
4. Now just copy the name of the user. Example: www.facebook.com/**henkvaness**
5. Put that username (example: **henkvaness**) in the field below and click **Get FB ID**

Thanks goes to Aneesh T (ID check) and [Jules Ernst](#) (posting search)

USERNAME

PERSONAL SEARCH

Posts that the person commented on?

Which photos does this person like?

Photos made of this person

In which photos is this person tagged?

What photos did the person comment on? With what comment?

What photos did the friends upload?

NEW: SEARCH POSTINGS

<http://graph.tips/>



ALWAYS give priority to the **official pages** of recognized and trustworthy organizations.

Statements that do not refer to reliable sources should always be taken with the benefit of the doubt or should be verified as soon as possible.



BLOG



Forums and blogs serve as the backdrop for the virtual debate, in which personal experiences are told

Attention!

they are **particularly insidious sources** because they arouse empathy but are not said to have scientific reliability (indeed, they are often lacking in elements that should not be overlooked...)



Always **check the dates:**

The timing of the dissemination of information is crucial for its effectiveness: it is a good idea to check the date of publication (should always be present) of the content we are consulting.

Information on treatment or alerts, which was correct at the time of publication a few years ago, may no longer be relevant.



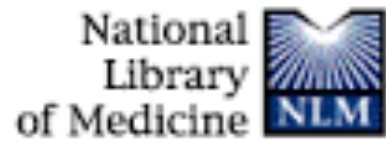
We're not just looking for confirmations:

Attention to the functioning of search engines and... of our mind! If we search for certain words we will be returned pages that contain them, orienting the results and influencing us.

Not to be underestimated the working mechanism of search engines and social networks: the web offers us, in the first place, information that follows our previous research.



Always **improve discussions** and dialogue with colleagues or specialists who can help us to focus (better) on issues that we do not deal with on a daily basis



PERIODICALLY CONSULT SPECIALIST
PUBLICATIONS,

CONSIDERING
ALSO PUBMED AND/OR OPEN
ACCESS JOURNAL

Primary sources

Examples:

- diaries, correspondence,
- original documents e.g. certificates of analysis,
- biographies, autobiographies, manuscripts
- interviews, speeches,
- case law, legislation, regulations, constitutions
- government documents, statistical data, research reports

Secondary sources

Secondary sources offer an analysis, interpretation or a restatement of primary sources and are considered to be persuasive.

They often attempt to describe or explain primary sources.

Examples:

- journal articles
- textbooks
- dictionaries and encyclopaedias
- books that interpret,
- Scientific commentary
- dissertations
- newspaper editorial/opinion pieces

The 10 evaluation Criteria for evaluating evidence on public health interventions

1. **Quantify the benefits** (of a treatment, an examination, a product, a procedure)
2. **Quantify the risks** ($R=F \times M$) of the intervention under consideration
3. Properly assess the **quality of the tests**
4. Seek additional **independent sources** and assess the existence of conflicts of interest
5. **Doubts** about news that **only** comes out of a **press release**
6. Establish the **real novelty** of the news
7. **Compare** the new treatment with treatments already available
8. **Clarify the availability** of treatment/examination/product/procedure
9. Provide an appropriate estimate of the **cost of intervention**
10. Assess the **potential of disease mongering**