



Making Work Worth Doing

STS RT
SOCIOTECHNICAL SYSTEMS ROUNDTABLE INC.

"Designing a Sociotechnical Future"

Caitlin Begg

23 July, 10:00-11:30 am PT (Zoom)

Overview

Caitlin Begg (Authentic Social) presented research and practical recommendations on sociotechnical design focused on workplace communication, followed by a group discussion on how organizations can apply those principles to reduce hyper-communication and improve joint optimization of social and technical systems. Key topics included four principles of sociotechnical design, findings from Caitlin's "Stuck in the Screen" survey (n > 1,000 U.S. respondents), the role of smartphones & AI in work communication, and practical interventions (norms, participation, psychological safety).

1. Presentation: goals and framing

- Purpose: make sociotechnical theory practical and accessible for organizations, especially around communication.
- Presenter: Caitlin Begg, founder of Authentic Social; research and practitioner background (Harvard thesis on digital communication, TEDx at Princeton, podcast Progression to Analog).
- Two-part structure: (a) four principles of sociotechnical design, and (b) findings from "Stuck in the Screen" and practical solutions for designing a sociotechnical future.

2. Four principles of sociotechnical design (summary)

- Everyday conversation: observe how people actually communicate (channels, norms, response habits). Caitlin emphasized conversation as central to joint optimization and the need to map real communication practices rather than assume them.
- Technical tooling and information flows: inventory and analyze tool stacks (example: organizations paying for many tools but using only a portion; sales team with five tools causing friction). Design tools to match work needs and reduce tool fatigue.
- Psychogeography / place effects: analyze where work happens and how physical/remote environments shape behavior, interruptions, and opportunities for spontaneous interaction.
- Qualitative data & ethnomethodology: integrate rigorous qualitative methods and build structures for psychological safety so employees can share candid experiences (surveys alone are insufficient).

3. Key problems identified

- Hyper-communication / notification culture: dramatic increase in channels (Caitlin referenced “7x the amount of communication channels” vs decades ago) with the same available time; massive asynchronous load (estimates cited: 3 hours 43 minutes to 6+ hours daily on asynchronous communications). Consequences: fragmented focus, reduced deep work, increased anxiety.
- Expectation of 24/7 availability: only ~13% of survey respondents said they can fully unplug outside work hours.
- Smartphones as a “third person”: phones tether employees, blur boundaries, and reduce perceived connection during conversations (frequent quotes from respondents: immediate decline in connection when phones are checked).
- AI-driven circularity & BYOAI: respondents reported pressure to use AI because managers use AI; employees bringing personal AI tools to work without disclosure, which can create recursive or low-quality communication (“AI slop”).
- Communication vs. work design debate: Mark and others argued communication is an effect of how work is organized; Caitlin framed communication as both shaped by work and a driver that must be co-designed with work systems.

4. Evidence: “Stuck in the Screen” (select findings)

- Sample: survey of over 1,000 Americans using an independent IRB (U.S.-based).
- Notable results:
 - Only 13% can fully unplug outside work hours.
 - Majority could not go 24 hours without a smartphone (work + social drivers).
 - High proportions report expectation of immediate responses at work; managers texting during one-to-ones cited as problematic.
 - Many respondents feel increased workload from asynchronous messaging and see texts as “friend homework” outside work.

5. Practical solutions and interventions discussed

- Establish communication norms and protocols: designate which topics are asynchronous (information exchange, files) versus synchronous (ideation, relationship-building). Provide examples in guidelines to normalize behaviors like picking up the phone.
- Reduce fragmentation: limit channels or clarify channel purpose; consolidate tool stacks to reduce tool fatigue.
- Tiered urgency protocols: define what constitutes an emergency and who responds (to prevent everything being treated as urgent).
- Encourage situational active listening: train managers and teams in focused listening and in-blocking time for undistracted conversations (Jenny’s example: 10 minutes of unadulterated attention can resolve issues).
- Psychological safety and participation: incorporate co-design and participatory processes when defining norms; collect qualitative feedback and protect anonymity where needed to counter fear of retribution.
- Leadership modelling: leaders must role-model norms (e.g., not texting in one-to-ones, allowing disconnect time) and explain productivity/efficiency rationale to get buy-in in cultures focused on measurable outcomes.

- Small-scale, iterative change: pilot changes on teams (start where leaders are receptive) and use frequent learning cycles rather than one-off seminars.

6. Group insights, tensions, and clarifications

- Participation is essential: Burt and others emphasized active participation (co-design) as underlying any successful socio-technical intervention—Caitlin agreed and suggested making it explicit within the principles.
- Unit of analysis debate: Mark and Annja raised the issue that studying communication reframes the unit of analysis from the work system to the nexus between the sentient (human) system and the work system; participants agreed this nexus perspective is useful for many contemporary communication problems.
- Cultural/context differences: Caitlin noted regional and industry variation (e.g., stronger “right to disconnect” norms in some European countries; U.S. tech/B2B environments show more hyper-communication).
- Emotional containment and anxiety: Jenny and others connected escalation of messages to anxiety (e.g., in medical settings or product launches) and proposed containing emotions through synchronous, direct conversations to reduce downstream message overload.
- Reading and depth deficit: Ramona observed that contemporary mediated information consumption (summaries, synopses) reduces capacity for deep expression and shared context, which undermines richer workplace communication; Caitlin advocates practices that increase analog, unmediated attention (e.g., reading nonfiction before device use).

7. Practical examples / use cases mentioned

- Sales team case: multiple tools + Slack distractions reduced time for calling prospects; consolidation recommended and rebalancing asynchronous vs synchronous work.
- Organizational scaling: founders using WhatsApp at 5 people may need structured communication and tool governance when scaling to 150+ employees to avoid shadow channels and legal/compliance risks.
- Return-to-office design: physical office can’t guarantee collaboration; must design spaces and protocols to enable spontaneous interaction and psychological safety (avoid “non-places”).

8. Recommendations & proposed next steps (synthesized)

- Start with a communication audit: map actual channels, frequency, response expectations, and tool usage vs purchased tools.
- Co-design communication norms: run participatory workshops to define asynchronous vs synchronous use cases, escalation protocols, and what constitutes emergency messaging.
- Pilot interventions: test reduced-channel pilots, synchronous meeting norms, designated “do not disturb” blocks, and measure impact (qualitative + quantitative).

- Build psychological safety & leader role-modelling: managers practice active listening, publicize norms, and demonstrate unplugging behavior.
- Integrate qualitative feedback loops: regular, safe ethnographic/qualitative check-ins (not only surveys) to track lived impacts and adjust.
- Education on analog practices: encourage routines that support deep work and unmediated attention (morning reading, friction for device use) and introduce them as personal and organizational options.
- Address AI governance: create explicit norms about disclosure and acceptable use of AI for internal/external communications to avoid circular/low-quality output and misattribution.

9. Logistics and follow-ups

- Caitlin will provide the TEDx Princeton talk link (editor's choice) — publishing planned for week of August 10, 2026.
- Caitlin plans to present related work at Dutch Design Week and to run a European version of the “Stuck in the Screen” study (to compare effects where right-to-disconnect laws or norms exist).
- STS Conference reminder: STS Annual Conference in Berlin, 29 Sept–2 Oct 2026; participants were encouraged to invite engineering colleagues to the next session (Dr. Ann Louise Howard on gender equality in engineering).

10. Notable participant contributions / quotes

- Joe: “The single biggest problem in communication is the illusion that it has taken place.” (G. Bernard Shaw) — cited to highlight misaligned assumptions.
- Ramona: suggested “protocols for silence” (Wittgenstein reference) — worth exploring as a norm for unplugging practices.
- Jenny: emphasized active listening and contained attention as means to reduce downstream message volume and anxiety.
- Mark / Bert / Annja: stressed participation, unit-of-analysis shift (sentient system × work system nexus), and practical limitations when leadership is unreceptive.

Concluding note The group consensus: communication must be treated as a central, co-designed component of sociotechnical systems rather than an afterthought. Practical change should combine tool rationalization, explicit channel norms, participatory design, leader modeling, psychological safety, and routine qualitative feedback—implemented iteratively and adapted to culture and industry context.