



The role of technology in global virtual teamwork

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Communication technology in global virtual teams

- Global virtual teams are nationally, linguistically, and culturally diverse work groups, which coordinate their dispersed activities through information and communication technologies (Zander, Zettinig, & Mäkelä, 2013).
- These technologies enable the collaboration of diverse teams.
- Conversely, diversity influences how team members use the available technologies.



Media choice theories neglecting team diversity

- Media synchronicity theory (Dennis, Fuller & Valacich, 2008), media richness theory (Daft & Lengel, 1984) and media naturalness theory (Kock, 2011) gauge the suitability of various communication media / technologies for specific purposes.
- These theories do not consider how diversity between team members might influence technology use.

A reversal of media synchronicity theory in multilingual GVTs

Communication media capability	Suitability for convergence processes	
	in <i>monolingual</i> virtual teams	in <i>multilingual</i> virtual teams
Rehearsability	X	✓
Reprocessability	X	✓
Transmission velocity	✓	X
Natural symbol sets	✓	X

Tenzer & Pudelko, 2016

➔ Language-based cognitive load reverses the propositions of MST.



Future research avenues

- Study the impact of national, cultural, gender, age and other diversity dimensions on media choice.
- Contextualize other media choice theories to GVTs characterized by diversity.
- Measure virtual collaborators' cognitive load through functional MRT to identify the least cognitively taxing communication media.
- Focus on the latest developments in virtual communication technology such as social media, mobile apps, Second Life or other 3D virtual environments.



References

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Thank you.

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