



THE QUARTERLY NEWSLETTER OF THE
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Center for Human Information Processing
University of California, San Diego

The Table of Contents on the front page of this issue is incorrect. The corrected version follows.

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Editorial Introduction

Although this *Newsletter* has often published issues devoted to the work of a group of people, and in fact, encourage such collective efforts, this is the first time that we have devoted an entire issue to one article. The exception is noteworthy because it permits us to provide a voice to Robert Serpell, one of the world's rare European experts in the field of cross-cultural psychology who has lived almost all of his professional life in Africa, enabling him to gain deep knowledge of the people among whom he conducted his research. This unique experience is reflected in the equally unique perspective signalled by the centrality of *audience* in Serpell's efforts to understand the cultural constitution of human nature. What does it mean when our subjects are not part of our audience?

Robert Serpell's perspective resonates strongly with a variety of strands of contemporary social theory, but it bears a very unsettling message for those who adhere to standard psychological methods derived from laboratory experiments and tests as their focal tool when interpreting the mental characteristics of "the other." Not too surprisingly, but disappointingly, this article, which was originally solicited by *Behavioral and Brain Sciences* proved insufficiently about the brain in the eyes of several reviewers, so it will not reach that audience. More surprisingly, perhaps, it was rejected by the *Journal of Cross Cultural Psychology*, whose senior editor had lauded the piece as a commentator for *Behavioral and Brain Sciences*. Reviewers for the cross cultural journal thought the article too abstract in places, or for too specialized an audience in others.

Well, what could be a happier opportunity for this *Newsletter* than to have offered for our consideration an article that links very directly to the January 1990 special issue on German conceptions of culture and mind and at the same time engage so many of the key issues that have concerned the *Newsletter* from its inception.

As always, commentary invited.

Audience, Culture and Psychological Explanation

A Reformulation of the Emic-Etic Problem in Cross-Cultural Psychology

Robert Serpell^{1,2}

University of Maryland Baltimore County

Introduction

The interface between culture and individual behaviour was a focus of shared interest for Western psychologists and anthropologists in the nineteenth century. But as the two disciplines proceeded to define their boundaries, they drifted so far apart that deliberate efforts have been required to reintroduce them to one another (Jahoda, 1982). Much of the contemporary writing in psychology continues to treat culture as a residual category (LCHC, 1978, 1979). One strategy for countering this weakness has been to build up the image of cross-cultural psychology as a specialized sub-discipline with its own distinctive theoretical and methodological preoccupations. In this paper I shall advance an alternative approach, arguing that culture is an important dimension of conceptualization for any psychological theory; theoretical-methodological issues which have been intensively debated by cross-cultural psychologists are better understood as characteristic of the very general problem of how to formulate models for psychological processes.

The guiding paradigm of cross-cultural psychology has been the attempt by researchers from a "Western" cultural background to describe the behaviour or the mental life of people in cultures other than the one they share with their audience. An important early insight of researchers using the cross-cultural paradigm was that some of their descriptions tend to miss the point of what they seek to interpret, because they fail to connect appropriately with the ways in which the people whose behaviour is described think about that behaviour themselves. Attempts to characterize this insight in ways which point ahead towards a solution of the problem have been beset with difficulties of a conceptual nature. In this paper I

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propose a reformulation of the original insight in terms of communication among the three essential participants in any psychological discourse: the person whose behaviour and/or mental life is to be interpreted, the author of the interpretation and the audience to whom the interpretation is addressed. I hope to show that certain elements of Pike's (1954) classic distinction drawn between "emic" and "etic" have an enduring relevance for cross-cultural psychology, while others can more profitably be replaced, in the light of subsequent advances in linguistics, psychology and epistemology, by a more dynamic conceptualization.

1. The Reflexive Triangle

All forms of representation and interpretation are selective. The choice of which features to emphasize at the expense of others is motivated by the goals of communication. These goals vary even for a single individual depending on the situation. A psychological theory may be proposed as a guide to future research or as a frame of reference for interpreting individual acts of behavior or events of experience. In each case we can identify three different roles which feature in the communication situation: the subject whose behaviour is to be explained, the author who proposes the explanation, and the audience to whom the explanation is addressed.

Sometimes two of these roles may be played by the same individual. For instance the audience may also be the subject, as when a clinician (as author) attempts to provide a client (as audience) with an explanation of the client's own experience (as subject). Or the subject may also take on the role of author, as when the client (as author) offers his or her own interpretation of his/her³ own behavior (as subject) to the clinician (as audience). This potential for changing roles has been described as the challenge of reflexivity inherent in the enterprise of psychological theorizing (e.g., Shoter, 1975). Some would hold that an acid test of the adequacy of a psychological theory is whether it is satisfying to the subject who applies it to her own behavior and experience, thus simultaneously playing the parts of subject, author and audience. But, of course, we also use such theories to explain the behaviour of others and not always to themselves. The interchangeable roles must also therefore remain separable, so that (for instance) an educational psychologist may offer an explanation of a child's behavior to other members of the family or to a school teacher, and an industrial/occupational psychologist may offer an interpretation of the experiences of workers and managers each to the other party.⁴

2. Three Cultural Constraints on Psychological Theory

2.1 Culturally biased subject data base

The problem of cultural validation in psychological theory has been posed in relation to each of the three roles distinguished above. First and best known of the constraints identified by cross-cultural psychology is the range of human variation sampled in the subject population. A theory which can account for the effects of age at weaning on the emotional development of children weaned between one and twelve months of age may not be adequate to account for variations outside that range, e.g., between one year and three-years-old. Thus a theory which was proposed to account for the lower range (which happened to be the total range observed in a large sample of the U.S.A. population in the 1950s) was seen to lack generality and was modified to take account of the wider range present in the population of the whole world (Whiting, 1954).

A different example of the limitations of theory based exclusively on research in Western populations is the case of bewitchment. The attribution of one's experience of physical and or mental distress to occult, malicious influence by another person (the practitioner of witchcraft or sorcery) is a common line of explanation in many societies and has been studied in some depth by various anthropologists in Africa and elsewhere outside the "Western world." Such attributions were both culturally and legally endorsed in medieval European societies, but had greatly declined in popularity and lost all legal support long before the turn of the last century when the foundations of modern scientific psychology were being laid (Thomas, 1971). As a result, scientific psychology ignored this important feature of behaviour and experience during its formative years and to this day has little of value to say on the subject or indeed (as Jahoda, 1982 observes) on the related subject of envy.

A third and more controversial way in which the Western data-base of psychology may be regarded as responsible for certain inadequacies of existing theory for the interpretation of behavior and experience in other cultures is that it leads to an emphasis on the importance of variables which are less important in one culture than another. It may be that particular socio-cultural conditions modulate the impact of one psychological factor on another. McClelland (1961), for instance, speculated that the patterning of employment opportunities for young professionals and business managers in Turkey led to a different

relationship between achievement motivation and entrepreneurial behaviour in that society than had been found in Italy, Poland and the U.S.A.

Another possibility is that an additional psychological variable exercises a greater influence on one factor of a two-factor relationship in culture A than in culture B. Pictorial perception skill (Serpell & Deregowski, 1980), for instance, may be more variable in an African society than in the U.S.A. and thus contribute more to variations in performance on perceptual disembedding tests than field-dependency (Witkin & Berry, 1975), whereas pictorial perception skill accounts for much less variance in the U.S.A. (Serpell, 1976).

Another way of looking at this problem is to question the adequacy of the measures used to assess the level of one or more of the variables under consideration. Cognitive style and perceptual disembedding might be as closely linked in Africa as in the U.S.A.: but we may need new kinds of tests to assess their level in Africans. To the extent that pictorial perception skill is required for performance of the Embedded Figures Test and the Block Design Test, these tests may be regarded as inappropriate for assessing individual differences on other psychological variables such as field-independence, perceptual disembedding skill, spatial ability, intelligence, etc. in populations where pictorial perception skills are unevenly distributed.

The use of pictorial materials to assess cognitive variables in a pictorially unsophisticated population can be criticized on rather limited, technical grounds by analogy with testing intelligence in a language unfamiliar to the subject. There is, however, a somewhat deeper level at which the argument about adequacy of assessment can be advanced. To what extent is visual disembedding an appropriate domain in which to look for manifestations of field-dependency in Africa? Is it possible that psychological differentiation is more significantly elaborated in other sensory modalities in a culture where the medium of print has acquired less prominence (Wober, 1966)? Or again at a higher level of abstraction, is field-dependency the most appropriate dimension for the analysis of cognitive style in African societies? What about other conceptualizations of cognitive style (e.g., Cohen, 1969)? To what extent do social organization and socialization practices distinctive to Euro-American culture constrain the ways in which psychological characteristics are grouped under such headings as these? These questions are conceptually prior to questions of measurement. They concern the theoretical definition of psychological constructs in ways that guide the selection of indicators, which in turn become the

targets for measurement. Unfortunately they have seldom been addressed as part of the enterprise of cross-cultural research. Yet, as Poortinga (1986) has pointed out, the level at which the variables are conceptualized has a direct bearing on the type of inferences which may legitimately be drawn from cross-cultural comparisons.

2.2 Eurocentric enculturation of authors

One reason for this kind of omission which has often been cited is the limited range of cultural intuitions accessible to the authors of most psychological research. As Wober (1969) has put it, many cross-cultural studies reflect, if not an ethnocentric perspective, at least a "centricultural" one, which can be caricatured as guided by the question "how well can they do our tricks?" As a result, the expansion of the data-base of psychology to address some of the issues noted in section 2.1 have been frustrated by a second major constraint: the range of cultural variation contributing to the authorship of psychological theory.

It is not easy to characterize this constraint in an objective manner. We can, of course, assemble statistics on the nationalities of authors, yielding such forbidding conclusions as Triandis (1980) notes in the Preface to the *Handbook of Cross-Cultural Psychology*.

One of the key facts about psychology is that most of the psychologists who have ever lived and who are now living can be found in the United States... The rest of the world has only about 20 percent of the psychologists that are now or have ever been alive.

Nationality, however, is probably not the most appropriate indicator of an author's cultural orientation. At least four relevant aspects of enculturation may profitably be distinguished:

- (a) the cultural form of the author's primary socialization;
- (b) the culture which informed the curriculum of her general formal education;
- (c) the institutionalized sub-culture of her basic training in psychology; and
- (d) the cultural traditions reflected in the psychological literature available to her as an inspiration for innovative research.

The fact that many Third World nations include a heterogeneous set of cultural and sub-cultural groups leads to frequent discrepancies between aspects (a) and (b). Moreover aspect (c) is often a more or less unapolo-

getic transplant from a "Western" culture. Most of the published discussions of this topic have centered around aspect (d).

Looked at from a Latin American perspective, "contemporary psychology shares all the characteristics of Anglo-Saxon culture: emphasis on adaptation, emphasis on function more than structure, dynamism, operationalism, evolutionism. Psychology is conceived in English, is written in English, and for the most part considers problems relevant to Anglo-Saxon culture, specifically to North America" (Ardila, 1982, p. 323). The widespread acceptance of this intellectual tradition in Third World universities can be construed as a facet of pervasive changes in world-view induced by the experience of colonialism, industrialization and the emergence of a new elite (Petzold, 1984).

Some nations have experimented with ideologically focussed planning and management of research, with consequences that have often been regretted by scientists (e.g., Ching, 1984). Diaz-Guerrero (1986) describes a programme aimed at the definition of an "ethnopsychology" centering around distinctively Mexican "historic-socio-cultural premises." But his definition of these as "a culturally significant statement, which is held by an operationally defined majority of the subjects in a given culture" must raise doubts as to whether it adequately reflects the cultural preoccupations of indigenous minorities. Even in Indian psychology, where contrasts are often drawn among indigenous religious, caste and ethnic groups, a preference for "deficiency formulations" of cultural differences (cf. Howard & Scott, 1981) may have derived support from assumptions of national homogeneity in the symbolic universe (cf. Sinha, 1984).

Azuma (1984) has provided a thoughtful analysis of four "stages through which psychology apparently needed to pass in Japan." (1) In the introductory period, "technical knowledge" was introduced by "foreign experts" and "members of the intellectual elite trained abroad." (2) Next came a translation and modelling period, during which it became apparent that for the imported science "application is feasible only at a technical level for problems that are relatively culture-free (e.g., early aviation psychology, tests of manual skills)." (3) This provoked an indigenization period in which:

... new concepts and theories appropriate to culture-bound phenomena are advanced by psychologists who know both native and 'developed' foreign cultures. New concepts of indigenous origin are advanced that relate well to other concepts in the same culture. The application of psychology to culture-bound phenomena becomes more effective.

(4) This sets the stage for an integration period in which "psychology subsumes thoughts and concepts of non-Western origin, deepening and generalizing the understanding of human nature." Azuma contends that the third, indigenization stage was an essential preliminary for psychology to "get freed, to a certain extent, from the rigid but otherwise unnoticed world of traditionally Western concepts and logic" (op.cit., pp. 54-55).

The ways in which a researcher coordinates and integrates her own experiences and interpretations of the various cultures to which she has been exposed in the course of enculturation and education are in themselves a subject for research. Third World psychologists who receive their advanced training abroad face various problems in matching its orientation with the social context in which they are later expected to apply it (Moghaddam, 1986). On the other hand temporary detachment from the culture of one's primary socialization may hold certain paradoxical advantages in forcing the psychologist to acknowledge and confront the nature of cross-cultural differences (Serpell, 1984). Most indigenous Third World psychologists have a multi-cultural cognitive repertoire by virtue of the complex urban societies in which they live (Serpell, 1977c, 1978). In order to understand what use they make of the indigenous cultures in their research we will need to consider the third corner of the reflexive triangle described in section 1.

2.3 Cultural presuppositions of the primary audience

In the triad of participants in the communication situation from which psychological theories emerge, the third role is that of audience. The culture which informs the expectations, perceptions and reactions of this participant may be of even greater importance than the other two. Many authors, as we have seen, have access to more than one cultural repertoire. But their choice of a frame of reference or "anchor-point" (Berrien, 1967) will generally be made with a view to the impact their writing can have on a particular audience. Whether the author shares an insider's knowledge of the culture with the subjects of the study, or only shares a nationality, or merely human intuitions may be less important than whether she decides to address the interpretation of the study to those subjects as an audience.

Most of the psychological theorizing which is committed to paper as a result of studies in Third World societies is addressed implicitly or explicitly to an international community of scholars (Serpell, 1979). Yet, there

are clearly substantial grounds for doubting whether such an audience shares many of the presuppositions concerning behaviour and experience which are held by the subjects of the research. One set of reasons for this outward-looking orientation arises from the de facto domination of the publishing industry by "Western" societies. Anyone who has tried to procure copies of books published in the Third World is aware of the real stranglehold exerted on the dissemination of information by the power structure of book trading practices. Furthermore the intellectual dominance of Western universities makes itself felt in the prestige ranking of academic journals. Whether the assessment is made by a multinational array of scholars with the same research specialization, or a multi-disciplinary committee of peers advising on promotion within the author's home university, the fact that a researcher has published in one of the "leading journals" in the field is likely to carry more weight than 4 or 5 times as many papers with similar titles in local journals.

In part this prestige ranking can be justified in terms of the intellectual rigor with which submitted manuscripts are appraised in the review process (cf. Skinner & Kramer, 1985). But it is clear that criteria other than sheer methodological precision enter into the appraisals, ranging from the "significance" of a paper's addition to the existing literature, to its "theoretical coherence" and even to its intuitive plausibility. Thus an aspiring scholar based in a Third World country is under pressure to make her writing conform with the expectations of editors whose primary audience is the concentration of research departments in the U.S.A. and a few other "Western" countries. A fuller explanation of how and why scholars give in to this kind of exogenous cultural pressure would require a discussion of the institutional mechanisms through which social forces impinge on the activities of researchers, which lies beyond the scope of this paper (cf. Coleman, 1972; Kashoki, 1979; Serpell, 1988; Stifel, Davidson & Coleman, 1982).

Another, more substantive line of justification for publishing research in international, primarily Western-based journals is that authors write for an audience which is likely to be interested in what they have to say. One might wish to dismiss this with a version of the old riddle "which came first, the chicken or the egg?" If authors were to tailor their writing appropriately, then audiences other than those they presently address would be likely to show an interest. But what if an author protests that some aspects of what she has to say will not be comprehensible to certain audiences? This claim is not infrequently advanced with respect to so-called "technical" issues. With-

out a full study of Piaget's theory of genetic epistemology, the meaning of such constructs as concrete operations, equilibration or decalage is difficult to grasp (cf. Flavell, 1963). This line of reasoning merely pushes the problem one step further back. Under what conditions and for what purposes might a theorist consider it desirable to introduce, explain or teach to a given audience the entire theoretical system of which a component cannot be fully understood in isolation?

It is difficult to attribute the motivation for communication to the desire for intelligibility per se: intelligibility is a means to other ends. In the case of psychological theory the central communicative goals are those of enlightening and empowering the audience (Taylor, 1971). Now these are not value-free objectives. If we seek to enlighten and empower teachers with an understanding of how children's minds work and develop, the socio-political question must soon arise whether this enlightenment should not also be made available to those children's parents, and as the children grow older even to the children themselves. In short, the decision not to address a psychological explanation to any particular audience may be justifiable in the short-term on grounds of interest or comprehension. But it is hard in the longer term to justify excluding the subjects of psychological study from a full understanding of the theory which that study generates, since to do so implies a judgement that other people are more deserving of the power that flows from that understanding than the subjects themselves.

At the point where an author is ready to accept an obligation (over whatever time-scale and with whatever provisos concerning resources) to make her theory intelligible to the audience of subjects whose behaviour and experience were studied, the problem of cross-cultural compatibility comes into practical focus. A reciprocal perspective which evokes the same problem arises when subjects are regarded as voluntary and self-conscious agents. What use is the theorist to make of these agents' self-perceptions, introspections and interpretations of their own actions? As with the obligation to share one's theory with the subject, here too there are various ways of defining the problem. Subjects may be said to lack insight, to be irrational, to be controlled by forces beyond their understanding; but still the stuff of their mental life can hardly be dismissed as irrelevant to the formulation of psychological theory. A bridge is needed between the understanding by the subject of her own experience and behavior and the interpretation offered by the psychological theorist.

3. The Emic-Etic Formulation

The discipline of linguistics seems a plausible source of theory for tackling this problem. After all, language is a distinctively cultural product, well-known for its unintelligibility to outsiders. A disciplined account of what the world's various languages have in common and the nature of their differences might well throw light on how people of different cultures can expect to render their interpretations of human behaviour mutually intelligible. This potential was systematically explored by Pike (1954, 1967) in his account of "etic and emic standpoints for the description of behaviour."

The central insight of his analysis, which I believe we should try to preserve was that the meaning of a concept arises from its place within a coherent system. Arguments which are still unresolved concern the precise meanings to be attached to the key terms of this proposition: **meaning, concept, place, coherent and system.**

3.1 The analogy between linguistics and psychology

Pike's analysis is based on an analogy. Like most analogies it rests on certain broad similarities between two conceptual domains but does not hold that what is true in one domain is in all cases exactly true in the other. The topic in both disciplines (linguistics and psychology) is how to represent phenomena, and the analogy is clearest at the higher levels of abstraction: what is the standpoint of the theorist, and what kind of view of the phenomena does she present? Table 1 summarizes the analogy in respect of these strategic questions.

It would perhaps be satisfying for the sake of elegance to be able to add a further column to the table, with the heading "Anthropology." Certainly, historically, anthropological theorists took an interest in the emic-etic formulation before psychologists did so. But conceptually it seems unnecessary to filter the insights of Pike's linguistics through those of anthropologists in order to explore

Table 1

Strategic analogies between linguistics and psychology in terms of the emic-etic formulation

	<u>Linguistics</u>	<u>Psychology</u>	
(a) Standpoint of the theorist	<p><u>etic</u>: external to any single language</p> <p><u>emic</u>: of (and for) a user of a specific language</p>	<p>trans-cultural supra-cultural ('Olympian') universalistic hologeistic</p> <p>of (and for) those who share participants in bearers of members of</p>	<div style="display: flex; align-items: center;"> <div style="border-left: 1px solid black; border-right: 1px solid black; height: 80px; margin-right: 5px;"></div> } → </div> <p>a particular culture</p>
(b) View of phenomena presented	<p><u>etic</u>: 'alien' to the intuitions of native speakers of any single language</p> <p><u>emic</u>: faithfully representative of the intuitions of someone familiar with the system and who knows how to function within it himself or herself.</p>	<p>technical theoretical scientific (?)</p> <p>insider's native popular folk naive (?) everyday (?) common-sense (?) lay (?)</p>	

the relevance of the formulation to psychology. Phonology is, after all, as much a facet of individual behaviour as it is of social organization. Moreover, as Jahoda (1983a) has observed, the concerns of anthropologists seeking to develop this formulation have been very diverse and it would require several columns, not just one, to represent the forms of the distinction articulated by theorists such as Goodenough, Harris and Pike.⁵

Social scientific constructs are attempts at representation. As such they share with all other representational systems the properties of abstraction, simplification and ordering. Like the artist, the scientist imposes a structure on reality. The emic notion is appropriate because it arises from an analysis of how different versions of a single family of representational systems (languages) differ from one another. Operating within common biological constraints (those of the vocal and auditory tracts) different human communities have developed different phonological systems to do the same kind of job.⁶

Normally the user of a phonological system operates within the categories and rules which it stipulates. For instance, when she encounters a word for the first time, such as a place-name, she will repeat it with ease and pronounce it "correctly" in accordance with prevailing usage. Moreover, a new word, whether "coined" within the language or "borrowed" into it, will be structured in terms of the pre-existing phonological possibilities. To use the terminology of phonemics, new words are encoded by the competent speaker/hearer of a language in terms of the minimal sound categories of the language capable of signalling a difference in meaning, that is the phonemes (Brown, 1958). Berko (1958) exploited the psychological reality of these phenomena to show that young children will apply their incipient knowledge of grammatical inflections even to nonsense-words.

An informed account of such behaviour needs to take account of the systematic pattern which underlies the variations in the subject's speech. A phonological description should give prominence to phonemic distinctions and ignore (or at least treat differently) variations in the sounds uttered which arise either accidentally or because of factors other than the basic sound-meaning system of the language. (Some of these "irrelevant" variations may arise from random fluctuations in the speaker's vocal apparatus due to breathing, salivation, etc.; others, which reflect transitions from one articulatory movement to the next are phonologically predictable; and yet others are sociologically conditioned by factors such as social status, role performance and processes of impression management.)

Now the problem for a researcher who does not already know the language in question is that it is not immediately obvious which physical variations in speech sound are cases of "free" or "allophonic" variation to be ignored, and which have phonemic significance. The boundaries between phonemic categories differ from one language to another. (E.g., in English the aspirated p in "pin" is a version of the same phoneme as the unaspirated p in "spin," whereas the same two sounds represent cases of two different phonemes in Chi-Chewa [also known as Nyanja] as shown by the minimal pair of words spelled "pa" [meaning "at"] and "pha" [meaning "kill"].)

In order to deal systematically with problems of this nature, linguists have developed a form of notation called the International Phonetic Alphabet (IPA, 1949) which in principle allows the observer to record a set of speech sounds independently of the particular phonological system of any given language. Thus the words "spin" and "pin" could be transcribed phonetically as [spɪn] and [pɪn], and this would enable a trained linguist to give a fair rendering of the sounds irrespective of her knowledge of the English phonemic system. Data compiled in this way can then be examined in search of their intrinsic patterning and eventually organized into a phonemic description of the language in question. This step results in a reduction of the number of different symbols required to represent "the sounds of the language." Typically such an account will be published in the medium of a language other than the one studied and will include a chart in which the phonemes proposed for the description of the language are defined for the benefit of non-native speakers with IPA phonetic symbols and/or phonetic descriptions in terms of articulatory features such as the location of the main body of the tongue, the movements of the lips, etc. Sometimes these phonetic definitions are supplemented with comparisons between the sound in question and a phoneme of another language, either the one in which the report is written or another well-documented language regarded by the author as probably familiar to a substantial portion of her audience.

Despite this orientation towards the cognitive resources and needs of a foreign audience, it should be emphasized that a major criterion of the adequacy of such a phonological description of a language is that it should account for the intuitions of "native" speakers of the language (or, more properly, speakers for whom it is their first and most important language).⁷ The phonemes used to categorize the range of sounds that occur in a corpus of speech must have psychological reality for the speakers themselves, even if the system of notation used requires

some explanation before they can understand it. Although the scope of such "native" intuitions has sometimes been controversial in studies of the grammatical and semantic aspects of language, their epistemological status and their relation to theoretical models advanced to account for them are, as we shall see in section 3.2, matters which have attracted more direct attention from philosophers and psychologists.

Based on this schematic account of phonemic and phonetic descriptions of speech sounds, we may now briefly consider the strategic features of the two approaches outlined in Table 1 and the analogy with various types of psychological description. Clearly the theoretical standpoint of the phonetic approach is analogous to that of the proponents of a universalistic psychology. The mode of description is designed to cater for any and all different languages, just as a universal psychology is conceived as applicable and relevant to the behaviour and experience of people in all societies and cultures. Such a psychology is often defined by its advocates as peculiarly well suited to comparison between the behaviour of people living in different socio-cultural systems, because it transcends the differences between cultures. The project has been gently parodied by Berrien (1967) as requiring the theorist to rise above the data and look down on them from a detached viewpoint like that attributed by the ancient Greeks to the gods on top of Mount Olympus. Triandis (1977) compares his own vision to "a map of the globe," and indeed one line of research on the interface between psychology and anthropology has come to be known as the field of "hologeistic" or "world sample" studies (cf. Barry, 1981).

Conversely, the theoretical standpoint of the phonemic approach is analogous to that of the proponents of ethnic, indigenous and national psychologies. The mode of description is designed to represent uniquely well the phonological behaviour and experience of a sub-set of the world's population who share a particular culture, just as culturally specific psychologies aspire to do so for a wider range of behaviour and experience than the sounds of language. The criteria for determining how well a phonemic description achieves this goal include comprehensiveness (the full range of the community's speech sounds must be accounted for), economy (with a limited set of phonemic categories), and intuitive plausibility (in a system which is intelligible and convincing to native informants). A number of analogous concerns were noted in section 2 about the validity in various non-"Western" cultural settings of psychological constructs originating from "Western" culture. Can they account for the full range of variation present in the recipient culture along a

given dimension? Do they offer explanations for all of the psychological phenomena important within this culture? Do they accord appropriate emphasis to different variables? Azuma (1984) cites the example of Benedict's analysis in the 1940s of Japanese culture and personality in terms of a "Western" transactional model, and argues that the more recent account by Doi centering on the indigenous concept of *amae* conforms better with the intuitions of indigenous participants in Japanese culture.

The contrasts I have tried to characterize in this section appear to me to be genuinely analogous across the disciplines of linguistics and psychology. Moreover the fact that in phonology a system exists for translating from one type of description to the other suggests the attractive possibility of modelling an investigative procedure for cross-cultural psychology after the paradigm of comparative linguistics. However, it is precisely the transition from strategic perspectives into details of methodology which has proved to be highly contentious. Before discussing this point in detail, I wish first to consider the connection between the notions of "the insider's perspective" and "common sense" and then to explore what seems to me one of the most illuminating applications of the "emic-etic" analogy, namely the concept of cross-cultural projection of conceptualizations.

3.2 The insider's perspective and common sense

Some advocates of indigenous or societal psychologies portray them as means to a universalistic end:

... to help cross cultural psychology in its important goal of ascertaining universally or quasi- universally relevant and valid dimensions, laws and theories (Diaz-Guerrero, 1986, p. 9)

... they provide the necessary wealth of information for what most cross-cultural psychologists wish eventually to attain in a universal psychology (Berry, 1986, p. 11)

Others, while acknowledging the possibility of productive exchanges of ideas between cultures, lay greater emphasis on internal and intrinsic values for indigenous psychologies:

... the growth of a Filipino psychology...making use of his own language and of indigenous psychological frameworks to provide relevant standards to the study of the history, experiences and aspirations of the Filipino people (Enriquez & Marcelino, 1984, p. 13).

The real task for psychologists... involves endless critical probing in order to see whose interests psychology's works

represent, rather than trying fruitlessly to free psychology from what is after all the very soil that contains it and renders its conclusions limited, but meaningful and valid within their limited contexts. (Sampson, 1966, pp. 3-4).

Depending on their preference between these two perspectives, psychological theorists invoking the "emic"-etic" analogy have variously designated the psychological constructs derived from an "emic" stand-point as less sophisticated (lay, common-sense, everyday, naive, folk) or—as more acceptable (insider's native, popular). The whole question of how theoretical validity in psychology is related to acceptability by the subject has become the subject of a subtle and somewhat hyper-sophisticated debate (Wegner & Vallacher, 1981). Heider (1958) articulated the premise that common-sense interpretations of other people's actions "achieve in some measure what a science is supposed to achieve: an adequate description of the subject matter which makes prediction possible" and tried to show that naive perception and judgement of interpersonal relations are grounded in "a network of concepts that are systematically defined" (p. 297). His approach to this task was one of analytic explication of the logical connections among the elements of such a network rather than empirical enquiry, and Smedslund (1978, 1980, 1982) has argued that this is a necessary consequence of the nature of common sense.

It seems to me useful in this connection to distinguish three types or levels of common sense knowledge: (1) logical implication, (2) ontological knowledge about the physical world and people's place within it, (3) knowledge about psychological relationships and our own efficacy within that domain. Formal psychological theories are apt to build on each of these, but in systematically different ways. When elements of a formal psychological explanation appear tautologous, empirically empty or intuitively obvious, this is a function of the formal statement's relation to one or more of these elements of the audience's prior knowledge. There will be times when stepping outside the conscious ideas of an individual is helpful in explaining her behavior, and varying types and amounts of persuasion may be required to convince the actor of that explanation's validity.

One set of questions arising from this analysis concerns the extent to which common sense knowledge at each of these levels is universal or culturally specific. This will be discussed in section 4.3 below. Another set of questions pertains to the role of persuasion in psychological interpretation and its relation to explanatory validity. This will be discussed in sections 4.2 and 4.4 and taken up

again in section 5. Meanwhile, to the extent that transcultural or comparative studies require a meta-language independent of the particular cultures under consideration, the technical terminology in question will, at least initially, be somewhat alien to the language of everyday discourse within any one of the cultures. It remains debatable whether this kind of alienation from the views held by subjects of their own behavior and experience is a necessary and acceptable price of "true science," or should rather be seen as an unfortunate by-product of the investigative process, to be abandoned as soon as possible or even resisted as a matter of principle.

3.3 The dynamics of ethnocentric projections

One of the most striking ways of illustrating the notion of phonemic categories is to use contrastive analysis of languages as a basis for explaining pronunciation errors by speakers of a foreign language (Lado, 1957). A simple image for conceptualizing such "first language interference" phenomena is that of a filter: "the sounds of the foreign language receive an incorrect phonological interpretation since they are strained through the 'phonological sieve' of one's own mother tongue" (Trubetzkoy, 1939, cited by Hyman, 1975). More formally we might hypothesize that the speaker of language 1 (L_1) has transferred to language 2 (L_2) a habit of selective attention (Serpell, 1968) or of categorization which does not fit the structure of L_2 .

One type of error takes the form of pronouncing two or more L_2 phonemes interchangeably, e.g., an L_1 speaker of Chi-Chewa or Hokkien may produce the same range of sounds for the L_2 English phonemes /l/ and /r/. This is explicable on the assumption that the speakers are transferring or projecting into English a category from their L_1 phonemic system which is too broad for this segment of English phonology and unconsciously assuming that the sounds [l] and [r] represent insignificant variations within that category. Similarly an L_1 speaker of English may produce the same range of sounds for the L_2 Chi-Chewa phonemes /p/ and /ph/ described above, and may produce a single type of sound for L_2 Hokkien phonemes which are marked by distinct tonal values.

Even if the L_1 speaker's attention is drawn to the crucial variations in L_2 which she has disregarded, she often tends to "hear" them as non-linguistic or paralinguistic variations. Thus an L_1 English speaker may attribute to an L_1 speaker of Hokkien a "sing-song" quality of speech. Even when such features are recognized as characteristic of the language being spoken rather than of a

personal idiolect, they are sometimes embedded in a linguistic-cultural stereotype (e.g., "excitable French," "heavy German").

At a more advanced stage of second language learning, a common strategy is for the learner to encode the phonemes of the second language as variants of the learner's L_1 phonemes with specific additional and/or deviant features. Thus the bilabial fricative sound in Chi-Chewa is learned by most L_1 speakers of European languages, as a "voiced" /w/ while the same sound in Ichi-Bemba is learned as a "soft" /b/ a fact which is both reflected and reinforced by the orthographies of the two languages developed by Europeans at the turn of the century. While such encoding points the way towards correct pronunciation it still tends to distort the sound in the direction of the reference L_1 sound to which it is "anchored."

Certain aspects of cross-cultural communication about psychological constructs can profitably be interpreted along analogous lines. For instance a number of studies in African cultures have generated accounts of indigenous conceptualization of intellectual functioning which do not correspond in a straightforward way with the concepts that are current in "Western" psychological theories of intelligence (Serpell, 1989). A common response by "Western" psychologists to the observation that the variations perceived as significant by insiders of such a culture (let us call it C_2) do not correspond with the "Western" C_1 concepts is to hold on to their C_1 categories. Thus the term *obugezi* in Lu-Ganda is noted by Wober (1974) as having "a meaning that includes the English referents of wisdom, as well as of intelligence" (p. 277). The same could equally well be said of the Chi-Chewa term *nzelu*. As with the phonological analogy, this is probably a good introductory approach for the learner of a second culture, indicating where to search in her past experience for relevant knowledge. But we know that in phonological learning such a code must ultimately be discarded if the speaker is to pronounce the L_2 faultlessly. Likewise, ultimately for an understanding of *nzelu* we must discard the English reference points and learn to use it as a concept in its own right with its own unique cluster of properties, defined with reference to a system of oppositions and complements.

A second, stronger line of defence against the need for a radically new conceptualization (not infrequently raised in research seminars) is to argue that properties of the C_2 system which do not fit within the C_1 categories proposed can be described in terms of other, orthogonal dimensions

of the C_1 category system. Thus the socially oriented aspects of what A-Chewa adults value in their children's behaviour may be explained (away) as extrinsic variance, and described in "Western" terms as the desirability of "cooperation" as distinct from "intelligence." However, if the correct interpretation of *nzelu* as a form of intelligence in Chewa culture requires the inclusion of this social component (Serpell, 1977a, b, 1982), then this line of reasoning is misleading in a similar way to the ethnocentric description of Hokkien speech as "sing-song." Because it hinges on an analytic distinction, a definition of intelligence which excludes cooperative qualities might be construed as "refined." But if it distorts the concept because of an extraneous bias (arising from the theorist's alien cultural pre-disposition) then it may be more properly regarded as an "impoverished" definition.⁶

This analogy with L_1 interference errors in second-language learning differs from some uses of the "emic"-etic" formulation in stressing the dynamic and directional character of cross-cultural interpretation in the real world. The ideal of a universalistic perspective presupposes a degree of detachment from any one culture which seems to have little basis in reality. There are relatively few multilingual persons in the world who can claim an insider's proficiency in languages from many diverse language families; the multicultural person who can claim insider's access to the various families of cultures around the world is an even rarer phenomenon. Contributions to debates about different cultural alternatives necessarily consist mainly of interpretations launched from a one-sided, biased perspective. Even a dialogue between two theorists with divergent perspectives typically samples only a narrow band of the total range of available perspectives around the world. Thus even if we succeed in "taming the demon" of our first culture's "emic" bias, we remain a long way from an "Olympian" view—as far as the concept of duality is from that of multiplicity.

It may be useful briefly to illustrate this problem with respect to the expression "pseudo-etic" coined by Berry (1969). An "etic" category in phonology is construed as impartially descriptive: the various sounds which fall within its scope are acoustically similar, rather than linked by the conventions of a particular language. Certain other non-linguistic features of individual and social behavior seem to be susceptible to such impartial description, e.g. speed of walking, density of aggregation. But there are many categories which feature in psychological and sociological writing as if they were impartial, yet on closer examination their range of application is found to be based on culturally specific assumptions.

For instance, the concept of work presupposes leisure as a formally acknowledged alternative type of activity; the concept of an artist presupposes a certain division of labor and a separation between functional and aesthetic principles in the design of artifacts; the concept of an educated person presupposes some institutionalization of the transmission of culture within a formal system of instruction; the concept of a bilingual person presupposes demarcation of boundaries between languages. With each of these terms we can often find plausible areas of application in a culture where the presupposed conditions do not obtain. However, in doing so we are not applying an impartial "etic" category, but projecting an "emic" category from another culture. In the process the original meaning of the term is stretched. An analogy is drawn between two different categories, just as it is when we describe a teacher as a manager in the classroom, or as a consultant to children in search of knowledge, or as a salesman of certain ideas. The notion of ethnocentric projection from one culture as the starting-point for interpretation of phenomena in another culture will be further developed in section 4.4 with reference to Gadamer's paradigm of translation between two languages.

3.4 From conceptual approach to the details of method and theory formulation

The usefulness of the "emic"-etic contrast as a guide to the formulation of methods and theories in cross-cultural psychology is the subject of continuing controversy. Several advocates have proceeded well beyond the broad, strategic considerations presented in sections 3.1 and 3.2 above to suggest that quite specific methodological guidelines can be derived from those considerations (e.g., Berry, 1969; Brislin, 1976 & Triandis, 1972). Jahoda (1977, 1983a) on the other hand has argued that these extrapolations have been marred by conceptual errors and muddled thinking, that the distinction is at best elusive and has become "a delusion and a snare in cross-cultural psychology" (1983a, p. 33). In the ensuing debate it emerged that neither Berry (1983) nor Brislin (1983) was strongly committed to a fully articulated version of the emic-etic formulation as a theoretical-methodological construct for organizing research, but that both of them shared with Triandis (1983) an enduring conviction that the terminology is useful, if only in a broad and metaphorical sense. I share this conviction with them for the reasons given above. But the critique mounted by Jahoda serves to bring into focus some dangers inherent in using it "as an over-elastic explanation" (Serpell, 1977d) and to clarify some related problems which the emic-etic formulation is ill-equipped to handle.

Jahoda's (1983a) first objection is that "the distinction was originally designed for the analysis of *systems* and ceases to be meaningful when applied to *variables*" (p. 33, italics added). It is true that Pike's (1967) account does not use the term "variable," but an examination of his text suggests the following set of relations among the various terms to which "emic" and "etic" are applied as contrasting qualifiers:

1. A standpoint implies a view and hence an approach to the enterprise of research.
2. In the course of research, data are categorized into units in accordance with criteria.
3. Different criteria are implied by, and reciprocally imply, different systems for the ordering and organization of data.

It would be wiser, as Jahoda suggests, to use the terms "emic" and "etic" only to characterize a researcher's standpoint, view, approach and criteria, and not to apply them directly to the resulting units or to the data themselves. On the other hand, it is not in my view really appropriate to apply the terms to a system itself in the sense in which cultural phenomena constitute systems. Rather the contrast concerns the relation between the researcher and a given system in the process of research.

A second strand of Jahoda's critique is that

... psychological usage of the terms is mainly non-reflexive, so that when applied to *techniques of measuring* as well as *that which is being measured*, contradictions result. This is because different levels of discourse are not kept separate, and one would need a meta-language to maintain the distinctions. (1983a, pp. 33-34, italics added).

The kind of loose thinking that Jahoda is attacking here is what has been called a "category mistake," in which certain facts are represented "as if they belonged to one logical type or category (or range of types or categories), when they actually belong to another" (Ryle, 1949, p. 16). Thus at one point Jahoda likens the expression "emic variables" to the expression "linear cubes" (1983b). The logical distinction central to Jahoda's argument is between a measurement technique on the one hand and the phenomenon or construct which is being measured on the other. Linearity is a characteristic of a system of measurement which can be applied to cubes, and we may speak appropriately of a linear measure (qua criterion), of linear scales (or dimensions) and of linear values on those scales, e.g., those obtained by applying the technique of linear measurement to a given cube. But none of this makes it appropriate to call the cube itself linear. In a similar vein,

even if it were useful to contrast "emic" with "etic" techniques of measuring social distance, it would be logically inappropriate to apply the contrast in the same way to the construct of social distance itself. In his reply to Jahoda's critique, Triandis (1983) makes it clear that indeed the contrast is used with a quite different meaning when applied at these two levels of discourse.

The context of the discussion is a classical problem for cross-cultural comparative studies - the search for functional equivalence across two or more cultural settings. As Frijda and Jahoda (1966, p. 116) put it, "if similar activities have different functions in different societies, their parameters cannot be used for comparative purposes." If we know that the meaning of a given objectively defined (i.e., nominally equivalent) behavior is different in culture A from its meaning in culture B, then a difference between groups A and B in the frequency or intensity with which this behavior is manifested should not be interpreted in terms of only one culture's meaning for that behavior. For instance, if maintaining eye contact is a sign of sincerity, openness and attentiveness in culture A but a sign of insolence and disrespect in culture B, researchers should not interpret the greater frequency of this behavior in cultural group A than in group B either as evidence of the greater insolence of group A or of the lesser attentiveness of group B. The behavior in question has a different function in the two cultures and is therefore unsuitable for comparative interpretation on a single scale.

A plausible application of the "emic"- "etic" contrast in this context is to designate as "emic" any relationship between observed behavior and a psychological trait which is specific to a given culture. Triandis (1983, p. 45) for instance explains that, on the Bogardus social distance scale, the item "to admit a person into one's neighborhood" does not have the same meaning in the U.S. and in Japan." An "emic" approach to scale construction would need to take account of the specific cultural meanings of scale items in arriving at an interpretation of the scale. On the other hand, a scale which, without modification, yielded equivalent measurements in different cultural settings might be termed "etic" by analogy with a phonetic transcription. So much for "emic" and "etic" types of measurement.

But Triandis goes further and asserts that "social distance is an etic construct that can be measured emically as well as etically" (1980, cited by Jahoda, 1983, p. 26). And as grounds for the assertion that the construct itself is "etic," he advances a quite different kind of criterion, namely that "the pattern of correlations among some of the

items is the same in each culture" and that "the pattern of correlations with outside variables are the same" (Triandis, 1983, p. 45). In fact, the very meaning of the construct of social distance is defined "through some form of construct validation, i.e., looking for similar patterns of correlation with antecedent and consequent variables." Thus, whereas an "etic" scale or measurement technique can be defined as one with nominal equivalence across cultures, an "etic" construct seems to be conceived here as one with functional equivalence. Now, as we have seen with the example of eye contact, the use of a nominally equivalent technique of measurement can certainly not guarantee the functional equivalence of what is measured by that technique in two different cultural contexts. Indeed, according to Triandis the functional equivalence of the construct "social distance" is partly to be assessed by the degree to which the scale has been modified for each culture to reflect an "emic" perspective: "measuring social distance after careful definition of the meaning of the continuum, with items appropriate for each culture, is etic" (Triandis, 1980, cited by Jahoda, 1983a, p. 26). The different conceptions of what makes a construct "etic" and a measure "etic" thus lead to the paradox that only if the measures are valid from an "emic" perspective can the construct be said to be cross-culturally "etic"!

At this juncture the discourse would surely benefit from restricting the application of the "emic"- "etic" contrast to just one of the two levels. By and large, the preference of most writers who advocate the use of the formulation seems to be to focus on "what is in the scientist's mind" (Triandis, 1983, p. 45), as a facet of the "research activity" of cross-cultural psychologists (Berry, 1983, p. 39) and the "specific research interests" (Brislin, 1983, p. 41) of people with various disciplinary backgrounds. I would therefore reiterate the recommendation that the terms "etic" and "emic" be confined to propositions about criteria and the approach, standpoint or view which informs the decision to use them. Additional reasons for avoiding the notions of "emic" or "etic" concepts and categories (which I allowed to enter my discussion of ethnocentric projections above) will be considered in section 4.1 below.

3.5 Different kinds of universal

The last of Jahoda's reasons for regarding the "emic"- "etic" distinction as "a delusion and snare in cross-cultural psychology" is that "we are often far from clear what kind of universals we are looking for" (1983a, pp. 33-34). This is a broad and complex topic of which only one dimension will be considered here. Given the origins of the analogy

there is a paradox about the way in which the "emic"- "etic" formulation has been applied by Berry, Brislin and Triandis. In the phonological domain from which the distinction emanates, the "etic" level of analysis is finer-grained and more elaborately differentiated than the "emic" level. A phonetic transcription of speech is narrowly focussed on minute shades of sound, while a phonemic transcription is designed to capture only the broad features of speech sounds as they are heard in the context of listening for meaning. Yet, if we consider the examples of possible candidates for the status of psychological "etics," we find broad, general constructs such as field dependence (Berry, 1969), need for achievement (Brislin, 1976) and social distance (Triandis, 1983). "Emic" measures of such constructs are characterized as lower-order elements in a hierarchy of conceptual abstraction, at the summit of which a "derived etic" is said ideally to "emerge, corresponding to all the common emic phenomena" (Berry, 1983, p. 40).

How has this reversal of grain size come about? I believe it arises partly from the systematic ambiguity about levels of discourse noted above. If the terms were used in psychology to qualify measurement techniques or tools, appropriate examples of "etic" procedures would seem to be the classification schemes adopted by ethologists for the impartial description of behavior in terms of microanalytic categories such as "eye contact," "head nod," "point," "shrug," etc. (cf. Blurton-Jones, 1972). An "emic" level of analysis might then proceed to define higher-order, meaningful categories of behavior such as "greeting," "teasing," etc. in terms of the particular groupings of "etically" defined elements through which they are expressed in a given culture. In such a research strategy, there would exist a rather straightforward analogy between linguistics and psychology. The universalistic standpoint of the theorist (cf. Table 1) is reflected in a technical view of the phenomena being observed, and the form in which the observations are recorded is alien to the intuitions of the actors since they would be disposed to categorize behavior into somewhat longer and more "meaningful" sequences. The only kind of universality claimed in this approach is that of the criteria used to classify the observations.

Berry (1969, p. 123), however, was apparently attracted by another kind of universality: "phonetics attempts to generalize from phonemic studies in individual languages to a universal science covering all languages." Examples of the kind of generalization he has in mind might be the principle of "natural assimilation," whereby a sound segment tends to become assimilated to neighbor-

ing segments in ways which are predictable from physical properties of the relevant articulatory features. For instance, when the prefix in- becomes im- in English words like imbalance, immense, impress, etc., a phonological description might say that the dental nasal sound /n/ has been assimilated to the neighboring labial sounds /b/, /m/ and /p/. This type of rule has been found useful in the description of many different languages, although the specific combinations of sounds to which the rules apply vary from one language to another. A more exciting theoretical generalization about all human languages is the ubiquitousness of what Hockett (1960) calls "duality of patterning":

The meaningful elements in any language - 'words' in everyday parlance, 'morphemes' to the linguist - constitute an enormous stock. Yet they are represented by small arrangements of a relatively very small stock of distinguishable sounds which are in themselves wholly meaningless. This 'duality of patterning' is illustrated by the English words 'tack', 'cat' and 'act'. They are totally distinct as to meaning, and yet are composed of just three basic meaningless sounds in different permutations. Few animal communicative systems share this design feature of language - none among the other hominoids, and perhaps none at all (Hockett, 1960, pp. 184-186).

These two linguistic generalizations seem to be on the same kind of plane as propositions of the form "individuals who are high on restructuring competence tend to be low on interpersonal competencies, and vice-versa" (Berry, 1981, p. 477), or "in all cultures those high in social distance" tend to be high in authoritarianism (Triandis, 1983, p. 45, actually completes this proposition with "have high scores on the F-scale"). Such broad generalizations have been proposed as "etic" in the sense of having transcultural generality or universal validity. But how is this type of "etic" related to the lower-level, fine-grain measuring techniques characteristic of the "etic" approach? The latter have sometimes been termed "discovery procedures" from which one might infer that they hold the key to discovering which of the higher-order generalizations have universal validity.

Unfortunately, the relationship between the two levels is much more complex and indirect. In the study of language, for instance, the principle of natural assimilation only comes to acquire the status of a general law by virtue of the fact that it recurs across a whole variety of language-specific (phonemic) descriptions. Likewise, it is precisely the explanatory usefulness of a phonemic level in the description of each and every human language (each different in its phonetic specifics from other languages)

which gives credence to the notion that duality of patterning is a design feature of human language in general. Analogies in cross-cultural psychology have not as yet been satisfactorily specified. Certainly, the lines of reasoning involved in these examples from linguistics do not seem to bear much similarity to the scheme outlined by Berry (1969) for cross-cultural psychology in terms of "progressively altering" and "matching" categories.

3.6 Limitations of the analogy

Jahoda's (1977, 1983) critique has identified a number of features of the emic/etic formulation which are either unclear or inapplicable to the tasks of cross-cultural psychological research as they are normally construed. And yet Berry (1983), Brislin (1983) and Triandis (1983) have made a case that the central contrast remains an important inspiration for their work—a view shared by several other researchers in the course of conversations at the 1982 and 1984 international conferences of the International Association of Cross-Cultural Psychology, and indeed by many of my students at the University of Zambia. In the preceding sections I have suggested that we should distinguish between the broad, strategic approaches evoked by the analogy and more specific methodological procedures, where the analogy seems to become strained. The elasticity with which the basic contrast has been applied has proved to be both an asset and a hazard - an asset for stimulating interdisciplinary exchange of ideas (Brislin, 1983), but a hazard which threatens to obscure rather than clarify the nature of the connections between those ideas.

At the level of specific methodology the analogy with phonetics is valuable as a reminder of the need for close attention to detail. The English phoneme /t/ must be analyzed into its liquid, palatal and unvoiced properties if we are to faithfully and impartially describe its relation to the Chi-Chewa /l(r)/ phoneme which is liquid and palatal but optionally voiced. A similar unpackaging of skilled performance in other behavioral domains is required for the cross-cultural investigation of cognitive functions. This is, however, only a beginning. The work of theoretical description involves proceeding to develop a higher-order system of classification. In phonetics the basis for such a system is provided by the physical structure and functioning of the vocal cavity and organs. But it is clear that quite different historical factors, as well as internal features of the language as a coherent, albeit multi-level system, also contribute to the structure of a given language's phonology.

Moreover, the search for principles to explain the patterning of behavior within and across cultural groups requires more than a set of categories. The complex of strategic considerations outlined in Table 1 provides little more than a set of vague hints about how to proceed beyond the preliminaries of fine-grain description towards the formulation of theoretical constructs and their systematic validation. The latter task calls for a formulation which is both more elaborate and more dynamic.

4. Competence and Self-Image in the Understanding of Behavior

In this section I shall argue that two essential ingredients for adequate explanations in cross-cultural psychology are the recognition of open-endedness in human competencies and provision for a conceptual linkage between the self-image of agents and their behavior.

4.1 Productive rules instead of static categories

The revolutionary ideas of Chomsky in linguistics have been widely discussed in psychology, especially as they pertain to the notions of competence and performance. The conceptions of deep structures which underly surface structures and of generative rules by which the latter are derived from the former are most often exemplified in the domain of word order. Essentially the same model, however, has been applied to the domain of phonology (Chomsky & Halle, 1968). A number of theoretical advantages can be claimed for this approach over earlier schools of thought and it has been highly influential (Fudge, 1970; Hyman, 1975).

Rather than describing the sound system of a given language as a set of fixed categories for filtering the physical continuum of speech sounds, a generative phonology proposes highly abstract representations of what the speaker knows (termed base underlying forms) and postulates a set of rules by which various surface forms are derived from them. Thus the contrasting pronunciation of the words "division" and "divisive" in English can be explained as the result of a series of steps in which the underlying phonological representations /divid + ion/ and /divid + iv/ are gradually modified. These steps are construed as the application of rules for adding, deleting or modifying distinctive phonetic features. In addition to taking account of neighboring sounds (as illustrated in section 3.5 for the principle of natural assimilation) the rules presuppose a knowledge of the morphological structure of the word (e.g., that both these words are derived from a root form /divid/ linking them to the word "di-

vide"). There is good evidence that native speakers do indeed have such knowledge, at least in some tacit sense. Moreover, a description in terms of underlying forms can provide important clues for understanding orthography in languages like English with a long written history (cf. Gibson & Levin, 1975).

Generative phonologists have argued that this new approach eliminates the need for the traditional concept of phoneme and the phonemic level in linguistic analysis. Strictly speaking, their attack is directed "against what has come to be known as the "autonomous" or "taxonomic" phoneme (autonomous because some phonemicists refused to admit grammatical information into their phonological analysis, and taxonomic because sounds were merely classified, ignoring important phonological generalizations expressible by rule)" (Hyman, 1975, p. 82). In a generative phonological description, constraints on the range of sounds which have significance in a particular language are formulated as rules specifying which values of a set of universal, phonetic distinctive features will occur in given environments. What sets the phonology of one language apart from that of another language is thus no longer construed as contrasting inventories of phonemic segments but rather as contrasting systems of rules.

As with other parts of a generative grammar, the phonological competence of a first-language speaker of a given language is held to consist of internalized rules, and comprehension is mediated by synthetic, reconstructive processes. If the account of first-language interference phenomena in section 3.3 is to be reconciled with this formulation of phonological competence, it will require a more complex characterization. What is projected from one language to another is not a passive filter through which speech sounds are selectively strained, but a more active system of rules for combining elementary features. Rather than merely shifting the boundaries between categories, the distortions of the second language should be understood as arising from the imposition of alien systematic rules. A number of interference phenomena can probably be accounted for much more precisely in these terms, especially when other diachronic and sociological dimensions of language contact are also taken into account (e.g., Selinker, 1972; Pride, 1982).

Several general features of the generative grammatical approach to the description of language have been emphasized by Chomsky (1968) as carrying implications for the development of psychological theory. Performance, he argues, cannot be adequately explained without characterization of underlying competence. And the nature of such competence includes a creative dimension.

Descriptions in terms of rules have the advantage of capturing the patterning of behaviour without implying complete predictability.

It is important in this respect to recognize a distinction between "constitutive" and "regulative" rules. The rules of a grammar (contrary to the suppositions of many pupils subjected to a highly prescriptive style of instruction) are not the arbitrary dictates of a tyrannical teacher designed to enforce conformity. They are, in fact, a formalization of what constitutes the process of linguistic communication. Searle (1965) illustrates this notion of constitutive rules by analogy with the game of chess. The game itself makes sense only in terms of the set of rules on which the players agree, and a decision by one party to depart from those rules (e.g., by moving a castle along a diagonal path) is not just naughty or unfair, it is uninterpretable as part of the game. The case is quite different for regulative rules which may be adopted at the discretion of the players, e.g., that a move may not be withdrawn after the player has let go of the piece. Such rules are extrinsic and incidental to the game of chess itself.

The notion of constitutive rules can be applied to culture in a variety of ways. Within Rohner's (1984) taxonomy of anthropological theories of culture, the most straightforward analogies with language seem likely to be found in the nominalist, ideational camp. The bearers of a given culture share a set of "equivalent and complementary learned meanings maintained by a human population, or by identifiable segments of a population, and transmitted from one generation to the next" (Rohner, 1984, pp. 119-120). The sense in which an individual shares in such a system of meanings may perhaps be more satisfactorily characterized as having internalized a set of constitutive rules than as having adopted a set of categories. For instance, strong versions of the Whorfian hypothesis have been shown to exaggerate the extent to which an individual's perception of the world is restricted by categories encoded in his or her (first) language (Fishman, 1960). On the other hand, it seems that an understanding of the semantic potential of such categories, of how the concepts are interrelated and of what would be the meaning of applying them in various ways and various contexts is a culturally distinctive body of knowledge. We may describe such knowledge as a form of competence characterized by rules which govern the form of potential application of concepts, without delimiting the ultimate range of such applications.

D'Andrade (1984), who also favors the description of cultural meaning systems in terms of constitutive rules, has pointed out that there exists an intimate "interlocking"

between the representational function of cultural meanings and their directive function. For instance,

in the world of property, if an object is sold, this means the seller no longer has certain rights over the object. Such entailments come as part of the very definition of the entity, so that what is being constructed is not just an object, event or relationship but is also a set of rules about what follows, given that something counts as that object, event or relationship (p. 94).

However this does not bind participants in the culture irrevocably to act in predetermined ways, since there is often room for debate about what counts as an instance of the cultural entity constituted by such a set of rules. "Indeed, some of the deepest social conflicts occur over the scope of a particular constitutive rule" (op. cit., p. 94), such as the debates concerning the rights of "unborn children", of prisoners convicted of crimes committed in the context of civil "war" or "terrorism." etc.

Harré (1979) has elaborated an application of the notion of rules to the domain of social competence. In his formalization, rules serve as "templates" for the "genesis" of socially meaningful action. Social propriety is construed as formally analogous to linguistic well-formedness, in the sense that an insider's judgments of propriety can serve as a criterion for whether a rule-based "grammar" of social activity adequately represents the tacit conventions of the culture. Harré argues that the rules underlying such conventions are often more directly accessible to socially competent participants in the culture than are the grammatical rules underlying linguistic competence, and discusses a number of interesting ways in which such shared knowledge is deployed in processes of "accounting" for social behaviour.

With this more elaborate conceptualization of what constitutes culturally specific knowledge, the notion of ethnocentric projection calls for a contrastive analysis not just of the lexicon for categorizing elements in a domain but also of the system of rules for interpreting their application in various contexts. Thus a contrastive analysis of rural Chewa and urban American perspectives on intelligence might begin with an account of how the various terms available within each culture can be used to express a variety of distinctions in a range of contexts circumscribed by recurrent practices in each society (Serpell, forthcoming). As a result the range of behaviors described and assessed would differ partly because of objective differences between the two ecosystems within which these cultures function. Each cultural system of

meanings, however, is essentially open-ended, so that a person competent in the system is equipped with ways of representing completely unprecedented behaviour. The adequacy of such a representation cannot be prejudged but would depend on the success with which it served the communicative goals of the author. Strategies for achieving such success will be discussed in section 5.

4.2 Reasons for introducing a hermeneutical approach

At bottom (as I noted in section 2.3) the concern with accountability to the subjects of study as an audience is an ethical one, which acquires political connotations in the programme of national or indigenous psychologies designed to respond to the interests and aspirations of a particular social group (cf. section 3.2). The question has been posed whether a "developing" Third World country stands to benefit from psychological research (Jahoda, 1973), and Third World scholars are often asked to pass judgement in such terms on the social "relevance" of projects proposed by visiting researchers from abroad (Kashoki, 1978; Serpell, 1980). In some cases the motives of foreign researchers appear to confound intellectual and political considerations (Warwick, 1980). Conversely, state authorities may tend to mask the diversity of interest groups within their boundaries. Third World social scientists are at least as vulnerable as elsewhere to seduction into alliance with oppressive social forces. Many cases in which such issues are raised allow of no definitive answers. What constitutes valuable knowledge depends on the frame of reference from which the topic is approached, and increasingly social scientists are expected to justify their proposals from a multiplicity of perspectives.

Habermas (1978) distinguishes three different types of "knowledge-constitutive interest": a technical interest, which informs the empirical-analytical sciences and which seeks to secure "control over objectified processes;" a practical interest, informing the historical and hermeneutical sciences, which seeks to preserve and expand the "intersubjectivity of possible action-orienting mutual understanding;" and an emancipatory interest in "autonomy and responsibility" which he sees as the proper motivation for critically-oriented philosophy. The likelihood of direct conflicts of interest between investigators and their subjects appears to be greatest when the former conceive of their work in terms of the empirical-analytical framework whose central thrust is towards control over objectified processes. A hermeneutical approach, on the other hand, makes possible a confrontation between the interests of the international scientific community and the

interests of the people whose behaviour is studied. Construing the subjects of psychological research as self-conscious and autonomous agents is a pre-requisite to becoming accountable to them.

The practical interests which a subject may have in sharing the scientist's understanding include greater self-control and greater articulateness in dialogue with powerful outsiders concerning policies and actions which have a bearing on her well-being. Such outsiders may include any person or group whose interests are demonstrably independent of those of the socio-cultural group under investigation, e.g., national political and commercial groups, as well as foreigners. Ensuring the intelligibility and recognizable relevance to one's subjects of the research undertaken is a pre-requisite to their appropriating the knowledge which it generates. On a practical plane it is clear that the layperson in every society "expects that the understanding which the psychologist offers will bear some relation to the understanding he himself already has. If the psychologist offers explanations which bear no relation to this, or suggests or implies that his everyday understanding is of no significance, the layman is inevitably puzzled or dissatisfied" (Joynson, 1974, p. 14). But in order to enhance that self-understanding, the theorist is also expected to add something new.

The logical relationship between what must serve as a starting point and the new, improved understanding to which the theorist should aspire is problematic. Winch's (1958) polemical analysis of *The Idea of a Social Science* contends that the theorist's account should be "grounded in" the participant's understanding, that it must logically "presuppose" it, that it must "take it seriously," and that it implies a previous understanding of the participant's own understanding. None of these formulations, however, specifies the nature of the incremental process involved.

Wittgenstein's (1958) *Philosophical Investigations*, which inspired Winch's analysis, make extensive use of the notion of "language games." Rather than construing the meaning of a given proposition or expression as some kind of relationship with the objective world, he suggests that it can be better understood in terms of the contexts in which it is used and the range of appropriate reactions to it, thus situating it as part of a culturally patterned form of life within which behavior, including the use of language, is governed by rules. It is the rules of such language games that constitute the framework within which propositions are understood and evaluated.⁹

Winch (1958) extends this formulation to other culturally patterned activities and argues that the rules gov-

erning behavior are grounded in an implicit interpersonal agreement among the participants. Any social scientific account of such activities must capture the essence of that interpersonal agreement, for to disregard it is to deny the essentially social nature of the phenomena being interpreted.

Certain phenomena have been explained in the physical sciences in radically new ways, previously inconceivable to the public whose lives they affect. The Copernican revolution in the way we interpret the relative movements of the earth, the moon and the sun is a well-known example. The search for universalistic explanations of behavior is sometimes justified by analogy with this success story from astronomy. But as Taylor (1971) has argued, there is an essential difference between conceptualizations of physical and social phenomena: "the vocabulary of a given social dimension is grounded in the shape of social practice in this dimension; that is, the vocabulary wouldn't make sense, couldn't be applied sensibly, where this range of practices didn't apply" (p.24).

The most obvious examples of this problem are institutionalized social roles such as the Christian 'godfather' or the *banacimbusa* in Bemba rural custom (who begins her relationship with a child as the midwife in attendance at the child's birth and retains certain obligations and privileges as the child grows up (Richards, 1956)). Less formally defined are certain distinctive opportunities arising from cultural convention. Thus Enriquez and Marcelino (1984) make it clear that the concept of *saling-pusa* cannot be equated with that of "gate-crasher," "hanger-on" or "along for a ride:" "an individual who is simply *saling-pusa*" is included in that activity only in an informal and unofficial sense. He cannot be outrightly excluded from the activity, however, because Filipinos always avoid hurting the feelings of others" (pp. 30-31).

A more complex account is needed to explain why the notions of *nzelu* and *tumikila* in Chewa culture have no precise equivalents in English (Serpell, forthcoming). But its nature is well summarized by Taylor's observation that "the vocabulary ... is grounded in the shape of social practice." It is important to recognize that the problem runs deeper than sheer availability of terminology. It will not do, for instance, to say that the English and Chewa cultures merely have different vocabularies for describing intelligence, since the notion of intelligence is grounded in a different set of social practices. A culturally appropriate psychology for rural Chewa society needs a theory of *nzelu*, not a theory of intelligence.

Examples of this nature are perhaps easier to find with respect to contrasts between cultures which have only relatively recently been the subject of systematic attempts at mutual interpretation. The degree of mutual intelligibility of English and French or of British and American cultures is probably systematically and non-coincidentally greater than that which obtains between English and Chewa or between American and Philipino cultures. Nevertheless, the persistence of areas of difficulty in communication across the more extensively explored boundaries (or is gulfs a better metaphor?) between English culture and its French and American cousins should serve as a reminder that neither mutual respect nor linguistic affinity is a sufficient condition for such difficulties to melt away. A striking example for the present writer, while growing up on the interface between English and French culture in the 1950s was the difficulty (in fact, in my own experience total impossibility) of communicating to a friendly and sympathetic, monolingual French audience the amusement value of what the English call "shaggy dog stories." Brands of humor, like styles of painting and musical forms acquire the temporary status of being in vogue by a subtle process of negotiation such that their following rejoices in the novelty of the form while also deriving reassurance from its partial familiarity. Visitors to the U.S.A. from Britain often express bewilderment at the enthusiasm expressed by their American friends for baseball or American football, while visitors in the other direction are often bemused by similar attitudes among their British hosts towards cricket. This is, however, an easier area of disagreement to handle than jokes, since the closed, rule-governed nature of games is readily understood and invoked as an explanation for the communication breakdown.

The purpose of Wittgenstein's (1958) exploratory discussions of various types of language game has been described as "therapeutic:"

to exhibit, indirectly, facts about language that are already familiar, to make us conscious of the functioning of our language games in order to break the hold upon our minds of philosophical confusions and paradoxes. For this task there is no need to appeal to any 'metalinguage'; the grammars of language games can be elucidated 'from within' by a reflective application of the grammars themselves (McCarthy, 1978, p.166).

According to Winch (1958), this process of "tracing the internal relations" of a system of ideas is a more appropriate model for social scientific explanation than the paradigm borrowed from natural science which con-

strues explanation as the "application of generalizations and theories to particular instances" (p. 133). But his account fails to explain either how the theorist can gain access to the subject's system of ideas, or how she can extend the self-understanding of the subject beyond what he already knows. Since both the theorist and the subject can only express their knowledge through the medium of a language game, the investigator needs to find a way to mediate between two different language games. As Habermas puts it, the case of the foreign ethnographer highlights the nature of the problem: "finding one's way into an alien culture is possible only to the extent that one successfully translates between it and one's own" (1967, translated and cited by McCarthy, 1978, p.168). The paradigm of translation will be considered in more detail in section 4.4, and its implications for the possibility of expanding the participants' self-understanding will be explored in section 5.

4.3 Dilemmas of relativism

The general approach to cross-cultural psychology adopted in this paper corresponds to the philosophical position called "perspectivism," where a perspective is defined as:

a more or less closely related set of beliefs, attitudes and assumptions that specify how reality is to be understood. They concern the appropriate field of observation, the proper domain of explanation (that is, where to seek it, and when to regard it as sufficient), the necessities and possibilities of social life and how the self and its relation to society is to be conceived and human interests identified (Lukes, 1982, p. 301).

I have argued in earlier sections that at the very least in psychological theory "interpretation and explanation must make reference to actors' perspectives" (op.cit., p. 302). The logic, however, seems to point also towards a more fundamentally relativistic conclusion "that there can be no perspective-neutral interpretation and explanation" (op.cit., p.302)

This "strong" version of perspectivism poses a number of difficulties for applied psychology. A practicing psychologist has a professional obligation to formulate prescriptive statements based on the best evidence available. If inter-subjective meanings are construed as the primary defining criteria for social facts, what line of action should the practitioner prescribe in cases where her own interpretation of the relevant social facts differs significantly from that favored by the subjects whose behavior is involved? Prince (1980), for instance, argued on the

one hand that the type of explanation for mental illness proposed by psychoanalytic theory is qualitatively superior to the symbolic formulations of unconscious motivation indigenous to various non-Western cultures, and justifies his conclusion on scientific grounds. Yet he concludes that in the absence of "a high degree of psychological mindedness" (pp. 335-336) the psychoanalytic form of therapy is inapplicable, and that in many non-Western cultures "trance states, religious experiences, and micropsychoses in the service of therapy have a much wider application" (p. 339). Behind the pragmatism which seems to justify such a decision lies an unstated value judgement which condemns those who adhere to certain cultural perspectives to a form of therapy which the therapist regards as technically inferior.

A similar dilemma confronts the educational practitioner in a still more poignant form when deciding what kind of education is best for the children of a rural African community. On the one hand she may be convinced by arguments in favor of a number of crucial curriculum components and pedagogical principles developed in the context of a modern, industrialized society. Yet several of these ingredients of an ideal education may seem to be not only impracticable but also counter-productive as a preparation for life in the community into which these children were born. If she decides on relativistic grounds to eschew those ingredients as inappropriate, the objection can be raised that she is discounting the possibility of social change, and indeed neglecting her responsibility as a broker of technical knowledge to contribute to the guidance of such change in a "progressive" direction.

A second kind of difficulty for perspectivism arises in the context of egalitarian, multi-cultural societies. Legislation to protect freedom of religious worship, choice of attire, diet, etc. may seem to be inspired by relativistic principles. But unless strict segregation between cultural groups is envisaged, provision has to be made for the resolution of conflicts between adherents of different cultural perspectives. Of course, as often happens in practice, the government could decide to impose the standards of one culture over those of others. But this appears philosophically arbitrary. What is required is some common ground on which an impartial resolution of conflict can be based. Also, in such a society public education is expected to cater within integrated schools for children from diverse cultural home backgrounds, and to cultivate mutual respect and tolerance among them. As Zec (1980) has pointed out, "if inter-cultural understanding is to be an aim of multi-cultural education, it cannot develop solely on the basis of the notion—however well-meaning—that cultur-

ally different beliefs, practices, values and so on, are in principle incommensurable" (p.84).

Yet a further challenge for perspectivism is posed by the phenomena of individual biculturalization. Beliefs and practices which appear to "belong" to two contrasting cultural systems often coexist within the cognitive and behavioral repertoire of a single, multi-cultural individual. While some writers have interpreted this as a condition fraught with internal conflict and frustration (e.g., Kavadias, 1966; Turnbull, 1962), others have portrayed it as an adaptive kind of flexibility in urban, Third World societies (Jahoda, 1970; Serpell, 1978, 1982). Not only can different cultural perspectives coexist harmoniously within a multi-cultural community, but they are also amenable to various forms of psychological integration within a single person.

Finally, in addition to its morally unsatisfactory advocacy of double standards and its inability to account for certain social and psychological realities, the philosophical position of cultural relativism can be charged with a tendency towards paralysing investigators who wish to explore the application of existing theory beyond its present culturally narrow data base. For there seems to be an infinite regress of relativistic questions which can be posed to undermine the validity of any research findings which purport to show substantive cross-cultural differences. For instance, when a researcher presents evidence that the assessments of intelligence generated by Western-type tests do not conform with assessments by rural A-Chewa adults, he may be asked:

- do parents in that community normally assess or monitor the progress of their children towards certain goals?
- or - do people in that community ever compare one individual to another in terms of capabilities, dispositions or other qualities of mind, as opposed to looking at the group's behaviour and products?
- or - does the enterprise of assessment have any pertinence within that culture?

Each of these questions has been addressed to me by an experienced and thoughtful researcher of Western cultural origins, and I was tempted in each case to answer "yes, of course." But on a philosophical plane such an answer is no more adequate than Samuel Johnson's notorious attempt to refute Bishop Berkeley's arguments for the non-existence of matter by kicking a stone (Boswell, 1799).

A very helpful approach to the resolution of these problems has been advanced by Horton (1982) in a reformulation of his earlier, much debated analysis of the similarities and differences between "African traditional thought and Western science" (Horton, 1967). He suggests that we should recognize two major levels of thought and discourse used by people to explain the world. Primary theory constitutes an overall framework common to all humanity: it postulates a world filled with middle-sized, enduring, solid objects, interrelated in terms of a "push-pull" conception of causality and distinguishes sharply between the self, other human beings and other objects. "The entities and processes of primary thought are thought of as directly 'given' to the human observer" (p.229), but there is a great deal in everyone's experience which this level of theory cannot explain. And it is at the level of secondary theory that we encounter "startling differences in kind" between cultures. In fact, "the diversity of world-pictures presented by secondary-theoretical discourse ... is such that it almost defies any general characterization", except that the entities and processes it postulates "are thought of as somehow 'hidden' ... [and] present a peculiar mixture of familiarity and strangeness" (p. 229).

Because of its transcultural commonality, primary theory "provides the cross-cultural voyager with his intellectual bridgehead" (p.228) - that is, with some preliminary common ground which guarantees mutual intelligibility between two interlocutors with different cultural perspectives. Moreover, in all its diverse forms, secondary theory is derivative from its primary counterpart in several ways, notably that "development of ideas as to the character of the 'hidden' realm is based on the drawing of analogies with familiar everyday experiences as described in primary-theory terms" (p. 230). Thus in many cultures supernatural entities are conceptualized in terms analogous with human action and interaction, while the explanatory constructs of Newtonian physics were developed on the basis of analogies with colliding balls, water waves, etc. The importance of analogy in the comprehension and acceptance of psychological theories will be discussed in section 5.

Thus a belief in the fundamental "psychic unity of mankind" (cf. Jahoda, 1982) can be reconciled with cultural perspectivism, through the recognition that despite their differences all peoples' conceptions of the world share a common core of universal primary theory. The defining properties of primary theory remain somewhat elusive: in addition to the sense of being directly "given" these aspects of conceptualization appear to "emerge"

from our experience with a sharply defined structure (Lakoff & Johnson, 1980).

This structure no doubt has to do with the biological structure of the human body as well as with the physical structure of the "external" world. It may also reflect aspects of human communication which are universal across cultures. The spatial orientational concepts "up-down," "front-back" fit in obvious ways the human body's relationship with the physical environment. The coordination of gaze in early social interaction between infants and their primary caregivers lays the pragmatic foundations for deixis which in turn serves to anchor reference in linguistic communication (Trevathan, 1980; Bruner, 1975). Children also appear by a very early age to have a mental model of what constitutes a person that includes assumptions of a shared repertoire of sensory and emotional experiences, of intentionality, of capacity for adaptive learning, and for communication (Shields, 1978). These assumptions remain available for adults as resources for cross-cultural communication and could be used to explain why the semeiotic meaning of some manual signs are more "transparent" than others, while others are merely "translucent" (Kiernan, 1985) in the sense that their meaning is easy to grasp once their rationale is explained.

Moreover, this shared theory bears a systematic relationship to the secondary theories which set cultures apart. For the therapist and the teacher this formulation provides hope for negotiating a form of accountability consistent with the standards of both her client's culture and her own. For the social planner it provides hope for the harmonious coordination of multiple perspectives within a multi-cultural society. And for cross-cultural psychology it provides grounds for believing that the cognitive systems of different cultures are in some way mutually penetrable.

4.4 Interpretation as a form of translation

If a psychological explanation is to contribute to the self-understanding of the person whose behaviour or experience it interprets, the author needs to penetrate that person's cultural perspective. Analysis of a perspective in terms of rule-constituted language games helps to explain how the indigenous participant in the culture acquired her competence. It is, however, unrealistic to expect every cross-cultural voyager, even if she is a committed researcher, to recapitulate that learning process. This is not just because of limited time: the adult who engages in research is no longer a naive beginner but has been fully socialized into a different cultural perspective. As a result

the interpreter is bound to begin with the projection of a set of concepts and rules derived from her own culture and which to some extent will prove to be inappropriate.

One field of enquiry which has paid a great deal of attention to this problem is that of translation. The tradition of classical European scholarship during the 18th and 19th centuries, of which traces are still alive, centers around the interpretation of a culture far removed in time, for which the main source of evidence is a body of literature in ancient Greek and Latin, which has influenced the form of the various contemporary European cultures in extremely complex ways over a period of some two thousand years. Gadamer's (1975) approach to the topic of translation emerges from that tradition and is therefore much preoccupied with the interpretation of texts. His analysis however includes a wide-ranging exploration of the foundations of meaning in all the human sciences, and has been taken up by a number of philosophers as offering important insights for the understanding of social action.

Central to Gadamer's analysis is the theme that human understanding is historically situated, a product of a particular set of social and cultural circumstances. In order to understand a text or statement by another person, the listener/reader must acknowledge the specificity of her own frame of reference, or as he terms it "horizon": "the range of vision that includes everything that can be seen from a particular vantage point" (1975, p. 269). Acknowledging it includes recognizing that it is historically and culturally specific, and therefore systematically different from that of the author whose text is to be interpreted, and that there is no way for the interpreter completely to escape her own horizon. The preconceptions and prejudices arising from the interpreter's own culture of primary socialization are only objectionable to the extent that they are imposed unselfconsciously on the foreign material. It is in fact illogical to propose that the interpreter should detach herself completely from all preconceptions since there is no such thing as an interpreter without a perspective. "Interpretation is always a hermeneutic mediation between different life-worlds," each of which is a product of particular socio-cultural conditions and is "caught up in the movement of history" (Gadamer, 1975).

The mark of a successful interpretation then is not that it constitutes some ultimately correct, detached explanation which stands outside the cultures of author, subject and audience, but rather that it has achieved what Gadamer terms "a fusion of horizons":

The interpreter, like the translator, must capture the sense of his material in and through articulating it in a symbolic framework different from that in which it was originally constituted as meaningful. And as the translator must find a common language that preserves the rights of his mother tongue and at the same time respects the foreignness of his text, so too must the interpreter conceptualize his material in such a way that while its foreignness is preserved, it is nevertheless brought into intelligible relation with his own life-world (McCarthy, 1978, p. 173).

When applied to the interpretation of human action, this analysis appears to offer a resolution of the problems outlined in sections 4.2 and 4.3 above for the psychological interpretation either of behavior in general within another culture or of the behavior of an individual whose cultural presuppositions are different from those of the interpreter.

A Gadamerian perspective entails that ... understanding of the action is neither an appropriation of the actor's concepts nor the imposition of the interpreter's categories, but a fusion of the two into a distinct entity: the interpretation (Hekman, 1986, 147).

One way of arriving at such a fusion may be construed as a form of negotiation in the course of dialogue (cf. Gumperz, 1982; Serpell, 1977c). Interlocutors can arrive at a consensus that they are mutually comprehensible through a variety of *ad hoc* discourse strategies. In the case of theory formulated for publication, the process may be likened to that of translating a text, which according to Gadamer has a "hypothetical and circular character". From the perspectives available to him, the interpreter makes a preliminary projection "or sketch (Vorentwurf)" of the sense of the text as a whole. With further penetration into the details of his material, the preliminary projection is revised, alternative proposals are considered, and new projections are tested" (McCarthy, 1978, p. 172).

The end product of such a series of revisions may evoke Berry's (1969) conception of a "derived etc.," but it has no pretensions to universal validity. It is more akin to the outcome described by Gombrich (1960) in his analysis of "visual discoveries" in the history of art: the painter "enriches our experience because he offers us an equivalence within his medium that may also 'work' for us." And in the validation of this discovery process, a skeptical audience becomes the artist's "partner in the game of equivalences" (Gombrich, 1960, p. 276). The possibility of translation between languages presupposes at least a common thread of reason among them, perhaps

related to Horton's notion of primary theory. But each fusion of horizons is construed by Gadamer as radically situation-bound. His account therefore suggests that cognitive theories which lay claim to transcultural universality are almost certainly biased towards the particular concerns of one or two cultural perspectives. Examples of how such a critique can be developed are Buck-Morss' (1975) portrayal of Piaget's genetic epistemology as reflecting the dominant mode of production of "Western" industrialized societies, and the critical probing by Edwards (1982) of Kohlberg's unidirectional theory of moral development.

One of the criticisms that has been voiced of Gadamer's radical perspectivism is that it appears to trap the interpreter within a cultural tradition in a way which would seem to preclude the possibility of revolutionary change. On a socio-political plane, this argument can be related to D'Andrade's (1982) observation, cited in section 4.1, that rule-constituted cultural meaning-systems imply directive entailments. Szasz (1961), Tomlinson (1982) and others have pointed to the tendency for the constitutive rules defining concepts such as mental illness and mental retardation to be stipulated and defended by powerful professional groups in society, with potentially oppressive consequences for the individuals "described" or classified in that way. How does the reinterpretation of individual cases proceed if interpretation is always bound to the perspective of a culturally defined system of meanings? On a scientific plane, the same question arises for the establishment of a new "paradigm" (Kuhn, 1962).

Partly motivated by such emancipatory concerns, Habermas (1967, 1977) has contested the inevitability that understanding must always be radically situational:

To be sure, knowledge is rooted in actual tradition; it remains bound to contingent conditions. But reflection does not wrestle with the facticity of transmitted norms without leaving a trace... Reflection recalls that path of authority along which the grammars of language games were dogmatically inculcated as rules for interpreting the world and/or action. In this process the element of authority that was simply domination can be stripped away and dissolved into the less coercive constraint of insight and rational decision (1977, p. 358).

More specifically, the theoretical systems proposed by Chomsky, Kohlberg and Piaget

...are based on more than normal competence; they draw on systematically generalized empirical knowledge be-

yond that available to the competent speaker as such. This knowledge frequently makes quasi-causal explanations of social phenomena possible. It also reduces the context-dependency of understanding; that is, the preunderstanding that functions in any attempt to grasp meanings can be theoretically grounded and methodologically secured (translated and cited by McCarthy, 1978, p. 191).¹⁰

The logic by which scientific theory and methodology are held to "secure" our pre-understanding, rendering it less arbitrary and less context dependent has been expounded by Habermas (1984, 1987) in his theory of communicative action. In its most recent formulation the theory distinguishes three types:

These are, in summary : (1) that it fits with the objective world (propositional truth, effectiveness or instrumental success); (2) that it is "right" in the sense of according with social norms or expectations given the context of its utterance; and (3) that it genuinely expresses the subjective state of mind of the actor, i.e., is sincere or authentic. In each of these domains Habermas has sought in an elaborate way to reconstruct this pre-theoretical knowledge in the form of rules which constitute the abstract conditions for reaching a rationally valid consensus.

But even to his sympathetic expositor McCarthy, it seems the theory,

while introducing theoretical elements into the interpretive process and thus mitigating its radically situational character, does not entail replacing the hermeneutical orientation of the partner in dialogue with a purely theoretical or observational attitude. Even armed with this theory, the critical theorist can claim no monopoly on truth; critique cannot be pursued in isolation from the attempt to come to an understanding with others. In short, it remains the case that 'in a process of enlightenment there can only be participants' (McCarthy, 1978, pp. 35-37).

5. Models, Analogies and Metaphors

The argument of this paper so far has been concerned to show that the emic-etic formulation was in one important sense misconstrued as a problem of methodology. My conclusion from our excursus into the philosophy of social science is that the search for an ideal method of representing the ideas of an insider of another culture is misguided, since there is no such thing as an ideal outcome. Rather than searching for an Olympian view, our empirical research should be directed towards a negotiated fusion of horizons, a merger of different language-games. In this final section of the paper I shall argue that for such a search, sharp

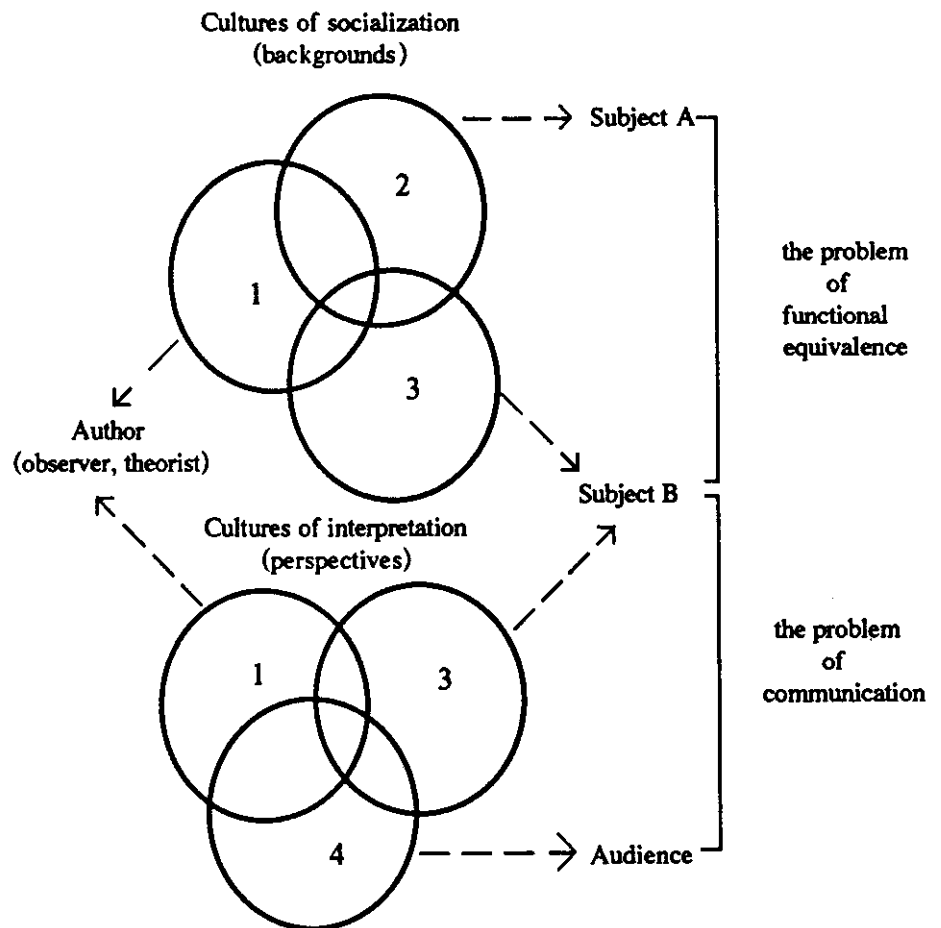


Figure 1. Two views of the problem of cultural differences in psychology

formulations will in general be less useful at the outset than figurative sketches of hypothetical commonalities. In the design of such sketches the use of analogy is essential and this requires the theorist to exploit the metaphorical dimension of human thought.

The discussion of earlier sections has gradually shifted attention from one focus on cross-cultural differences in psychology to another. These are shown diagrammatically in Figure 1. The focus on functional equivalence is illustrated at the top of the figure. As we saw in section 3.4 this concerns the question of how to relate differences in behavior or experience between subjects A and B to differences between cultures 2 and 3, which are construed as influencing the subjects' development through the process of socialization. The asymmetry whereby the culture of the author's own background (culture 1) is more similar to that of subject A than to that of subject B poses the methodological challenge of how to identify antecedents in

culture 3 of the behavior and experience of subject B. (Indeed so important is that asymmetry in many accounts of this focus that it could even be illustrated with only two circles, by merging circles 1 and 2 to represent the idea that author and subject A share a single culture.)

The bottom part of the figure illustrates the problem of communication we have been considering in section 4. Here the three cultures are construed as alternative frames of reference (or perspectives) for interpreting the behavior and experience of subject B. Not only does the author's cultural perspective (1) differ from that of the subject (3), but there is the additional problem of how to relate their two perspectives to that of the audience (4) to whom the author's message is addressed. The challenge here is how to maximize the convergence (or fusion) among these three perspectives, each of which is afforded by the viewpoint from a different apex of the reflexive triangle described in section 1. Note that this formulation would

apply in essentially the same way to the interpretation of subject A's behavior/experience. It is however considered more difficult to achieve such a convergence in those cases where the author's preexisting culture has less in common with that of the subject and/or with that of the audience.

Following Gadamer's paradigm of translation, I propose that the ethnocentric projections discussed in section 3.3 are a necessary first step towards a valid interpretation of any other person's behaviour/experience, and that the author's goal should be a studied articulation of what the author, subject and audience have in common. The difficulties inherent in this articulation arise in part from the uncertain status of common sense knowledge discussed in section 3.2, and partly from the cultural specificity of the meaning systems discussed in section 4.1. I suggested in section 3.2 that when we speak of "common sense" we assume that we have in common with almost any human audience a core of (a) basic logic, (b) physical world ontology and "push-pull" causality and (c) presuppositions about the nature of human perceptual and emotional awareness, practical efficacy, intentionality and adaptability. Each of these assumptions is debatable and has been investigated in published cross-cultural research, but the conclusions from those studies have all tended to be controversial, mainly because of the methodological problem of functional equivalence.

In section 4.1, I suggested that an individual with insider's knowledge of a culture may be characterized as having internalized a set of constitutive rules which specify the meanings particular to that culture. Each cultural system of meanings is conventionally applied within a range of contexts circumscribed by recurrent social practices, but is essentially open-ended, so that a person competent in the system is equipped with ways of representing new forms of behaviour and experience. Within this framework, we may now consider how a theorist can most appropriately address the task of interpreting the behavior and experience of a subject in ways which are intelligible, enlightening and empowering to the subject qua self-conscious and responsible agent, in ways which are intelligible and convincing to a selected audience, and in ways which advance the author's own progress towards her chosen theoretical goals.

To some extent the last of these considerations is bound to take precedence over the others. But the arguments developed in section 4 imply that the enterprise of theoretical psychology has an intrinsic interest in connecting its interpretations with those of the subject and that the

validation of social scientific explanations requires the author to negotiate a common understanding with her audience.

An early formulation of the problem of innovative communication was phrased as follows by Barfield (1947):

Every man, certainly every original man, has something new to say, something new to mean. Yet if he wants to express that meaning ...he must use language - a vehicle which presupposes that he must either mean what was meant before or talk nonsense! (p. 67).

Barfield went on to suggest that the semantic device of metaphor enables an author to transcend this dilemma by "talk(ing) what is nonsense on the face of it, but in such a way that the recipient may have the meaning suggested to him" (op. cit., p. 67). This potential has recently been explored in detail by Lakoff and Johnson (1980).

Metaphors are a somewhat mysterious resource for communication and their status has proved difficult to define. Some of their salient characteristics are as follows:

Metaphor requires the establishment of an analogy for its interpretation (Fraser, 1979, p. 177).

The hearer has to figure out what the speaker means ... by going through another and related semantic content from the one which is communicated (Searle, 1979, p. 123).

Similarity is the principle of inference ... on the basis of which speakers produce and hearers understand metaphor (op.cit., p. 100).

Although readers must take the metaphor as true in the world they are trying to synthesize from the text, they can only understand that world if they can find a basis in the real world that might have led the author to think of the metaphor (Miller, 1979, p. 248).

Each of these properties is shared with the notion of an explicit model. Metaphors, however, are much less precise, and this imprecision may be a crucial strength in the process of expanding the audience's understanding of the topic represented. By evading the obligation to be precise, a metaphor can fix a new domain of reference without explicitly defining it. At the same time the partial focus achieved by this "non-definitional reference-fixing" (Boyd, 1979, p. 368) can serve to "indicate a research direction" (op.cit., p. 406).

This "programmatic open-endedness" of scientific metaphors is construed by Boyd as a means to the

objectivist end of eventually "arranging our language so that our linguistic categories cut the world at its joints" (op.cit., p. 358). Other philosophers doubt whether the "real world" is ultimately knowable in this sense and hold that the most we can hope for is a progressive "accommodation of language and experience" (Kuhn, 1979, p. 419). Be that as it may, from a perspectivist position metaphors can be seen as helpful devices, once again because of their imprecision, for "building a bridge" between alternative world-views which could "help to make the two views intelligible by emphasizing, or even inducing, a similarity between them" (Pylyshyn, 1979, p. 426).

The concept of metaphor is conventionally associated with literary rather than scientific activity. As Bruner (1986) has recently observed, when metaphors contribute to the process of model-making in science, there is a tendency to treat them as

...crutches to get us up the abstract mountain. Once up, we throw them away (even hide them) in favor of a formal, logically consistent theory that (with luck) can be stated in mathematical or near-mathematical terms. The formal models that emerge are shared, carefully guarded against attack, and prescribe ways of life for their users. The metaphors that aided in this achievement are usually forgotten or, if the ascent turns out to be important, are made not part of science but part of the history of science (p. 48).

Yet, as Lakoff and Johnson (1980) have shown with a wide range of examples, metaphor is conceptual in nature rather than a matter of "pure language." Metaphors are useful in cognition for enabling humans to "get a handle on a concept" (p. 116) which is "not clearly enough delineated in its own terms to satisfy the purposes of our day-to-day functioning" (p. 118). Metaphors do this by highlighting certain correspondences between the slippery concept in question and other more clearly delineated concepts whose structure "emerges" directly from our experience. Thus in English everyday usage builds on the metaphor that "ideas are food" with expressions such as: "food for thought," "raw facts," "spoon-feeding," "I can't swallow that," "it left a bad taste in my mouth," etc.; and with equal variety builds on the metaphors "love is a journey," "argument is war," and many others. In fact Lakoff and Johnson demonstrate that much of the conceptual structure of natural language is metaphorical in nature. English, for instance, is abundant with orientational metaphors (e.g., up = happy, having control, more; whereas down = sad, being subject to control, less), and with ontological metaphors which reify abstract concepts as entities which can be quantified, can have aspects identified, can function as causes, or goals, etc. and can often

also be imputed a functional structure (e.g., dominant metaphors equate the mind, arguments and linguistic expressions to a container). Personification is another, well-known specific form of metaphorical conceptualization.

The structure of the concept to which the target concept is likened typically only applies in a partial way to its new subject. But the potential for extension of the analogy remains available for innovative metaphors, and the need to maintain coherence (albeit not complete consistency) among the various metaphors in terms of which a given concept is structured serves to canalize speech as well as thought about the concept. Thus the role of metaphor in explanation is partly attractive of attention and memory (it connects the explanandum to an image which is already present in the cognitive repertoire of the audience), partly selective (through the analogy it highlights significant features of the topic), and partly productive of reasoning: by suggesting the possibility of further similarities other than those immediately asserted by the primary analogy, it invites the audience to reflect on the structure of the concept.

Against this background we can see that the intuitive appeal of a scientific theory arises partly from how well its metaphors fit one's experience. Psychological explanations of a certain sort seem perfectly natural to us because the metaphors that underly them are an integral part of the model of the mind that we have in our culture. Formal scientific theories are attempts to extend a set of "ontological" and "structural" metaphors already in current use in the culture consistently. When the extension is experienced as illuminating, it is because a "structural similarity" is defined between "the entire range of experiences" to be explained and the characteristics of the proposed model to which they are likened (cf. Lakoff & Johnson, 1980, Ch. 22).

Let us consider a few examples. MacIntyre (1958) has discussed how Freud's theory of unconscious motivation drew on the mechanistic zeitgeist of 19th century physiology for its central metaphors of energy and repression, which provide a model in terms of which it becomes plausible to conceptualize the origins of human ideas and actions in terms of deterministic causation. The same is true of Lorenz's (1950) hydraulic model of instinct, with its innate releasing mechanisms, vacuum activity, etc. In cognitive theorizing a popular source of metaphors has been the activity of visual representation.¹¹ The mind is construed as making use in perception, thought and memory, of images, schemata (sketches) or models of the

world. Sometimes these metaphors have become so compelling that they have given rise to pseudo-problems requiring careful reflective deconstruction. For instance, the notion that the projection through the lens of a single eye of a static, bordered "image" onto the surface of the retina constitutes an irreducible stage in visual perception captured the imagination of many theorists (as indeed it still does of many high school students and teachers) and had to be confronted with Gibson's patient explanation of the difference between the visual field and the visual world (1950) and of the active, exploratory nature of visual search (1966).

More recently the digital computer has become one of the dominant metaphors for cognitive psychology. Its advocates often emphasize in their meta-theoretical pronouncements that the analogy is motivated by more profound considerations than the project of constructing surrogates for human activity such as information retrieval systems, factory robots and word-processors. In particular the claim is often made that the programmatic specification of theoretical models in terms amenable to com-

puter simulation makes possible, and in practice dictates, a higher level of precision than was characteristic of earlier eras of theorizing in psychology. Now this claim may be true with reference to the criteria of precision generated in the field. But it is also possible that the paradigmatic adherence to such procedures narrows the range of explanatory strategies the theorist is able to deploy. Already within the field voices of discontent have been raised along the lines that analogue models, rather than procedural descriptions may be more fruitful ways of conceptualizing cognitive processes. Here then we see an illustration of the fact that the non-definitional looseness of metaphor which is so useful for the building of initial bridges often needs "tightening up" at a later stage through careful delimitation of the scope of the analogy it enshrines, i.e., of the precise sense in which it holds good.

At least four types of consideration appear relevant to the choice of a metaphor in the context of theoretical discourse in psychology. A preliminary framework for the analysis of their interrelations is presented in Figure 2. The goal of devising an account of behavior which "cuts the

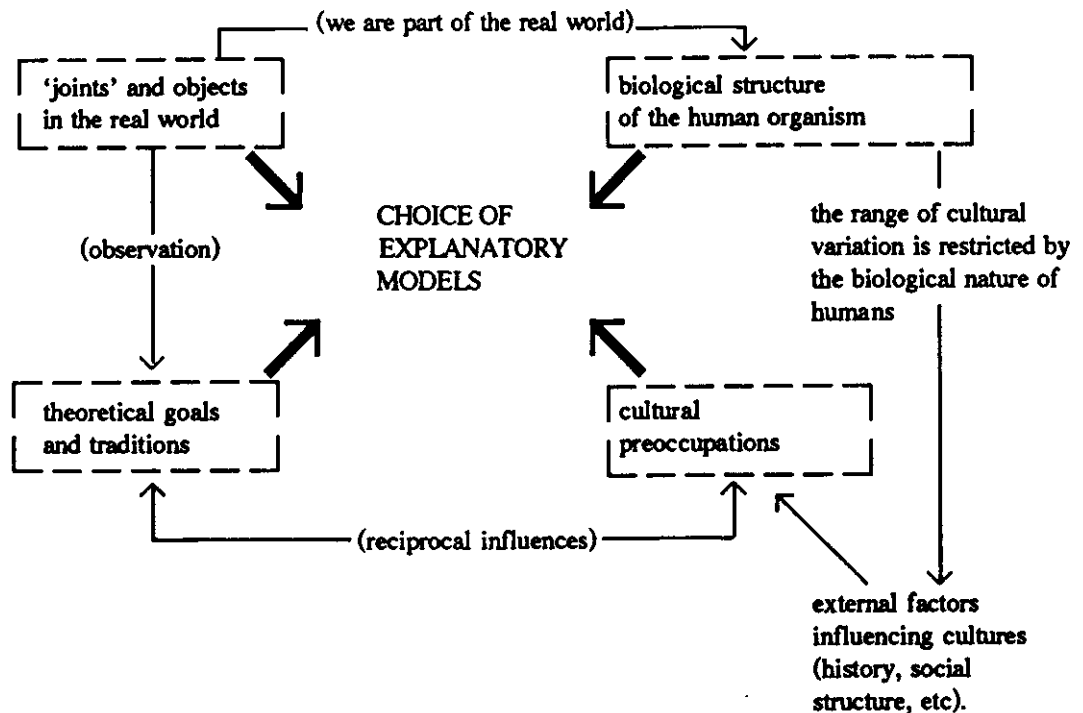


Figure 2. Criteria for the selection and validation of explanatory models in psychology

world at its joints" can be construed in objectivist terms or in terms of respecting the fundamental distinctions of universally held primary theory.¹² Within that "immediately given" world a privileged position is held in psychology by the structure of the human organism. On the other hand, the cultural perspectives of the author, subject and audience each have their own distinctive preoccupations and a metaphor which resonates with these will no doubt be received with greater enthusiasm. Within the broad framework of some cultures, particular theoretical traditions have been assimilated (e.g., both psychoanalysis and behaviorism within 20th century American culture), while others are still trying to establish their validity with a wider public.

Each of these four types of frame of reference specifies certain dimensions and principles in terms of which judgments of similarity can be made, which in turn underwrite certain types of analogy more readily than others. A metaphor which leans too heavily on a transient preoccupation of one culture may be disparaged by outside observers (or later generations) as merely vogueish or "trendy." On the other hand, such preoccupations are sometimes celebrated as affording a unique new range of insights. Thus Boyd (1979) argues that computer-metaphors have acquired "an indispensable role in the formulation and articulation of theoretical positions" in post-behaviorist cognitive psychology (op.cit., p. 360).

Eckensberger (1985) has pointed out that various metaphysical models or images of man underly and color different paradigms of explanation in psychology. Behind the mechanistic explanations of behaviorist learning theories and some versions of psychoanalysis lies the model of man as an engine, whereas Piaget's genetic epistemology is founded on a model of man as a living organism. The sense in which Eckensberger argues that these "models underly" the corresponding explanatory paradigms corresponds closely to what Lakoff and Johnson construe as metaphor. The "action-theoretical" approach (Eckensberger & Meacham, 1984; Shotter, 1975) advocates a "self-reflexive" paradigm which is based on a model of man as a conscious and responsible human being. Theoretical models serve as focussing devices narrowing our attention and thereby increasing our sensitivity to selected features of the world. They also thereby shut out information which they define as irrelevant, although an alternative model may be able to show that it is highly relevant to a superordinate goal shared by both of the models. (In Lakoff and Johnson's account of metaphor these complementary processes are referred to as "highlighting" and "hiding.") In addition to selective focussing, a model

contributes "excess meaning," which Reese and Overton (1970, p. 120) define as "elements or relations that are only 'accidentally' present." This excess meaning arises from the concreteness of the ideas to which the target concept is compared in the presentation of the model. In some cases it may give additional heuristic power to a model, while in other cases it may be regarded as seriously misleading. (Lakoff and Johnson, 1980, point out that this excess meaning is not completely random, but is constrained by the need for coherence among metaphors.)

Thus one way of conceptualizing cultural validity would be a positive balance of benefits over costs for a given community at a given time engaged in a given task, where the sensitizing and heuristic power of a model outweigh the perceived narrowness of its focus and the extraneous connotations. Other factors influencing the acceptability of a model may include its compatibility with culturally prevalent "pre-theoretical assumptions" (Reese & Overton, 1970), and the extent to which its key analogies are drawn from a domain in which the audience's "primary theory" generates order, regularity and predictability in their daily lives (Horton, 1982).

For these reasons, in addition to its theoretical fruitfulness and its empirically predictive power, a psychological theory will always be judged by its capacity to resonate with the broader cultural preoccupations of the society of which its audience are members.¹³ The elaborate efforts of American interpreters such as Flavell (1963) and Furth (1968) which were required in order to render the insights of Piaget intelligible within another branch of Western culture should serve as a reminder that this is no mean problem. Similarly, translation has been combined with reinterpretation in the process of making intelligible to an American audience the insights of Vygotsky and his contemporaries by Cole and Scribner (1978), Wertsch (1981) and others. Cole (personal communication) has described the focus of this enterprise as one of "reconstituting paradigmatic fundamentals." More recently, Azuma (1984) has begun to interpret the ideas of Doi and other Japanese psychologists for a Western audience.

Paradoxically, however, when psychologists have explicitly set out to study cultural differences, this task of cross-cultural interpretation has often been neglected. Many "Western" psychologists have not even appeared to be interested in whether their reports would be intelligible, let alone illuminating, for the people they studied. Indeed, they did not even acknowledge them as a potential audience: subjects were construed as objects of study but not as recipients of the wisdom generated by the study. Those

cross-cultural researchers who have acknowledged an obligation to capture the meaning of behavior and experience from the perspective of their subjects have most often construed this as a means of ensuring functional equivalence for the purpose of comparison. This concern emanates from the "Olympian" project of formulating a universalistic psychology.

Perhaps one of the hidden attractions of this metaphor has been the "peculiar mixture of familiarity and strangeness" (Horton) in Homer's account of the gods. In contemporary terms, we would say they were equipped with fantastic zoom-lenses and long-distance microphones so that from the great height of Mount Olympus they could listen in to what people down below were saying and observe their behavior at close range. In the real world, central government administrators and cosmopolitan social scientists do have a bird's eye view of certain parameters of the total society and in this sense they may be regarded as privileged. But there is a high price to be paid for this privilege: loss of detail, loss of fine-grain texture, loss of contact with reality as it is experienced in the frontline, with both feet on the ground.

And those researchers who seek to recover some of this lost detail must again pay a price, for we travel not by zoom-lens into the privacy of people's homes but as visitors, or at best as commuters between an alien and distant, powerful capital and the front doorstep of people's homes, where we must humbly ask them to share with us some of their experiences. Not only must we persuade them that this is an exercise worth their time, but we must also try to bear in mind how they interpret the task of communicating with us, what allowances they are making for our foreignness, what objectives they are pursuing in selecting what they choose to tell us, and so on.

The point of this reflexive coda on the metaphor of Mount Olympus is to illustrate an alternative set of concerns motivating cross-cultural psychology in a Third World country. The focus of these concerns, in the light of the predominantly "Western" cultural orientation of contemporary psychology, is on the question: what use can a socially responsible, Third World psychologist make of psychology (along with other, indigenous cultural resources) in explaining the behavior and experience of a Third World subject to a Third World audience? I have argued that much will depend on whether the author succeeds in representing the central insights of her theoretical model in terms of a metaphor that is intelligible to both subject and audience and which points the way towards a fusion of their various cognitive horizons.

Notes

¹Author's address: Department of Psychology, University of Maryland Baltimore County, 5401 Wilkens Avenue, Baltimore, MD. 21228.

²In addition to many of the authors whose writings I have cited in this paper, I am indebted to Gloria Chan, Phil Kingsley, Lolle Nauta and Jim Starr for critical discussions of these issues over the years, also to the East-West Center, Hawaii, the University of Hull, England, and the University of California San Diego for opportunities to read and reflect in 1977, 1984, and 1988 during periods of leave from the University of Zambia, and to Peter Boele, Trish Fleming and Peg Griffin for detailed comments on the first draft of this paper. I learned a lot from the nine referees who appraised that draft for BBS, and am obliged to them for their time and efforts. What remains is of course my own responsibility.

³In the remainder of this paper I shall avoid the inelegance of acknowledging each time that a person may be masculine or feminine by using the feminine form to denote the general case. This may serve to counterbalance the fact that all the authors I have cited follow the opposite convention by using the masculine form for the general case.

⁴One of the assessors of an earlier draft of this paper expressed the view that I should "nail my flag to the mast: with respect to the rival philosophies and ideologies underlying cross-cultural psychology. "As I have explained in section 4.3, the position espoused in this paper corresponds with an epistemological stance of "perspectivism." It is doubtful, however, whether the metaphor of pinning one's flag to the mast is consistent with endorsing that stance, since it implies a degree of partisan commitment which would appear to violate one of the central tenets of perspectivism, namely that an interpretation which is valid and useful from the perspective of one actor-observer-interpreter is often less so from another perspective.

⁵One notable contribution to the voluminous anthropological literature on this topic is the review by Harris (1976). His materialist position is a clear example of the "objectivism" criticized as philosophically untenable with respect to social phenomena by Taylor (1971) and by Lakoff and Johnson (1980).

⁶Limitations of space preclude discussion here of the remarkable parallels which have been documented between the phonological structure of spoken languages and the constituent structure of natural sign languages which have evolved in communities of deaf people (Stokoe, 1972; Padden & Perlmutter, 1987). Probably many of the conceptual issues discussed in section 3 of the present paper would benefit from a reworking to disengage them from the specifics of the vocal-acoustic channel, but this would require a more detailed presentation of the constituent structure of sign languages than space will allow here.

⁷Children are, of course, not born with competence in a particular language. The term "native" is therefore strictly inapplicable. On

the other hand, the most popular alternative expression "mother tongue" also simplifies reality by implying that children necessarily learn their first language from their mother. Even "first language" (L₁) is potentially misleading, since substantial numbers of people fail for various reasons to retain a fluency in the first language they acquire. Among these variously inadequate terms, "native" appears to connote most clearly the notion of privileged competence which is central to my concerns in this part of the present paper.

⁹For another example of impoverished theoretical definition, see Jeffrey's (1968) critique of the Kendlers' construal of children's speech in concept attainment tasks as "verbal labelling."

¹⁰The different "levels of discourse" pertaining to measurement techniques and to constructs which were distinguished in section 3.3 can also be construed as examples of different "language games."

¹¹At the time of writing, no translation of the full text of this treatise "on the logic of social science" has been published, although one has been in preparation for some time. The review of Gadamer's *Truth and method* (Habermas, 1977) cited in section 4.4 is one section of the treatise.

¹²Visual images are such a dominant metaphor in Western thought that it is rare to find other modalities invoked by theorists as models for pattern or structure. Neisser's (1976) conception of phonemes as articulatory gestures is a refreshing and illuminating departure from that tradition.

¹³It should be emphasized that the scope and content of primary theory, as in the case of common sense, need not be regarded as sharply distinct from secondary theories, nor is it likely that the borders which determine our sense of obviousness or immediacy remain fixed across secular changes in social organization.

¹⁴Some illustrative applications of this principle to theoretical communications with an African audience are presented in my forthcoming book on "the significance of schooling" (Cambridge University Press).

References

- Ardila, R. (1982). International psychology. *American Psychologist*, 37, 323-329.
- Azuma, H. (1984). Psychology in a non-Western country. *International Journal of Psychology*, 19, 45-55.
- Barfield, O. (1947). Poetic diction and legal fiction. In M. Black (Ed.), *The importance of language*. Englewood Cliffs, NJ.: Prentice-Hall.
- Barry, H. (1981). Uses and limitations of ethnographic descriptions. In R.H. Munroe, R.L. Munroe, & B.B. Whiting (Eds.), *Handbook of cross-cultural human development*, pp. 91-111. New York: Garland STPM Press.
- Berko, J. (1958). The child's learning of English morphology. *Word*, 14, 150-177.
- Berrien, F.K. (1967). Methodological and related problems in cross-cultural research. *International Journal of Psychology*, 2, 33-44.
- Berry, J.W. (1969). On cross-cultural comparability. *International Journal of Psychology*, 4, 119-128.
- Berry, J.W. (1981). Developmental issues in the comparative study of psychological differentiation. In R.L. Munroe, R.H. Munroe, & B.B. Whiting (Eds.), *Handbook of cross-cultural human development*, pp. 475-499. New York: Garland.
- Berry, J.W. (1983). Comment. In J.B. Deregowski, S. Dziurawiec, & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*, pp. 39-40. Amsterdam: Swets & Zeitlinger.
- Berry, J.W. (1986, July). *Psychology in and of Canada*. Paper presented at the 8th International Congress of the International Association of Cross-Cultural Psychology, Istanbul.
- Blurton-Jones, N. (Ed.). (1972). *Ethological studies of child behavior*. Cambridge: Cambridge University Press.
- Boswell, J. (1799). *The life of Samuel Johnson, LL.D.* London: Baldwin.
- Boyd, R. (1979). Metaphor and theory change: what is "metaphor" a metaphor for? In A. Ortony (Ed.), *Metaphor and thought*, pp. 356-408. Cambridge: Cambridge University Press.
- Brislin, R.W. (1976). Comparative research methodology: Cross-cultural studies. *International Journal of Psychology*, 11, 215-229.
- Brislin, R.W. (1983). Comment. In J.B. Deregowski, S. Dziurawiec, & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*, pp. 356-408. Amsterdam: Swets & Zeitlinger.
- Brown, R. (1958). *Words and things*. New York: Free Press.
- Bruner, J.S. (1975). The ontogenesis of speech acts. *Journal of Child Language*, 2, 1-19.
- Bruner, J.S. (1986). *Actual minds, possible worlds*. Cambridge, MA: Harvard University Press.
- Buck-Morss, J. (1975). Socio-economic bias in Piaget's theory and its implications for cross-cultural studies. *Human Development*, 18, 35-49.
- Ching, C.C. (1984). Psychology and the four modernizations in China. *International Journal of Psychology*, 19, (1-2), 57-63.

- Chomsky, N. (1968). *Language and mind*. New York: Harcourt, Brace & World.
- Chomsky, N. & Halle, M. (1968). *The sound pattern of English*. New York: Harper & Row.
- Cohen, R.A. (1969). Conceptual styles, culture conflict and nonverbal tests of intelligence. *American Anthropologist*, 71, 828-856.
- Cole, M. & Scribner, S. (1978). Introduction. In L.S. Vygotsky, *Mind in Society*. Cambridge, MA.: Harvard University Press.
- Coleman, J.S. (1972). Some thoughts on applied social research and training in African universities. *The African Review*, 2 (2), 289-307.
- D'Andrade, R.G. (1984). Cultural meaning systems. In R.A. Shweder & R.A. Levine (Eds.), *Culture theory: essays on mind, self and emotion*, pp. 88-119. Cambridge: Cambridge University Press.
- Dasen, P.R., Barthelemy, D., Kan, E., Kouame, K., Daouda, K., Adjei, K.K., & Assande, N. (1985). N'gloule, l'intelligence chez les Baoule. *Archives de Psychologie*, 53, 293-324.
- Diaz-Guerrero, R. (1986, July). *A Mexican ethnopsychology*. Paper presented at the 8th International Congress of the International Association of Cross-Cultural Psychology. Istanbul, Turkey.
- Eckensberger, L. (1985). De essentie von theorieen in de cross-culturele psychologie. (The essence of theories in cross-cultural psychology.) In J.M.H. van de Koppel (Ed.), *Verkenningen in de cross-culturele psychologie*, pp. 71-103.. Lisse: Swets & Zeitlinger.
- Eckensberger, L.H. & Meacham, J.A. (1984). Action theory, control and motivation: a symposium. *Human Development*, 27 (3-4), 163-210.
- Edwards, C. Pope. (1982). Moral development in comparative cultural perspective. In D.A. Wagner & H.W. Stevenson (Eds.), *Cultural perspectives on child development*, pp. 248-279. San Francisco: Freeman.
- Enriquez, V.G. & Marcelino, E.P. (1984). *Neo-colonial politics and language struggle in the Philippines: national consciousness and language in Philippine psychology, 1971-1983*. Quezon City, Philippines: Akademia Ng
- Fishman, J.A. (1960). A systematization of the Whorfian hypothesis. *Behavioral Science*, 5, 323-329.
- Flavell, J.H. (1963). *The developmental psychology of Jean Piaget*. Princeton: Van Nostrand.
- Fraser, B. (1979). The interpretation of novel metaphors. In A. Ortony (Ed.), *Metaphor and thought*, pp. 172-185. Cambridge: Cambridge University Press.
- Frijda, N., & Jahoda, G. (1966). On the scope and methods of cross-cultural research. *International Journal of Psychology*, 1, 109-127.
- Fudge, E.C. (1970). Phonology. In J. Lyons (Ed.), *New horizons in linguistics*, pp. 76-95. Harmondsworth: Penguin.
- Furth, H.G. (1968). Piaget's theory of knowledge: the nature of representational interiorization. *Psychological Review*, 75, 143-154.
- Gadamer, H.G. (1975). *Truth and method*. New York: Continuum.
- Gibson, E.J. & Levin, H. (1975) *The psychology of reading*. Cambridge, MA: M.I.T. Press.
- Gibson, J.J. (1950). *The perception of the visual world*. Boston: Houghton Mifflin.
- Gibson, J.J. (1966). *The senses considered as perceptual systems*. Boston, MA: Houghton Mifflin.
- Goffman, E. (1956). *The presentation of self in everyday life*. Edinburgh: Edinburgh University Social Science Research Centre, Monograph No.2.
- Goffman, E. (1967). *Interaction ritual: essays in face-to-face behavior*. Garden City, NY: Anchor.
- Gombrich, E.H. (1960). *Art and illusion*. London: Phaidon.
- Gumperz, J.J. (1982). *Discourse strategies*. Cambridge: Cambridge University Press.
- Habermas, J. (1977). A review of Gadamer's Truth and Method. In F. R. Dallmayr & T. A. McCarthy (Eds.), *Understanding and social enquiry*, pp., 335-365. Notre Dame, IN: University of Notre Dame Press.
- Habermas, J. (1978). *Knowledge and human interests: a general perspective*, pp. 301-317.. Appendix to Knowledge and Human Interests. London: Heinemann.
- Habermas, J. (1984, 1987). *The theory of communicative action*, Vols.1 & 2. Boston: Beacon Press.
- Harre, R. (1979). *Social being: a theory for social psychology*. Oxford: Blackwell.
- Harris, M. (1976). History and significance of the emic/etic distinction. *Annual Review of Anthropology*, 5, 329-350.

- Heider, F. (1958). *The psychology of interpersonal relations*. New York: Wiley.
- Hekman, S.J. (1986). *Hermeneutics and the sociology of knowledge*. Notre Dame, IN: University of Notre Dame.
- Hockett, C.F. (1960). The origin of speech. *Scientific American*, 203, 89-96.
- Horton, R. (1967). African traditional thought and Western science. *Africa*, 37 (1), (2).
- Horton, R. (1982). Tradition and modernity revisited. In M. Hollis & S. Lukes (Eds.), *Rationality and relativism*, pp. 201-206. Oxford: Blackwell.
- Howard, A. & Scott, R.A. (1981). The study of minority groups in complex societies. In R.H. Munroe, R.L. Munroe, & B.B. Whiting (Eds.), *Handbook of cross-cultural psychology*, pp. 55-63. Amsterdam: Swets & Zeitlinger.
- Hyman, L.M. (1975). *Phonology: theory and analysis*. New York: Holt, Rinehart & Winston.
- I.P.A. (1949). *The principles of the International Phonetic Association*. University College, Gower Street, London
- Jahoda, G. (1970). Supernatural beliefs and changing cognitive structures among Ghanaian university students. *Journal of Cross-Cultural Psychology*, 1, 115-130.
- Jahoda, G. (1973). Psychology and the developing countries: Do they need each other? *International Social Science Journal*, 25, 461-474.
- Jahoda, G. (1977). In pursuit of the emic-etic distinction: Can we ever capture it? In Y.H. Poortinga (Ed.), *Basic problems in cross-cultural psychology*, pp. 55-63. Amsterdam: Swets & Zeitlinger.
- Jahoda, G. (1982). *Psychology and anthropology*. London: Academic Press.
- Jahoda, G. (1983a). The cross-cultural emperor's conceptual clothes: the emic-etic issue revisited. In J.B. Deregowski, S. Dziurawiec, & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*, pp. 19-37.. Lisse: Swets & Zeitlinger.
- Jahoda, G. (1983b). Reply. In J.B. Deregowski, S. Dziurawiec & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*, pp. 46-49. Amsterdam: Swets & Zeitlinger.
- Jeffrey, W.E. (1968). The orienting reflex and attention in cognitive development. *Psychological Review*, 75, 323-334.
- Joynson, R.B. (1974). *Psychology and common sense*. London: Routledge & Kegan Paul.
- Kashoki, M.E. (1978). The foreign researcher: friend or foe? *History in Africa*, 5, 275-299.
- Kashoki, M.E. (1979). Indigenous scholarship in African universities. In B. Turok (Ed.), *Development in Zambia: A reader*, pp. 170-185. London: Zed Press.
- Kavadias, G. (1966). The assimilation of the scientific and technological "message." *International Science Journal*, 18, 362-375.
- Kiernan, C. (1985). Communication. In A.M. Clarke, A.D.B. Clarke, & J.M. Berg, (Eds.), *Mental deficiency: the changing outlook*, 4th Edition. London: Methuen.
- Kuhn, T.S. (1962). *The structure of scientific revolutions*. Chicago: University of Chicago Press.
- Kuhn, T.S. (1979). Metaphor in science. In A. Ortony (Ed.), *Metaphor and thought*, pp. 409-419. Cambridge: Cambridge University Press.
- Lado, R. (1957). *Linguistics across cultures*. Ann Arbor, MI: University of Michigan Press.
- Lakoff, G., & Johnson, M. (1980). *Metaphors we live by*. Chicago: University of Chicago Press.
- LCHC. (Laboratory of Comparative Human Cognition). (1978). *Cognition as a residual category in anthropology. Annual Review of Anthropology*, 7, 51-69.
- LCHC. (Laboratory of Comparative Human Cognition). (1979). What's cultural about cultural psychology? *Annual Review of Psychology*, 30, 145-172.
- Lorenz, 1950. The comparative method in studying innate behavior. *Symposia of the Society for Experimental Biology*, 4, 221-268. Cambridge: Cambridge University Press.
- Lukes, S. (1982). Relativism in its place. In M. Hollis & S. Lukes (Eds.), *Rationality and relativism*, pp. 261-305. Oxford: Blackwell.
- MacIntyre, A.C. (1958). *The unconscious*. London: Routledge & Kegan Paul.
- McClelland, D.C. (1961). *The achieving society*. Princeton: Van Nostrand.
- Miller, G.A. (1979). Images and models, similes and metaphors. In A. Ortony (Ed.), *Metaphor and thought*, pp. 202-250. Cambridge: Cambridge University Press.
- Moghaddam, F.M. (1966, July). "Tradition supportive" psychologies in competing cultural systems: some lessons from the

- Iran experiment 1978-1981*. Paper presented at the 8th International Congress of the International Association of Cross-Cultural Psychology. Istanbul, Turkey.
- Moscovici, S. (1982). On social representations. In J.P. Forgas (Ed.), *Social cognition: perspectives on everyday understanding*, pp. 181-209. London: Academic Press.
- Neisser, U. (1976). *Cognition and reality*. San Francisco: Freeman.
- Padden, C.A., & Perlmutter, D.M. (1987). American Sign Language and the architecture of phonological theory. *Natural Language and Linguistic Theory*, 5, 335-375.
- Petzold, M. (1984). Developmental psychology and the Third World: some preliminary considerations. *Revista de Historia de la Psicología*, 5, 283-290.
- Pike, K.L. (1954, 1967). *Language in relation to a unified theory of the structure of human behavior*. The Hague: Mouton, 1954; 2nd (enlarged) ed. 1967.
- Poortinga, Y.H. (1986). *Psychic unity versus cultural variation: an exploratory study of some basic personality variables in India and the Netherlands*. University of Tilburg, Netherlands: limited circulation report.
- Pride, J.B. (Ed.). (1982). *The new Englishes*. Rowley, MA: Newbury House.
- Prince, R. (1980). Variations in psychotherapeutic procedures. In H.C. Triandis & J.G. Draguns (Eds.), *Handbook of cross-cultural psychology, Vol. 6: Psychopathology*, pp. 291-349. Boston, MA: Allyn & Bacon.
- Pylsyshyn, Z.W. (1979). Metaphorical imprecision and the "top-down" research strategy. In A. Ortony (Ed.), *Metaphor and thought*, pp. 420-436. Cambridge: Cambridge University Press.
- Reese, W.H. & Overton, W.F. (1970). Models of development and theories of development. In L.R. Goulet & P. Baltes (Eds.), *Life-span development psychology*, pp. 116-145. New York: Academic Press.
- Richards, A.I. (1956). *Chisungu: A girl's ceremony among the Bemba of Northern Rhodesia*. New York: Grove Press.
- Rohner, R.P. (1984). Toward a conception of culture for cross-cultural psychology. *Journal of Cross-Cultural Psychology*, 15(2), 111-138.
- Ryle, G. (1949). *The concept of mind*. London: Hutchinson.
- Sampson, E.E. (1986, July). *The politics of indigenous psychologies*. Paper presented at the 8th International Congress of the International Association of Cross-Cultural Psychology. Istanbul, Turkey.
- Searle, E.E. (1965). What is a speech act? In M. Black (Ed.), *Philosophy in America*, pp. 221-239. New York: Cornell University Press.
- Searle, J.R. (1979). Metaphor. In A. Ortony (Ed.), *Metaphor and thought*, pp. 92-123. Cambridge: Cambridge University Press.
- Selinker, L. (1972). Interlanguage. *International Review of Applied Linguistics*, 10(3), 209-231.
- Serpell, R. (1968). *Selective attention and interference between first and second languages* (Communication 4). Lusaka: University of Zambia, Institute for Social Research.
- Serpell, R. (1976). *Culture's influence on behaviour*. London: Methuen.
- Serpell, R. (1977a). Estimates of intelligence in a rural community of Eastern Zambia. In F.M. Okatcha (Ed.), *Modern psychology and cultural adaptation*, pp. 179-216. Nairobi: Swahili Language Consultants and Publishers.
- Serpell, R. (1977b). Strategies for investigating intelligence in its cultural context. *Quarterly Newsletter of the Institute of Comparative Human Development*, 1(3), 11-15.
- Serpell, R. (1977c). Context and connotation: the negotiation of meaning in a multiple speech repertoire. *Quarterly Newsletter of the Institute of Comparative Human Development*, 1(4), 10-15.
- Serpell, R. (1977d). *Cultural validation in psychological research: a working paper for the emic/etic study group in the East-West Center Culture Learning Institute's cross-cultural researchers' project/activity*. East-West Center, Hawaii (unpublished ms).
- Serpell, R. (1978). Learning to say it better: a challenge for Zambian education. In L.N. Omondi & Y.T. Simukoko (Eds.), *Language and education in Zambia* (Communication No. 14), pp. 29-57. Lusaka: Institute for African Studies. (also reprinted in Pride, 1982, op.cit.).
- Serpell, R. (1979). Cultural validation in psychological research. In L. Eckensberger, W.J. Lonner & Y.H. Poortinga (Eds.), *Cross-cultural contributions to psychology*, pp. 287-299. Amsterdam: Swets & Zeitlinger.
- Serpell, R. (1980, July). *Indigenous participation in Third World psychological research*. Paper presented in the Symposium on Cross-Cultural Studies at the 22nd International Congress of Psychology. Leipzig, German Democratic Republic.
- Serpell, R. (1982). Measures of perception, skills and intelligence: the growth of a new perspective on children in a Third

- World country. In W.W. Hartup (Ed.), *Review of child development research*, Vol. 6, pp. 392-440. Chicago: University of Chicago Press.
- Serpell, R. (1984). Commentary: the impact of psychology on Third World development. *International Journal of Psychology*, 19, 179-192.
- Serpell, R. (1988). Setting priorities for a University research institute in Southern Africa: the example of IAS in Zambia. In M.M. Sefali (Ed.), *Southern Africa: Research for development*, pp. 251-267. Roma, Lesotho: Institute of Southern African Studies.
- Serpell, R. (1989). Dimensions endogenes de l'intelligence chez les A-Chewa et autres peuples africains. In J. Retschitski, M. Bossel-Lagos, & P.R. Dasen (Eds.), *La recherche interculturelle, Tome II*, pp. 164-179. Paris: Harmattan, 164-179.
- Serpell, R. (forthcoming). *The significance of schooling*. Cambridge: Cambridge University Press.
- Serpell, R., & Deregowski, J.B. (1980). The skill of pictorial perception: an interpretation of cross-cultural evidence. *International Journal of Psychology*, 15, 145-180.
- Shields, M.M. (1978). The child as psychologist: construing the social world. In A.Lock (Ed.), *Action, gesture and symbol: the emergence of language*, pp. 529-581. London: Academic Press.
- Shotter, J. (1975). *Images of man in psychological research*. London: Methuen.
- Sinha, D. (1984). *Psychology in a Third World country: the Indian experience*. New Delhi: Sage.
- Smedslund, J. (1978). Bandura's theory of self-efficacy: a set of common-sense theorems. *Scandinavian Journal of Psychology*, 19, 1-14.
- Smedslund, J. (1980). From ordinary to scientific language: reply to Jones. *Scandinavian Journal of Psychology*, 21, 231-232.
- Smedslund, J. (1982). Common sense as psychosocial reality: a reply to Sjoberg. *Scandinavian Journal of Psychology*, 23, 79-82.
- Skinner, E., & Kramer, A. (1985). *What you should know if you want to publish in North-American development journals*. Limited circulation paper produced for the International Society of Behavioural Development.
- Stüfel, L.D., Davidson, R.K., & Coleman, J.S. (Eds.) (1982). *Social sciences and public policy in the developing world*. Lexington, MA: Heath.
- Stokoe, W. (1972). *Semiotics and human sign language*. The Hague: Mouton.
- Super, C.M. (1983). Cultural variation in the meaning and uses of children's "intelligence." In J.B. Deregowski, S. Dziurawiec, & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*. Lisse: Swets & Zeitlinger.
- Szasz, T. (1961). *The myth of mental illness: foundations of a theory of personal conduct*. New York: Hoeber-Harper.
- Taylor, C. (1971). Interpretation and the sciences of man. *Review of Metaphysics*, 25, 3-51.
- Thomas, K. (1971). *Religion and the decline of magic*. London: Weidenfeld & Nicholson.
- Tomlinson, S. (1982). *The sociology of special education*. London: Routledge & Kegan Paul.
- Trevarthen, C. (1980). The foundations of intersubjectivity: development of interpersonal and cooperative understanding in infants. In D.R. Olson (Ed.), *The social foundations of language and thought: essays in honor of Jerome S. Bruner*, pp. 316-342. New York: Norton.
- Triandis, H. C. (1972). *The analysis of subjective culture*. New York: Wiley.
- Triandis, H.C. (1977). Impediments to the progress of cross-cultural psychology. In Y.H. Poortinga (Ed.), *Basic problems in cross-cultural psychology*, pp. 3-11. Amsterdam: Swets & Zeitlinger.
- Triandis, H.C. (General Ed.). (1980). *Handbook of Cross-Cultural Psychology* (in six volumes). Boston: Allyn & Bacon.
- Triandis, H.C. (1983). Comment. In J.B. Deregowski, S. Dziurawiec, & R.C. Annis (Eds.), *Expiscations in cross-cultural psychology*, pp. 44-45. Amsterdam: Swets & Zeitlinger.
- Turnbull, C.M. (1962). *The lonely African*. London: Chatto & Windus.
- Warwick, D.P. (1980). The politics and ethics of cross-cultural research. In H.C. Triandis & W.W. Lambert (Eds.), *Handbook of cross-cultural psychology, Vol. 1: Perspectives*, pp. 319-371. Boston: Allyn & Bacon.
- Wegner, D.M. & Vallacher, R.R. (1981). Common-sense psychology. In J.P. Forgas (Ed.), *Social cognition: perspectives on everyday understanding*, pp. 225-246. London: Academic Press.
- Wertsch, J.V. (Ed.). (1981). *The concept of activity in Soviet psychology*. White Plains, NY: Sharpe.

Whiting, J.W.M. (1954). The cross-cultural method. In G. Lindzey (Ed.), *Handbook of social psychology, Vol.1*, pp. 523-531. Reading, MA: Addison-Wesley.

Winch, P. (1958). *The idea of a social science*. London: Routledge & Kegan Paul.

Witkin, H.A., & Berry, J.W. (1975). Psychological differentiation in cross-cultural perspective. *Journal of Cross-Cultural Psychology, 6*, 4-87.

Wittgenstein, L. (1958). *Philosophical investigations* (Translated by G.E.M. Anscombe). Oxford: Blackwell (2nd ed.).

Wober, M. (1966). Sensotypes. *Journal of Social Psychology, 70*, 181-189.

Wober, M. (1969). Distinguishing centri-cultural from cross-cultural tests and research. *Perceptual and Motor Skills, 28*, 488.

Wober, M. (1974). Towards an understanding of the Kiganda concept of intelligence. In J.W. Berry & P.R. Dasen (Eds.), *Culture and cognition: Readings in cross-cultural psychology*, pp. 261-280. London: Methuen.

Zec, P. (1980). Multi-cultural education: what kind of relativism is possible? *Journal of the Philosophy of Education, 14*(1), 77-86.

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