The platform belongs to those who work on it!

Co-designing worker-centric task distribution models

David Rozas[1], Jorge Saldivar[1] & Eve Zelickson[2]

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P2P MODELS

[1]GRASIA research group, Knowledge Technology Institute, Complutense University of Madrid, Madrid, Spain.
[2] Data and Society, United States of America.

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OUTLINE

1. Introduction and related works
2. Case study: Amara On Demand
3. Methods
4. Findings
5. Contributions, limitations and future work

Towards worker-centric task distribution

- **Increasing relevance** of platforms to mediate day-to-day work
- Crowdsourcing platforms (e.g Amazon Mechanical Turk) **"taskify" work**: curate data, translate, tagging images, etc.
- Allocation is typically **First-Come, First-Served** (FCFS)
- FCFS has been argued (Kamel et al., 2020) to be efficient, but creates **competitive dynamic** between workers
- Alternatives (e.g. Ho & Vaughan, 2012; Difallah et al., 2013; Karger et al., 2014; Yin et al., 2017) lack **approaches** that try to improve the conditions of the **workers**

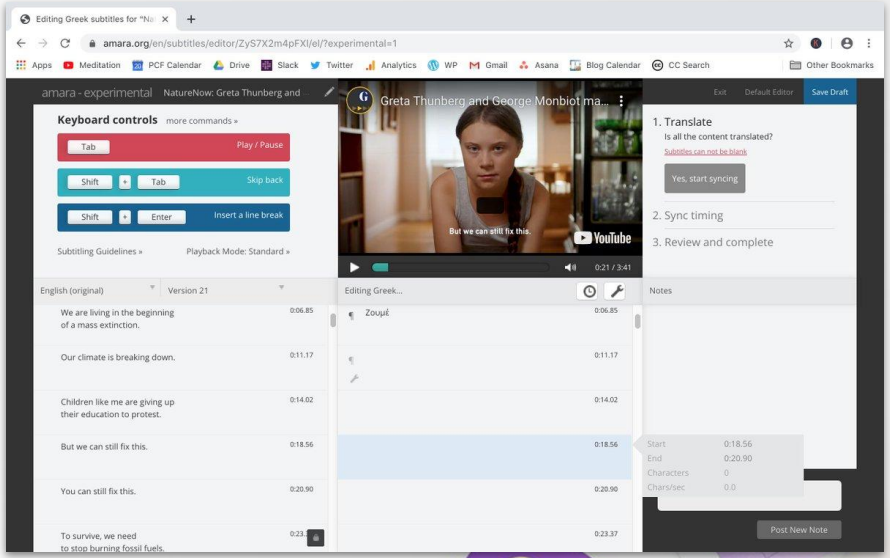
Research Question

> Can we identify alternative models for the distribution of tasks in crowdsourcing that consider the needs of the workers?

2. Case Study

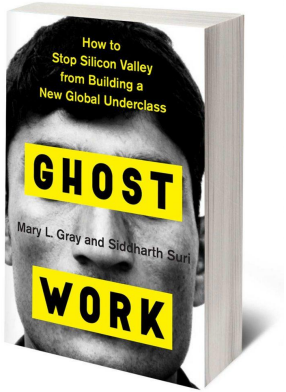
amara

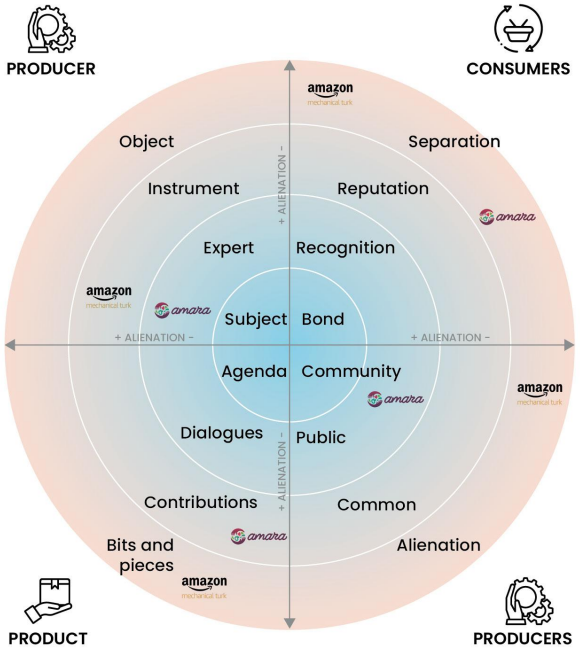
- Amara is a **crowdsourcing** platform for collaborative creation of **subtitles**.
- From volunteer (TED, Khan Academy) to **paid labour**: on demand
- Starting in 2015, non-profit, currently approximately **900 linguists** (significant growth)
- Organised by **language-direction**



Why Amara On Demand?

- Less **degree of alienation** (Hansson et al, 2017; 2019) than other crowdsourcing cases
- Inspired by **cooperative and commoning practices**, in contrast to Amazon Mechanical Turk (Gray & Suri, 2019)
- **Suitable space to co-build alternative models** of task allocation together with workers





Graphic representation of Hansson et al.'s (2019) typology of alienation, according to Marx's four types of relationship.

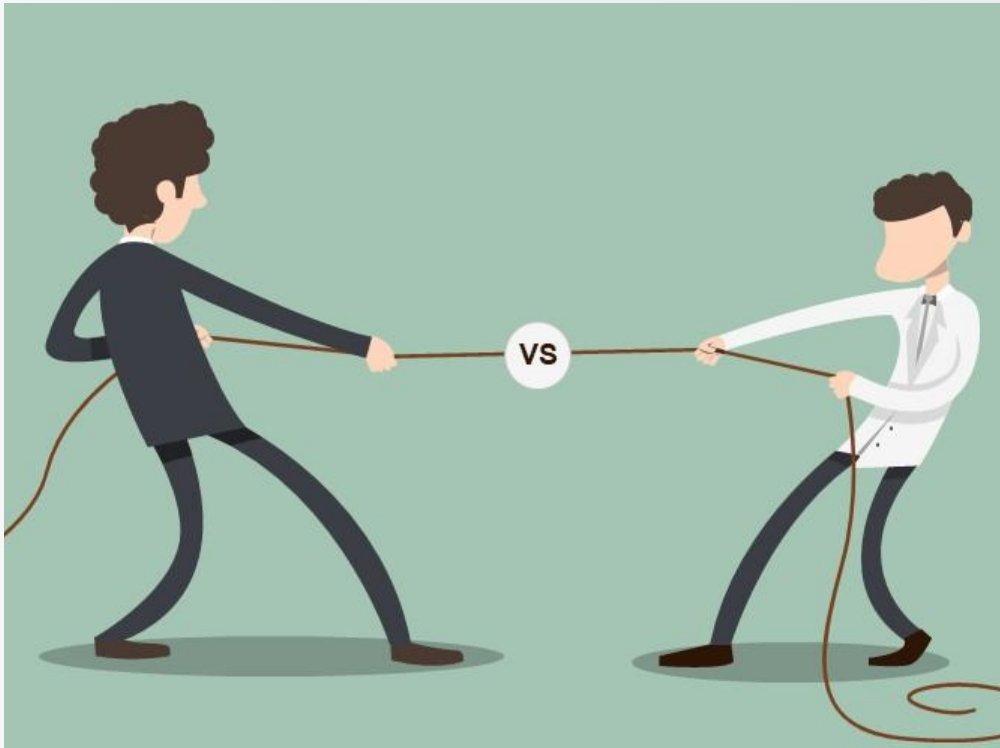
Multi-modal qualitative approach

- Phase 1: focus on understanding the **platform as a worker**
- Phase 2: focus on understanding the **workflow** and day-to-day from **all the perspectives**
- Focus group to identify initial models: **PT-BR (organisational complexity)**

Method	Phase 1	Phase 2
Participant observation	Field notes created during offline and online participant observation from October 2018 to March 2019	Field notes created during offline and online participant observation from March 2019 to July 2020
Semi-structured interviews	15 semi-structured interviews with linguists from several language groups: Traditional Chinese, Arabic, Greek, Swedish, Portuguese-Brazil, etc	9 semi-structured interviews with members of the community with a wide range of roles: project managers, developers, co-founders, etc.
Documentary analysis	33 internal and public documents	22 blog posts, mainly from blog.amara.org
Focus groups	N/A	Two-day workshop with several focus group sessions with six linguists of the Portuguese-Brazilian team

Competitiveness embedded in FCFS

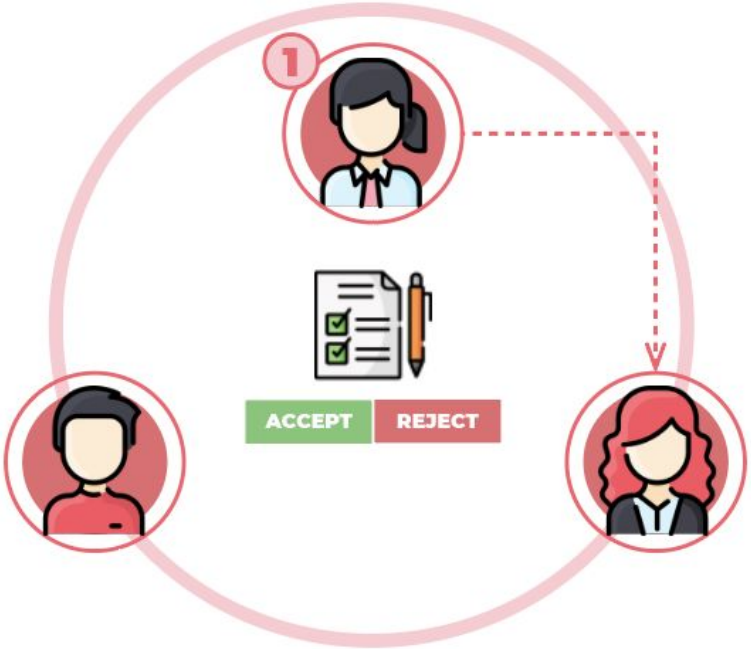
> *I learnt how to be fast and not sleep with my computer, but [to] wake up with my computer right next to me. […] If you really want to get this work, you need to be next to your computer for hours. (P04)*



Source: SlideBazaar

Alternative models: Round-Robin

> *I really liked P26's idea of the pre-assignment of tasks because this takes away the competitiveness aspect of task allocation. [...] So that we could, um, reach a fair amount of work for everyone."* *(P28)*



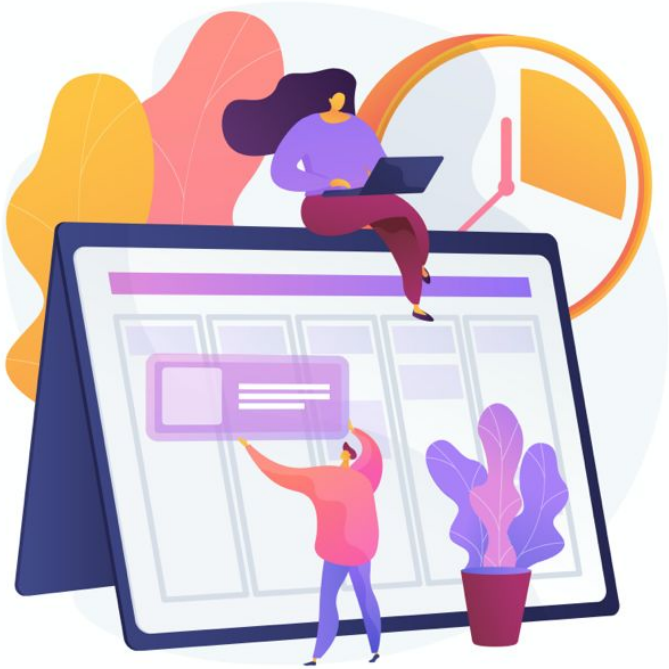
Alternative models: Reputation-based

> *"[...] building a tier system based on the [amount of] minutes of videos that translators have worked on. So, um, that could be, for example, three tiers: novice, intermediate, and veteran." (P28)*

Alternative models: Content-based

> *[...] if people work based on their backgrounds, they're much more used to [the] terminology and that, in the end, increases the quality[...]'' (P26)*

> *[...] not working only on what we are already specialised in, but having the chance to learn something new.”(P27)*



Contributions

- Identification of alternative models (ideal types) that help envision worker-centric platforms
- Similar platforms owned by workers in which value and rules are defined by them

Limitations

- Qualitative approach -> we cannot generalise
- Context matters (within AOD and in other cases)

Future work

- Quantitative approach to have a “picture” of the platform
- Focus groups with other language groups (e.g. Japanese)

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Thanks 😊

P2P MODELS

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