In addition, sociolinguists have repeatedly established that speakers use very different forms when they provide citation forms of speech than they do when speaking casually in conversation (discussed further below). So eliciting individual sentences or asking people to read aloud or to introspect on their linguistic practices all provide a lopsided picture of how language is actually used.

As a consequence, an important goal in sociolinguistics is to obtain 'natural speech', that is, how people use language in ordinary, everyday interactions with all the variability that this entails, since the full range of variability is missed by other methods.[2] However, the notion of naturalness is relative: sociolinguists are always subject to the 'observer's paradox' (Labov 1972a)—the inescapable fact that speakers are more aware of what they are saying and how they are talking as soon as you begin recording them (Meyerhoff
p. 124 2006: 38 points out the analogy with ↳ Heisenberg's uncertainty principle). In this respect, if maximally natural speech is how people talk when no recording is taking place, then this is impossible to capture ethically. Different methods for mitigating the effects of the observer's paradox in sociolinguistic fieldwork are discussed shortly.

It is, of course, necessary to constrain the scope of any study of language in use. In the variationist tradition, this is referred to as the sociolinguistic variable and generally denotes some unit of linguistic structure that is realized by two or more semantically equivalent variants—e.g. the variable (t, d) is realized as a final apical stop in the consonant cluster or is absent in [wɛst] and [dɹæg̊gd], above. By convention, variationists use parentheses to refer to the abstract linguistic variable—in this case, they would represent the alternation between either [t] or [d] in a coda cluster and the absence of an apical stop as (t, d).

Variables can also occur at the level of morphosyntax, for example the alternation between the presence or absence of BE in copula and auxiliary positions (cf. Meyerhoff and Walker 2007). Because of the requirement for semantic equivalence, it is more problematic to adapt this paradigm to the study of lexical alternates, e.g. *better* and *improved* may be functionally and referentially equivalent or they may not (such variation is perhaps better studied through genre or corpus-based methods). As noted above, it is possible to conceptualize the alternation between different codes as a similar kind of variation, but because it is impossible to define all and only the places where a code-switch can occur (as we can with a final consonant cluster, or the verb BE), this kind of sociolinguistic fieldwork is not associated with the terms and methods of variationist social dialectology.

What distinguishes sociolinguistic and anthropological linguistic fieldwork from other linguistic research is the search for socially meaningful units that co-occur with specific linguistic forms, routines, or practices. In other words, in addition to the dependent linguistic variable, sociolinguists are concerned with the study of independent social variables which may be more or less powerful constraints on the distribution of the linguistic variation they are studying.

Here is the first place where the traditions of participant observation in anthropology and ethnomethodology may articulate with the social science methods of variationist studies. Although many sociolinguistic studies examine the effect of a relatively small set of social variables on the linguistic features of interest—principally gender, age, social class, and ethnicity—these were never intended to be programmatic. Good sociolinguistic fieldwork deals with independent social variables that emerge through participant observation of socially cohesive subsets of speakers (Briggs 1986; Cameron et al. 1992 argue for the importance and feasibility of sociolinguistic fieldwork *with*, not just *on*, groups of speakers). Sometimes these social groups only emerge as socially meaningful in the course of the research; sometimes they can be recognized as socially meaningful quite quickly even by an outsider. Sociolinguistic terminology
p. 125 differentiates between ↳ meaningful social groups of different sizes and constitutions. The meaningfulness of some groups is identifiable through shared practices ('communities of practice': Eckert and Mcconnell-Ginet 1992), shared patterns of association ('social networks': Dubois and Horvath 1999; Milroy and Gordon 2003) or shared abstract patterns of variation ('speech communities': Labov 1972a).