Challenges to Collaboration in Knowledge Intensive Work

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Agenda

- Future of work and collaboration
- A focus on knowledge workers
- Challenges
  - Virtual and globally distributed teams
  - Multiple team membership and team fluidity
  - Co-creation in open innovation communities
  - Gigwork, platforms, and algorithmic work
- Final remarks
Future of Work...
Future of Work and Collaboration
Future of Work and Collaboration

- Emerging **technologies** supporting collaboration
- **Flexible** work arrangements and new interactions
- The **physical space** for collaboration
- “Blurring” **boundaries** between organizations, units, teams
- **Globalization**
“Traditional” collaboration in teams
Virtual and Global Teams

Multiple Team Memberships

Co-creation in open innovation communities

Gigwork, platforms, and algorithmic work
A Focus on Knowledge Workers

- Knowledge workers **apply** theoretical and analytical **knowledge**, acquired through formal **training**, to develop products and deliver services.
- Examples: engineers, programmers, designers, system analysts, technical writers, accountants, architects, lawyers, physicians, scientists and more.
Virtual and Global Teams
Two Common Challenges in Virtual and Global Teams

- Creating (and maintaining) relationships
- Being on the same page
Relationships

The US client manager called up and said he wouldn’t speak to anybody other than the Director. He said “These [offshore developers] are a bunch of guys who don’t know what they are doing and they’re screwing up every day, and so I am going to talk only to the Director.” (Offshore project manager)

Offshore, we feel that we’ve been made to do all the junk work. (Offshore team leader)
Being on the Same Page

[Flower-Net] is very modular, uses standards [...] There is no need to have a lot of communication between the person who owns [name of component] and the person who owns well ... Whatever.

(Software developer from Boston, USA)

I think we are strongly connected, because if you see it project-wise, there are multiple components and all components are somewhere related with each other.

(Software developer from Pune, India)
Overcoming Challenges in Virtual and Global Teams is a Balancing Act

- **Brokering roles** across geographical subgroups
  - Facilitate codified knowledge sharing and perceptions of proximity (Eisenberg and Mattarelli, 2017; Mattarelli et al., 2022a)
  - ... but reduce shared leadership and tacit knowledge sharing (Mattarelli and Gupta, 2008; Mattarelli et al., 2022a)

- **Shared practices and norms:**
  - Glocalized practices facilitate virtual work acceptance (Mattarelli and Tagliaventi, 2009)
  - Shared norms contribute to a shared identity and common “logics” (Mattarelli, 2011; Annosi et al., 2022)
  - ... but can lead to illusory concordance and innovation failure (Mattarelli et al., 2022b)
Multiple Team Membership and Team Fluidity
Multiple Team Membership (MTM)

- Multiple Team Membership (MTM) – having people assigned to multiple projects simultaneously – increasingly common in organizations
- The majority of knowledge workers experience multiple team membership (more than 95%, according to some studies, e.g. Martin and Bal, 2015)
Pros and Cons for Workers and Teams

- Efficient use of time and brainpower
- Sharing knowledge across groups
- Individual learning
- Promotion opportunities

- Competing priorities,
- Limited team cohesion
- Individual overload and stress
- Work life conflict
MTM and Team Performance

Does IM (Instant Messaging) Use Help?
MTM and Team Context Variety

When team members are part of multiple teams they typically switch between different contexts, e.g. different communication norms, different technologies, different tasks, different “social processes”
Leadership Guidelines for MTM

**Team Leaders**
- Map everyone’s skills
- Manage time across teams
- Create a learning environment

**Organizational Leaders**
- Track multiteaming through IT
- Promote knowledge flows
- Buffer against shocks

see Mortensen and Haas (2017)
Do I know Who is in My Team?
Co-creation in Crowd-Based Open Innovation Communities
Crowd-based Open Innovation

In crowd-based open innovation:
- organizations invite a **diverse network** of external contributions via an online platform
- participants are encouraged to **collaborate** with each other in co-creation processes
- ... but ideas submitted have different levels of refinement and **quality**

(Mattarelli et al., 2018, 2022)
Unpacking Co-creation Processes

Participants “interact, collaborate, vote for their favorite idea, discuss various topics by leaving comments on other participants’ pin boards, and learn from the aggregate knowledge and feedback of others” (Fuller et al., 2011: 262)
Gigwork, Platforms, and Algorithmic Work
Gigworkers in Online Labor Market Platforms: Future of Work?

- **Gigs**: short term projects or tasks for which (knowledge) workers are hired on demand
- **Gigworkers**: freelancers hired via online labor platform intermediaries
- **Platform algorithms**: match clients and gigworkers, control workers’ behaviors, and establish performance
Some Data

Upwork Study (2021):
- Freelancers contributed $1.3 trillion to the U.S. economy in annual earnings
- The share of workers who are non-temporary freelancers rose from 33.8% to 35.0% from 2020 to 2021.
- Skilled “remote” freelancing (gigworkers) grew in 2021
- Flexibility and freedom are key motivators for new and existing freelancers

... Opportunity or exploitation? In control or being controlled?
Collaborating in Online Labor Market Platforms?

Preliminary evidence on:

• Gigworkers developing **entrepreneurial identities** and managing teams (Bellesia et al., 2019)

• Gigworkers establishing **long-term collaborations**, working together (Idowu and Elbanna, 2021)

• New forms of temporary teams: **flash teams** (Valentine et al., 2017)
Final Remarks
Summary of Challenges to Collaboration in Knowledge Intensive Work

• Creating and maintaining relationships
• Being on the same page
• Creating roles, norms, and practices that support teamwork, but do not harm creativity/innovation
• Managing time across multiple teams
• Navigating different contexts
• Co-creating across boundaries
• Exchanging feedback across fluid boundaries
• Collaborating while dealing with algorithmic control
paradox

1. A self-contradictory and false proposition.
2. Any person, thing, or situation exhibiting an apparently contradictory nature.
The Future of Collaboration is about Paradox

- How to optimize individual experiences and collective performance?
- How to balance autonomy and control?
- How to establish support and confrontation?
- How to use technology to keep employees connected and to seamlessly help them so that it does not dominate their time?
Thank You!
Questions?
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