

References

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Technical Knowledge and Development: Observing Aid Projects and Processes, by Thomas Grammig. New York: Routledge, 2001. 224 pp.

This book provides a critical ethnography of international technical assistance (TA) projects. TA, the successor to “technology transfer” in development thought, seeks to modernize technical and economic processes in host countries yet, like technology transfer, often results in inexplicable “failures.” This book brings the nuanced eye of ethnography to assess why two very different TA projects failed—one in Mexico and one in Chad. While the writing style makes this book very confusing and unnecessarily dense, it is a useful addition to emerging thought on technical development projects.

Grammig starts with the seeming quandary of why two, radically different, TA projects both seem to follow the same well-known pattern—a well-planned and well thought-out project with significant technical merit that integrates local experts and nonexperts centrally into the implementation process nevertheless fails to meet basic technical goals. He suggests that this result cannot be explained by reference to technical failures—all involved agree on the technical merits and “appropriateness” of the technologies. Nor can it be explained by conscious resistance to the stated goals of the project—again, all involved see value in its expected outcomes. Nor can it be explained by direct political resistance or resource problems—there is sufficient commitment by all involved. Instead, he suggests, the failures develop organically, within the interactions between the various participants themselves. There seem to be, though, common “logics of exchange” within seemingly incomparable TA projects. Most of the book sets itself the task of deciphering specific interactions and extrapolating these to more generalized patterns.

Grammig’s focus on emergent forms of interaction within implementation—that is, on the “logics of exchange”—allows us to view the interactive process of sense making in TA projects, which draws on a whole range of resources: colonial history,

political economy, local identities, disciplinary knowledge, and machines. It should not surprise an STS audience to learn that TA projects involve such heterogeneous activities and are not simply determined by the technical characteristics of the projects themselves—in Grammig’s language, the “technical core”—or for that matter simply by “external” factors such as politics or economy. As such, his approach potentially fits well with network, coproductionist, or life-worlds analysis.

By focusing on logics of exchange, Grammig sets for himself two tasks: what is the pattern of interaction, and why is this pattern replicated so frequently in such different settings?

The pattern is located in what he calls the three latent processes of project interaction and failure, which are present in every TA project: technical content, dynamics of the exchange of knowledge, and a specific interface (note the inherent confusion here, since two of the three terms do not name processes). In the first (spelled out in a particularly unclear section), the validity and importance of the technical knowledge and machines are accepted by all participants, but the meaning ascribed to these may be quite different—leading to confusion and miscommunication, particularly for those who do not understand technology as cultural. Second, specific intercultural dynamics that emerge between groups involved in the projects draw on both the larger histories and economies of colonialism and globalization and the specific skills and knowledges of the various actors. These dynamics cannot be anticipated before the projects begin but must instead be consciously managed during implementation to avert failure. In the Mexican case, there developed a simultaneous deference to and disdain for American experts such that the Mexican experts could never fully cooperate in the project. In Chad, neither group ever came to see that their cultural assumptions were very different, and thus they never learned to communicate effectively. The third process is the construction of a dynamic and often unstable interface between the groups. An interface here refers to “the communication that takes place between two groups and the language and/or conceptual barriers that threaten the communication” (p. 89). While such interfaces are necessary to bridge “the fissures created when different cognitive worlds interact” (p. 90), their unconscious nature often gives way to communication failures. Notions of authority and otherness, rather than technical knowledge and disciplinary language, turn out to be the most important elements of this interface in Grammig’s two cases.

The frequent replication of this structure of failure stems from the ubiquity of cultural distance found between actors in such projects—particularly between the developers and developees. Grammig suggests that the cultural distance is enacted through a multitude of micro and macro conflicts that are brought into the project by the various actors: assumptions about motives (assistance vs. dependency), various types of language games (strategic, dramaturgical, and illocutionary), cultural meanings of specific types of actions (quality control vs. colonialist control), ideologies (lazy natives vs. colonialist foreigners), personal identities, and the need to enact them (expert, artisan, and Mexican). In fact, there are so many poorly understood contradictions that these projects were almost doomed to fail despite technical promise. Despite this, we get the sense from Grammig’s work that success was only just out of

reach and could have been had if only a few of these interactions had worked out differently.

And it is here that Grammig establishes a unique role in the TA project for the anthropologist. Unlike solutions focused on structural, institutional, or technical changes, he suggests that if the problem is one of interaction and translation, then the solution must be as well. He, therefore, sets for himself and other anthropologists the role of interpreter and facilitator of cultural exchange. Each TA project, he suggests, should employ an anthropologist to facilitate interaction and help construct a positive and supportive environment. This is a role that is perhaps familiar to anthropologists of science, who often seek to interpret and translate between science and its publics. To some extent, Grammig did play this role during his fieldwork but seemed not to be sufficiently aware of the dynamics early enough to be particularly successful.

Overall, Grammig's discussion leaves vague the role that science plays in structuring the "logics of exchange" discussed here. While most development projects involve cultural distance and developer-developpee relations, TA projects are characterized specifically by their involvement with machinery and science. From the text, the only sense that I can get for the role of the technical elements is that (1) technical knowledge serves as a basis to begin overcoming the cultural divide (in that everyone agrees that the technology is sound), (2) the ideology of "neutral" science creates new tensions by obscuring the cultural divisions that would be obvious in a nontechnical project, and (3) the social positioning of science provides an extra layer of hierarchy in the interaction; that is, the technical knowledge of western experts is never questioned or challenged in these two cases. All these are interesting starting points, but the importance of these for the specific interactions is left unexplored. Without a deeper exploration of these issues, the *Technical Knowledge* part of Grammig's title becomes extraneous.

This vagueness of explanation points to a broader problem with the text. I would have been more convinced of his various arguments, and better able to follow them, if he had stayed closer to his obviously rich ethnographic data. In most sections, every bit of data is already highly filtered for us, leaving little room for alternative interpretations. I never got a feeling for the voices of his many participants, for who they were or how they talked. Instead, Grammig uses very short (and often obscure) quotations to simply illustrate a point that he has already made. To the extent that these quotations cannot be made sense of outside of his interpretations, the text feels closed off and uninviting.

Probably the greatest problem with this text, however, is Grammig's difficult writing style and poor presentation of the material. The prose is dense and often quite obscure, frequently favoring vague sentences and examples over the clear articulation of his ideas. This is a problem found throughout the book and at many different levels. Partly, these problems may result from imperfect translation into English, such as the overuse of passive tense, vague referents, and use of nonparallel lists. Other problems, however, cannot be attributed thus, such as the introduction of terms that are not defined until much later (e.g., *endo-social* and *exo-social* situations, introduced on p. 9 and ultimately defined on p. 84) or his reduction of a very compelling quotation to a

turgid quagmire of theory (p. 105). Likewise, he has a tendency to bury key arguments in the middle of his sections and paragraphs, making them difficult to decipher. I found this particularly true in his chapter on latent processes, the chapter that articulates the central argument for the book. Overall, there seems to be little effort to compel a marginally interested reader. Given that his audience is, at least partly, practitioners of TA and development, I doubt that his book will have the impact Grammig hopes for. In fact, the book was so dense that I would be very reluctant to assign it in a graduate course. The reader would have to be very dedicated to get out of it what might otherwise be an interesting and provocative discussion. This is definitely not a book that lends itself to a quick read—particularly troubling given its relative thinness (at 188 pages of text).

Ultimately, I think Grammig's study has much to offer a science studies audience. It opens up the very common development practice of TA to an analysis that moves far beyond the confines of technical assessment (which he thoroughly criticizes). It provides a clear starting point for understanding how the local practices and interactions within these projects recapitulate failure across very different projects. Even if we do not share Grammig's sanguine outlook or desire to fix such failures, approaching TA projects from this perspective certainly moves us to a more nuanced level of analysis. Unfortunately, because of the difficult writing style, I can only recommend this book to specialists in development studies and students with a particularly keen interest in pursuing these issues further.

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