

Tilting at Cognitive Psychology

Posts to the Control Systems Group Network, Nov 23, 1999

Subject: A Point of Clarification
From: Fred Nickols

<snip>

This is definitely NOT to say that current cognitive views are any more consistent with BPT (Bill Powers' Theory) than the radical behaviorists' view. (Speaking personally, some cognitivists' notion that we are at all times acting out previously formulated plans is just too much for me to swallow. Personally, I believe that we act a heck of a lot more often than we choose and then invent the choice afterward as a way of accounting for our actions.)

Anyway, the bottom line is that it seems to me that Bill P and Rick M are often tilting with the behaviorist view (frequently espoused by Bruce Abbott) but labeling it "conventional psychology" (which I am not sure it is).

Other views? Clarification from anyone is welcome.

Fred Nickols

Subject: Re: A Point of Clarification
[From Bruce Gregory (991121.1630 EST)]

The problem I have with cognitive psychology is that it lacks a coherent framework which might tell us exactly what problems it is trying to solve and why it is important to solve those problems. If you are not firmly grounded in a model that treats human beings as intentional agents it is very difficult to do anything sensible. At least from what I have observed.

Bruce Gregory

Subject: tilting at cog psych
[From Mary Powers (991123)]
Ref: Fred Nickols 991121 21:06:12

About PCT vs. the cognitive branch of conventional psychology: there has been plenty of tilting, but not on the net. It has taken place on the doorsteps of the journals, as PCT articles by a number of people have been barred from entry, for reasons ranging from the ludicrous to the outrageous.

BCP, being written in the 60's and early 70's, is probably more about behaviorism than it would be if written today. Cog psych was in development then. What has emerged is focussed on action. The trouble with planned action is not in the planning, it is in the notion that what is planned is action. Because as the command to act proceeds down the hierarchy to muscular outputs, the detailed computation required to carry out the action grows more and more complex and more and more vulnerable to the slightest variation in the environment in which the action is to occur. Planned perception, a la PCT, permits any variation in action required to bring about the desired result.

Cog psychologists do talk, some of them, about control, and self-regulation and so on. Some are even taking control engineering courses. But they are learning from engineers who have learned what to WTP's eyes is a pretty bizarre form of control engineering - as far as I understand it (not a lot) the concept of feedback is not as central to their thinking as it is to Bill's. The whole business of model-based control seems to be very clumsy. An example would be the Presser article in Psychological Review 199 v. 106 no. 4. I admit to not having read it, but simply looking at fig. 1, "control via feedback" is to look at something that, to paraphrase Bruce Gregory, is incoherent.

Mary P.