deliberate act and the typical situation in which an utterance is implicitly (or automatically) accepted in the course of a conversation. He goes on to consider precisely what aspects of speech are involved in such acceptability, showing the importance of both pragmatic context and discourse, and arguing that an utterance cannot be said to be acceptable in isolation, either as a sentence or as a speech act: "Utterances . . . are acceptable if their underlying discourses satisfy the rules of relative grammaticalness and interpretability. At the same time an utterance is acceptable in a conversation only if it is a speech act which is also appropriate relative to other (speech) acts of the conversation of interaction" (p. 49). Van Dijk forces us to recognize that one cannot merely examine the results of acceptability tests, one must ask what sorts of information they reflect and what this means for linguistic theory.

The remaining articles in the collection focus directly on the question of precisely what acceptability tests are measuring and on how such tests can be used. Mohan uses acceptability tests to judge the validity of another grammatical model: fuzzy grammar. Tottie argues that, whatever the problems with elicitation tests, they are valuable sources of data on norms, needed for helping the foreign language learner select among variant forms. Svartvik and Wright present the results of a study of the use of "ought" by teenagers. Levelt et al. ask the question, "Where do grammaticality intuitions come from?" (p. 39) and hypothesize that imagery is a major factor. They tested speakers using both high imagery (concrete) and low imagery (abstract) compound words and found that, as expected, high imagery material was judged more quickly, was more likely to be judged grammatical, and was paraphrased more quickly. They also found evidence (in the differences between paraphrase times and grammatical judgment times) to suggest that speakers do not need a full interpretation of the material in order to make a grammaticality judgment. This, of course, fits in with Snow and Meijer's argument that acceptability judgments are a skill separate from language use skills.

To sum up, Acceptability in Language is a most interesting and valuable anthology. The articles cover a wide range of issues: what is meant by acceptability; what factors (linguistic and social) are involved in speakers' judgments; what sorts of knowledge are in fact being tested; what we can learn from acceptability tests (and what we cannot). Even more important, per-

haps, is the variety of perspectives from which these questions are discussed. Greenbaum's introduction brings out clearly the major features of each article and the relevance of the issues discussed, thus helping the reader to see which articles are likely to have the most interest for him. For anthropologists, those contributions which deal with the acceptability of languages and/or varieties within the speech community as a whole are probably of the most immediate relevance.

Language as Social Semiotic: The Social Interpretation of Language and Meaning. M. A. K. Halliday. Baltimore: University Park Press, 1978. 256 pp. \$22.50 (cloth).

Greg Urban University of Texas at Austin

M. A. K. Halliday is an eminent British linguist who has emerged from the Malinowski-Firth London School tradition as a theorist in his own right. In this volume, he assembles 13 of his essays, written between 1972 and 1976. Much of Halliday's earliest work concerned classical problems of morphology and syntax, approached from a functionalist "system and structure" perspective (cf. Halliday: System and Function in Language, ed. G. R. Kress). In these essays, however, are reflected his more recent concerns with language as a signaling system, embedded within an encompassing cultural matrix. Here he is dealing primarily with sociolinguistics, with text analysis, and with language acquisition. Reflected in these essays as well, and perhaps most important, are the ruminations of a theoretician, charting the frontiers of our knowledge about language as a semiotic device.

Regrettably, it is a less than simple task to extract from this volume the intricacies of his theory. This is due in some measure to Halliday's occasionally too easy and diffuse style. Primarily, however, it results from the fact that each essay is a separate incarnation of the theory, focused in most cases on some specific issue (e.g., on Bernstein or on "antilanguages"). Consequently, we are allowed repeated glimpses of some of the same sites (e.g., the ideational/interpersonal/thematic functional scheme), but the volume as a whole is not an integrated theoretical statement, each component building on what preceded it. Nevertheless, the principal elements of this theory emerge with lucidity,

and among these can be singled out the focus on (1) function, (2) discourse or "text," and (3) context.

Halliday is a "functionalist" insofar as he views language as a device designed for accomplishing communicative ends, and insofar as function supplies the organizational basis for his description of language. In this he contrasts with classical linguistic "formalists," who focus on language as sign vehicle, and for whom forms and their distributions supply the organizational basis for a description of language. Halliday argues that languages, dialects, and "registers" differ not just in form, but also in what he calls "meaning potential." In this he seems to contradict the accepted dictum that it is possible to say anything in any language. In fact, however, his argument is the more subtle neo-Whorfian one: while one can say anything in any language, what speakers in fact habitually do say varies considerably, not only from language to language but from dialect to dialect and from register to register. This is not the Whorf we see filtered through the received "Sapir-Whorf hypothesis," but the Whorf who wrote instead about "habitual thought." For Halliday, the variability between languages and dialects is as much a question of variability in what it is appropriate or acceptable to talk about in a given context, as it is of variability in linguistic form.

Such a view is especially relevant for the sociolinguistics of class, to which Halliday devotes five essays (chapters 3-4 and 8-10). While much of Labov-inspired sociolinguistics concentrates on the formal variations between classes, e.g., the differential realization of post-vocalic /r/, Halliday stresses the differences in habitual thought or discourse patterns, for which formal variations, looming so large in native awareness and judgment, are but the overt signal. While we have emotional responses to "accents," seemingly, in fact the responses are to the thought patterns and life-styles we associate with those who speak that way.

A second key element in this framework is the focus on discourse, really a dual focus on (1) linguistic interconnections transcending the sentential level, and (2) the empirical "text." Linguistic signaling is, for Halliday, primarily an intersubjective phenomenon, so that language study should begin with discourse, or, minimally, should involve more than the psychologism and intuitionism of Chomsky-inspired linguistics. Discourse is linguistic signaling in action, and in it we can see some of the functions that transcend the proposition-encoding function, upon which the edifice of

modern linguistics has been constructed. Thus, discourse requires the nonpropositional "cohesion" function, e.g., coreferencing, which gives rise to connectedness or textuality.

Since language-users simultaneously encode multiple meanings, a given segment of discourse must be analyzed in terms of distinct functional modes. It is as if surface form were connected by a complex circuitry to meaning and function, the analytic task being to sort out the connections. While multifunctionality in this sense is characteristic of adult language, in the earliest child language (pre-18 months) the various functions are performed one at a time, each being mapped onto a specific utterance type. Halliday's studies of language acquisition from this perspective show how the child first compartmentalizes concrete functions, then later groups these together into more abstract "metafunctions" (the ideational, interpersonal, and textual), which can be mapped simultaneously onto a given stretch of discourse. Such language acquisition studies will undoubtedly provide a significant clue to the complex formalfunctional linkage found in adult language.

A final component of this framework is "contextualism," or viewing language use in relation to its linguistic and nonlinguistic contexts. Halliday repeatedly stresses the constraints upon discourse placed by contextual variables, by the social relations obtaining among participants in the event ("tenor"), by the type of activity underway ("field"), and by the role of the text itself within the situation ("mode"). From the context can be predicted a "great deal about the language that will occur" (p. 32). Indeed, Halliday slips at points almost into a contextual determinism, something that might be averted by a more careful consideration of sign theory.

Specifically, Halliday's theory could benefit from a consideration of the Peircean sign modes (icon, index, and symbol) and their relationship to language. In Peircean terms, contextualism involves viewing language exclusively in its indexical mode, i.e., in term of the spatiotemporal contiguities between sign vehicle and entity signaled. However, it is important that a core of language is symbolic or "semanticoreferential," i.e., context-free, and analyzable with more classical equivalence-based techniques.

Halliday is a pioneering researcher and an important theoretician, whose work merits consideration by anthropologists and linguists alike. Moreover, as the storm clouds of academic unemployment darken the heavens, it is worth noting that Halliday endeavors to make his

theory useful, stressing its applicability to such social problems as inner-city education. By making his theory useful, Halliday simultaneously suggests directions for alternatives to academic employment. Indeed, three essays (chapters 11-13) focus solely upon educational issues, which are touched upon as well elsewhere. This volume ought thus to appeal to a broad spectrum of interests, linguistic and anthropological, theoretical and applied.

Ways of the Hand: The Organization of Improvised Conduct. David Sudnow. Cambridge, Mass.: Harvard University Press, 1978. xiv + 155 pp. \$10.00 (cloth).

Andrew J. Roth University of Texas, Austin

How is jazz improvising organized as an aimed-for and accomplished form of coherent creative musical conduct? Sudnow addresses this issue drawing on his five-year experience of learning to jazz improvise in the bebop tradition and attempting a fine-grained description of the organization of his skill at improvising. He does not aim to establish developmental schemata underlying jazz improvising, nor derive ontogenetic outlines of psychological processes (although he comes close) involved in creative jazz production. He provides, instead, a detailed account of his hands' increasingly complex and creative ways at the piano as they work through specific jazz production problems.

The core of Sudnow's approach is to use jazz production specifics (i.e., ways) as the grounds for providing metalevel descriptions of how creative jazz play is aimed for and sustained. He provides the reader with (1) descriptions of specific fingering problems and piano-to-body alignments; (2) careful examinations of specific coordination problems like moving into and out of chords in a fashion which permits both proper voicing of each present chord and a smooth

transition to the next note configuration; (3) descriptions of chord-scale coordinations which provide pathways for sustaining play and produce a characteristic jazz sound; and (4) detailed and extensive examinations of fingering techniques and timing considerations necessary for the production and coordination of intervalic chord configurations when doing reiteration. A metalevel of description is, then, supported by these jazz production specifics.

At the metalevel, Sudnow's intuitions and introspections about his experience of developing jazz play are treated as issues (not insights) to be explicated by his close description of the body's actual production at the piano. His description of melodic intentionality provides an example. Melodic intentionality becomes possible once a new relation between hearing and sound production is accomplished. Sudnow first confronts the absence of this hearing/sound relation. He experiences a "symptomatic vagueness" (p. 17) when attempting to transcribe short segments of a very familiar jazz recording and a sense of "being drowned out" (p. 42) when playing in a trio. However, at the start of his third year of study, he accomplishes jazz hearing. By knowing how to produce a sound during jazz play and when that sound so produced can be heard, he pays attention to the sounds in a way that both permits hearing himself even in group play and allows his listening to focus even on "the particularities of the notes" (p. 17) in jazz recordings. His hearing is now jazz selective and a new level of jazz play with a "different sort of directionality of purpose and potential for action . . . " (p. 38) becomes possible; he begins to guide his play at the level of the next note to be heard.

Sudnow should be applauded for a fascinating book with a highly original descriptive approach. But let the reader be forewarned about the book's difficult prose; proliferation of gerunds, adverbial expressions, and hyphenated-word-clusters-as-nouns (an ethnomethodological trademark) is combined with a recursiveness that is almost jazzlike.

Archaeology

Agricultural Terracing in the Aboriginal New World. R. A. Donkin. Tucson: Wenner-Gren Foundation and University of Arizona Press, 1979. xi + 196 pp. \$8.50 (paper).

Barbara J. Price New York, New York The basic premise of this volume is simple, elegant, and provocative: agricultural terracing is preeminently a technique of water management. Most known New World terrace systems occur in sloping terrain, primarily in semiarid to arid highland zones with seasonal rainfall and high evapotranspiration. In such zones it is not