

https://julieta.aranc.io

About Me

I am a postdoctoral researcher in science and technology studies, a mentor, curriculum designer and open science advocate.

I enjoy working in open, collaborative and interdisciplinary teams with a clear vision of change. You will usually find me in projects at the crossroads of technology, science, education and sustainability.



About my work

Research

I conduct qualitative, multiple and single case study research, which I often complement with quantitative data analysis. This includes experience in grant writing, research design, data collection (participant observation, interviews, workshops and policy sessions), data analysis using CAQDAS, writing and editing peer-reviewed articles, policy briefs and pieces for the general public.

Education

I contribute to programmes in the intersection of innovation, technology and society. I am one of the curriculum designers of the community-based programme Open Hardware Makers; I co-created educational games, delivered training sessions on open science tools, and worked as a mentor for Masters' projects towards the Sustainable Development Goals.

Advocacy

I co-founded reGOSH, a network in Latin America for promoting open science hardware; I run a global mentorship programme for open hardware practitioners; and I created and facilitate monthly meetings of an online research community. I've been an invited speaker at academic conferences and community gatherings, I presented at policy events, and was consulted for the regional UNESCO recommendation on open science. I wrote policy briefs based on community discussions and have collaborated with think tanks like the Woodrow Wilson Center as a lead author.

Education

PhD in Science and Technology **Studies** Universidad Nacional de Quilmes CONICET 2016-2021

My thesis (Outstanding 10, recommended for publication) is titled Technologies from dialogues: Open science hardware and science democratisation in the "periphery". It is available in Spanish at the UNQ online repository or in an easier to read version on my PhD website; you can also watch a short presentation about it during my defence, on YouTube.

Lic. in Environmental Sciences Universidad de Buenos Aires 2006-2011

assessment of sediments of the Reconquista River (Buenos Aires), with emphasis in heavy metals and is available in Spanish at the FAUBA online repository.

Five-year Env. Sci. degree at the Agronomy College of University of Buenos Aires. My thesis was titled Quality

Research experience

https://drexel.edu/coas/faculty-research/faculty-

Drexel University Postdoctoral researcher 2021 - 2023

Flexure Microscope at University of Bath (UK) and the Ifakara Health Institute (Tanzania).

Postdoctoral researcher funded by the Alfred P. Sloan Foundation to conduct a case study of the Open

CENIT-UNSAM Associate researcher 2015 - Present fund-cenit.org.ar

directory/postdocs/arancio-julieta/

2021) funded by the National Scientific and Technical Research Council (CONICET). Previously, I was a collaborator in 'Open, Collaborative and Alternative Science: overcoming health, inclusion and environmental challenges in Argentina' (2015-2016) funded by the International Development Research Centre, Canada (IDRC-OCSDnet).

I'm currently part of CENIT-UNSAM as an associate researcher, after working as a doctoral researcher (2016-

Woodrow Wilson International

Other work experience

Center for Scholars Lead author March 2021 - Present

Lead researcher and writer of a white paper on low cost and open source hardware for scientific research.

Global Open Science Hardware, Inc. Writer Feb 2021 - Present

wilsoncenter.org

2020 - Present

appropedia.org

projects

Writer of two policy briefs and four policy memos on open science hardware, targeted at various audiences.

openhardware.science/policy-briefs

Appropedia Foundation Consultant

Foundation in partnership with Intuitive Foundation, MIT Solve, and Nesta Challenges.

Design and implementation of an open ontology for supporting remote and effective knowledge transfer of

surgical skills at a low cost. Part of the "Global Surgical Training Challenge" organised by Appropedia

Designer and instructor of Wikidata workshops for undergrad students at the École polytechnique fédérale de

Wikidata instructor 2019 wikimedia.ch

Wikimedia Switzerland

Lausanne (EPFL), Switzerland.

Mentor of Master students' projects addressing the Sustainable Development Goals, with a focus on

challenge-based learning, community building and management of open source projects.

Geneva-Tsinghua Initiative, University of Geneva Mentor for Sustainable Development Goals'

July - September 2018 gt-initiative.org Community organising

openhardware.space

Open Hardware Makers

Co-founder (2019) of a global mentorship programme for open hardware projects. General strategy, project management, curriculum design and communications. I led a community consultation process for improving our curriculum with the global open hardware community.

community oh-research-group.github.io

Open Hardware research

socioeconomic aspects of open hardware practice.

Co-founder (2017) of the network, ex-coordinator of Buenos Aires node, in charge of the strategy working group. I co-organised a regional residency in 2019, having previously co-organised a Global Open Science

Founder (2022) and organiser of an open, collaborative community of researchers studying the

reGOSH regosh.libres.cc

Hardware (GOSH) event in Shenzhen, China, in 2018. Writing and public speaking

Academic writing

Hardware Movement. International Journal of Engineering, Social Justice, and Peace, 8(2), 1–27. https://doi.org/10.24908/ijesjp.v8i2.13997 • Arancio, J. 'Open science hardware: towards more democratic science and technology in Latin America?' Proceedings of 15th International Symposium on Open Collaboration, University of Skövde,

• Arancio, J. C. (2021). Opening Up The Tools For Doing Science: The Case Of The Global Open Science

- 2019. • Arancio, J.; Sebastian, S.; Schwertz-Weirich, A.; Actis, G.; Cremaschi, A.; Arancibia, F.; Van Zwanenberg, P.; Fressoli, M. 'Relato de experiencia, Workshop internacional de desarrollo abierto y colaborativo' in
- Liinc Em Revista, 2018 https://doi.org/10.18617/liinc.v14i1.4132 Arancio, Julieta. (2021). Open Hardware: A key for accelerating science and technology towards the

General public

Policy briefs

• Arancio, Julieta, & Molloy, Jenny. (2021). Open Hardware is ready to help Technology Transfer Offices (TTOs) maximise the impact of academic research. Zenodo. https://doi.org/10.5281/zenodo.5094999 • Arancio, Julieta & collaborators. (2021) Open Science Hardware, Research Funding Salons.

U.N. Sustainable Development Goals (SDGs). Zenodo. https://doi.org/10.5281/zenodo.5415527

- https://openhardware.science/2021-research-funding-salons/ Arancio, Julieta and Dosemagen, Shannon. (2022) 'Bringing Open Source to the Global Lab Bench.'
- Issues in Science and Technology 38, no. 2: 18-20. Available at: https://issues.org/open-sourcescience-hardware-gosh-arancio-dosemagen/ • Arancio, Julieta. (2022). 'Diversifying technology transfer tools to increase the impact of academic

University

Available

Bath.

• Arancio, Julieta. (2020) 'Open Science Hardware contributes to aligning the research agenda with needs', in Journal of Open Hardware Blog. https://journalopenhw.medium.com/open-science-hardware-contributes-to-aligning-the-researchagenda-with-societal-needs-dba991239f5e

https://blogs.bath.ac.uk/iprblog/2021/12/10/diversifying-technology-transfer-tools-to-increase-the-

Public speaking & presentations

• EASST Conference (2022, Madrid) - Presenting author Fundación AVINA (2022, online) - Invited speaker • STS Switzerland 2021 Conference (15-17 February 2021, online) - Presenting author 4S/EASST Conference (18-20 August 2020, online) - Presenting author

 Society for Social Studies of Science Meeting 4S/ESOCITE (2022, Cholula) - Panel organiser Regional Open Science Hardware Latin America (reGOSH 2022, Argentina) - Invited speaker

 Doctoral Consortium - OpenSym (2019, Sweden) - Presenting author • Global Open Science Hardware gathering (2018, China) - Co-organiser & facilitator

Blog,

research'.

impact-of-academic-research/.

- Mozilla Festival (2018, London) Presenting author • OpenCon Swiss (2018, Bern) - Invited speaker UNESCO Tech4Dev (2018, Lausanne) - Presenting author
- Funding received Alfred P. Sloan Foundation Postdoctoral funding (USD 220,000) for two years at Drexel University, under supervision of Asoc. Prof. Gwen

Ottinger (Drexel University).

Postdoctoral research funding 2021-2023

Mozilla Foundation Science grant 2020

Shuttleworth Foundation

Personal grant (USD 12,000) supporting academic writing and community building

Flash grant 2020

PhD scholarship

National Science and Research Full support for pursuing my PhD at CENIT-UNSAM Council of Argentina (CONICET)

2016-2021 Professional associations

leadership, events organising, fundraising.

microBIT. I can also do basic audio and video editing.

South-West of England.

Personal grant (USD 5,000) to advance project LogAir

British Sociological Association Member

Association for Studies in

britsoc.co.uk

(AsSIST-UK)

Member

assistuk.org

social sciences, humanities and sciences in the field of science, innovation and technology.

Member of the UK Sociology Association since 2022, involved in the Early Career Researchers Network in the

Member of AsSIST-UK since 2022, an association supporting transdisciplinary collaboration across the

European Association for the Study of Science and Technology

Innovation Science and Technology

Member easst.net Member of EASST since 2020, an organisation representing academics and researchers in science, technology and innovation studies.

Journal of Open Hardware Member of the editorial board openhardware.metajnl.com

Member of the Editorial Board of the Journal of Open Hardware (JOH) since 2020, a peer reviewed open

access publication for open hardware research and development.

Soft skills

Other skills

Project management (PMI-certified expected June 2022), community organising, open and collaborative

Technical skills

I often work with version control software and platforms (git/GitHub/GitLab), basic web development (HTML, CSS, some JS and frameworks like Jekyll), Python and R scripts for data analysis in Jupyter notebooks/RStudio, ontology design in Protegé, and more broadly, all-things-Wikidata. I'm familiar with

digital fabrication tools (laser cutting, 3D-printing) and educational boards/platforms like Arduino, ESP32 or

Languages

I speak Spanish (native), English (bilingual), French (A2) and I understand Portuguese.

When I'm not working