Clarifying the Foundations of Evolutionary Psychology:
A Reply to Lloyd and Feldman

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Lloyd and Feldman’s (this issue) continuing commentary on our recent target article and rejoinder (Ellis & Ketelaar, 2000; Ketelaar & Ellis, 2000) focuses on two overarching issues. First, Lloyd and Feldman claim that our description of the core metatheoretical assumptions of modern evolutionary theory overemphasizes the role of inclusive fitness (i.e., the so-called selfish gene approach) at the expense of underemphasizing important alternative approaches (e.g., multilevel selection models, gene–culture coevolution models). Second, Lloyd and Feldman criticize some of the methods and assumptions that ostensibly characterize the evolutionary psychology research program. These criticisms concern the conceptualization of organisms as inclusive fitness maximizers, the soundness of the epistemology of evolutionary psychology, the modularity of psychological mechanisms, and the universality of psychological mechanisms. In the first part of this rejoinder, we acknowledge that different schools of thought exist regarding the plausibility and importance of various metatheoretical assumptions in human evolutionary psychology. We argue that to date, however, only the gene-centered adaptationist program (consistent with inclusive fitness theory) has demonstrated scientific progressivity by generating a coherent, integrated body of new knowledge and explaining away several apparent anomalies. In the second part of this rejoinder, we discuss several misunderstandings that underlie Lloyd and Feldman’s criticisms of human evolutionary psychology.

The Role of Inclusive Fitness Theory in Evolutionary Psychology

Lloyd and Feldman (this issue) criticize our reference to inclusive fitness theory as providing the foundation of modern evolutionary theory: Inclusive fitness theory comprises a small subset of models used for special purposes in evolutionary understanding. … There are many other components of evolutionary analysis that address both animal and human behavior, and although they are conceptually more intricate than inclusive fitness theory, they may be more appropriate for the exploration of human psychology.

Lloyd and Feldman go on to provide a technical critique of inclusive fitness theory, concluding that inclusive fitness theory is of limited use and that the foundations of evolutionary psychology are theoretically flawed.

What role does inclusive fitness theory play in evolutionary psychology? As we described it (Ketelaar & Ellis, 2000), the field of human evolutionary psychology primarily focuses on developing and testing middle-level evolutionary theories and their derivative hypotheses and predictions. These middle-level evolutionary theories (e.g., parental investment theory, life history theory, good genes sexual selection theory, reciprocal altruism theory) are consistent with and guided by but are not directly derived from a set of more basic metatheoretical assumptions about genetical evolution through natural and sexual selection (see Barkow, Cosmides, & Tooby, 1992; Buss, 1995). In this light, human evolutionary psychologists have found certain basic assumptions about natural and sexual selection, such as the gene-centered adaptationist program (consistent with inclusive fitness theory), to be more useful than alternative assumptions in guiding the development of middle-level evolutionary theories; that is, in guiding the specific theoretical models that provide a link between metatheoretical assumptions and derivative hypotheses and predictions. The armamentarium of mid-