*Welcome to the **GODAN** Learning Lab for ANH Academy!*
Kathmandu, Nepal

Open Data for Research in Agriculture and Nutrition

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Today's goals

1. Understanding *basic open data principles*

2. Understanding *why* open data is important for research in agriculture and nutrition

3. Creating a *open data management plan* with your peers

Open Data: *Driving affordability across the globe*

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About ![GODAN logo] Global Open Data for Agriculture & Nutrition

The **GODAN** initiative is made up of a Secretariat think tank and voluntary Partner Network (over **550 partners**) who have agreed to a joint Statement of Purpose…

To advocate, support and enable global efforts to make agriculture & nutrition data
Available
Accessible
Usable
for unrestricted use worldwide.

550+ partners

Universities generate A LOT of research data.

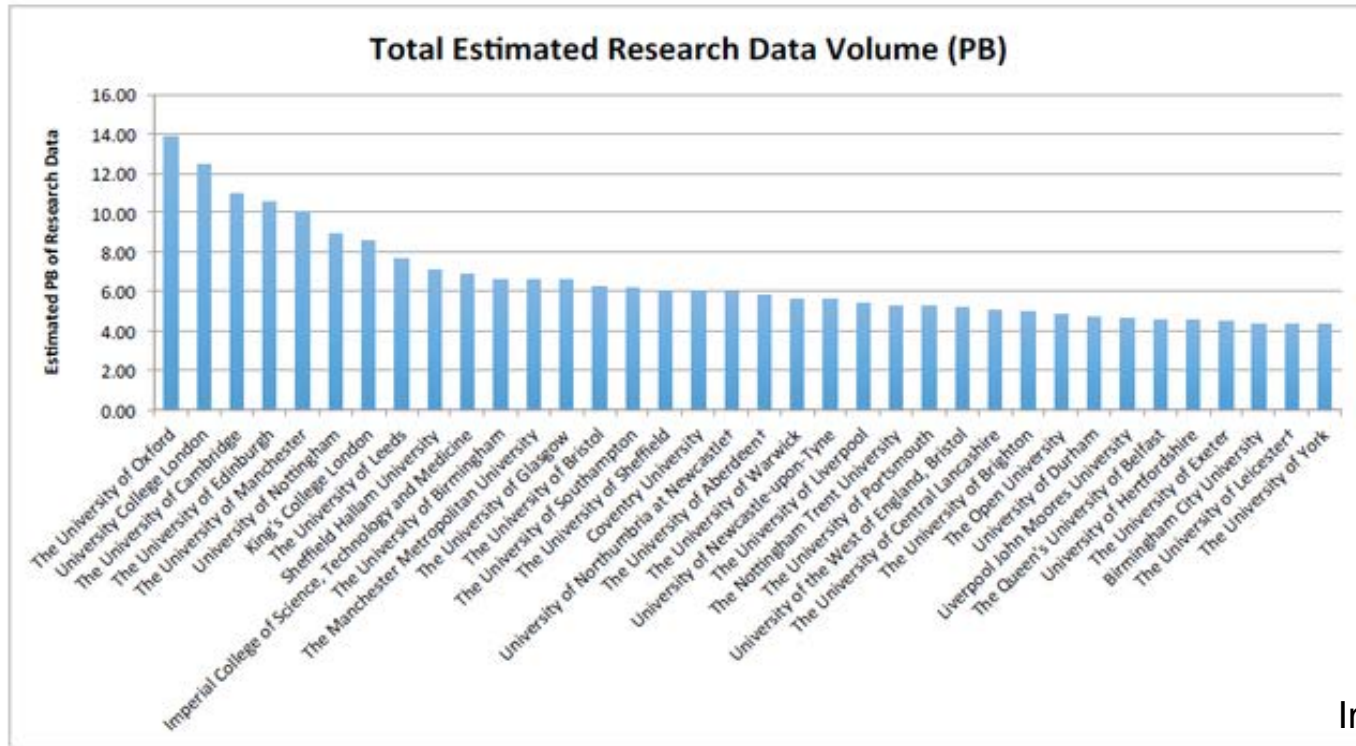Total Estimated Research Data Volume (PB)

Image: Arkivum

What's the problem?

Raise your hand if you identify with any of these.

I can't find the data I am looking for!

I can find data and information I am looking for but it is in a PDF publication and I cannot get at the raw data!

I know where the data are but the owner of refuses to share!

I can find the data but it is behind a paywall and too expensive to buy!

I am looking for a collaborator but I have no idea who is doing what!

It's going to take forever for me to read all of these publications to figure out all the data available for my research topic!

Open Data can help!

What is open data?

A few definitions…

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The **FAIR** Principle

Open data is…..

Findable

Accessible (Machine Readable)

Interoperable

Reusable

https://www.force11.org/fairprinciples

5 Star Open Data

http://5stardata.info/en/
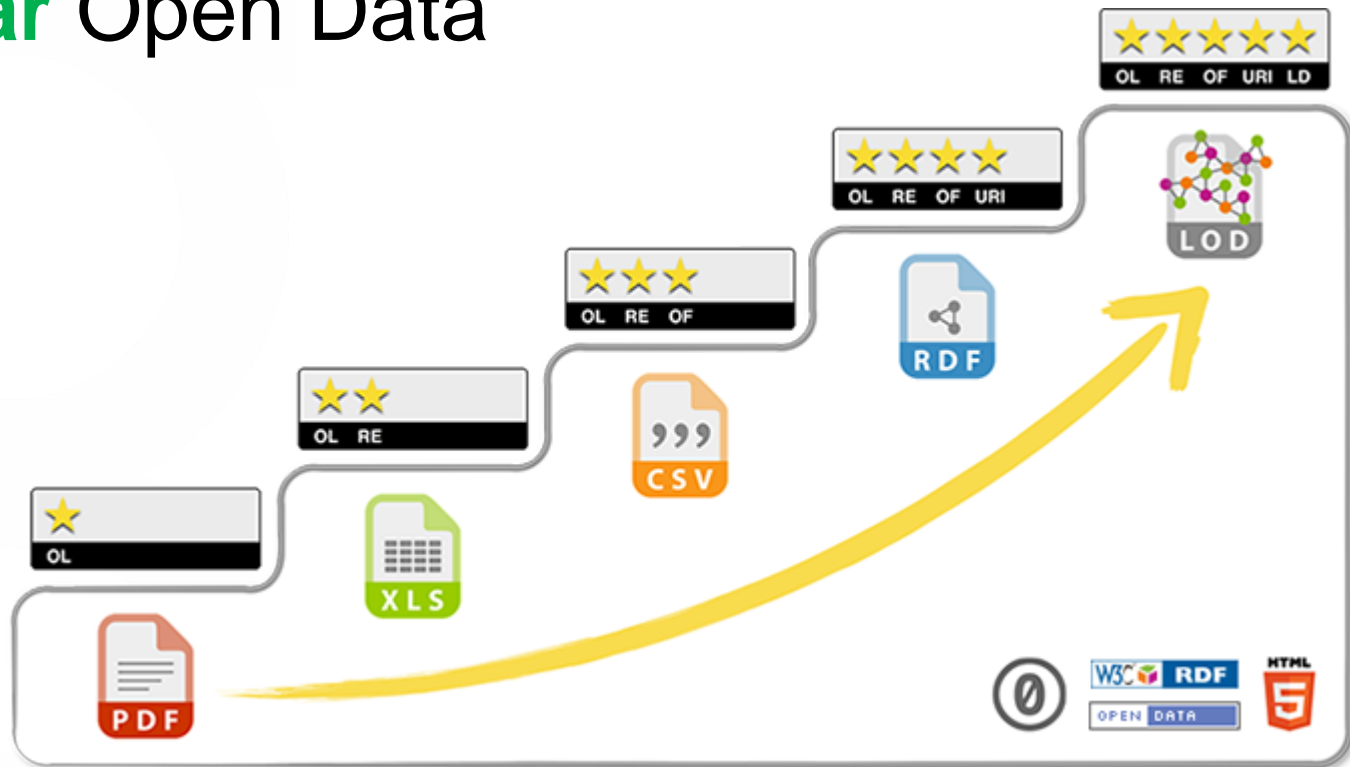
ODI Open Data Certificates

Badge levels

Each badge identifies a level of achievement in open data publication.

BRONZE: data is openly licensed, available with no restrictions, accessible and legally reusable.

SILVER: satisfies the Bronze requirements, the data is documented in a machine readable format, reliable and offers ongoing support from the publisher via a dedicated communication channel.

GOLD: satisfies the Silver requirements, is published in an open standard machine readable format, has guaranteed regular updates, offers greater support, documentation, and includes a machine readable rights statement.

PLATINUM: satisfies the Gold requirements, has machine readable provenance documentation, uses unique identifiers in the data, the publisher has a communications team offering support. This is an exceptional example of an information infrastructure.

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What about open access?

"Open Access is the free, online availability of research articles coupled with the rights to use these articles fully in the digital environment."

Open access is usually the lowest "tier" of open data.

Source: SPARC (the Scholarly Publishing and Academic Resources Coalition)

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Open where possible, closed if necessary (Big Data Europe)

Privacy
- Personally identifiable information, especially for indigenous communities
- Farm data
- Personal health data
- Data that could potentially put livelihoods at risk, especially those of vulnerable or indigenous communities

Ownership (food for thought)
- Data needs to be licensed (under Creative Commons/)
- Can data be both open and owned?
- For more information: see GODAN's work on data ownership

Questions????

Why is open data important for **agriculture & nutrition**?

800 million people struggle with debilitating malnutrition.
Nutritionally-sensitive agriculture is essential for global human health.

The data exists to make important decisions on the following issues, and the data must be opened to be as effective as possible.

- Sustainable agriculture
- Efficient pest management
- Efficient fertilizer use
- Avoiding prices crises
- Informing consumers on food contamination
- Increasing knowledge on nutrition

Many donors already have open access policies…

But there is more that you can do as a researcher…

Create an open data management plan!

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Principles of an Open Data Management Plan

Data Formats

Storage and Preservation

Sharing and Privacy

Roles and Responsibilities

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Someone at the table describes their research project.

The team will then come up with a data management plan that suits the research project.

In small groups discuss your data management plan using the open data principles at your table.

If you struggle, discuss your challenges.

Nominate a facilitator to report back.

Reporting back…

GODAN is currently reviewing open data policies with both donors and universities to harmonize their open data policies, and make life easier for researchers to use and release open data.

Results will be released in mid-October.

More information about research data

Join the Research Data Alliance – Interest Group on Agricultural Data
https://www.rd-alliance.org/groups/agriculture-data-interest-group-igad.html

GODAN Gateway https://f1000research.com/gateways/godan

CGIAR OD / OA Support Pack https://sites.google.com/a/cgxchange.org/oad-support-pack/

AIMS http://aims.fao.org/

Figshare https://figshare.com/

HIGHLY recommend you sign up for ORCID https://orcid.org/

Altmetric.com https://www.altmetric.com/

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