Is Function a Fundamental Feature of Attitudes?

Jonathan Webber, Cardiff University

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The model of evaluative attitudes emerging from social psychology distinguishes two mutually irreducible dimensions of attitudes: content and strength.

Many psychologists argue for a third dimension: function.

I argue that attitude function is reducible to patterns of attitude content and strength. This is not to deny that attitudes have functions. Reduction is not elimination.

1. The Cognitive-Affective Personality System (CAPS)

CAPS (Mischel and Shoda 1995) is a well-evidenced model of behavioural cognition that could ground the integration of social psychology's current unruly zoo of constructs.

CAPS models behavioural cognition as a connectionist system, with 'cognitive-affective units' understood as nodes connected by associations of varying strengths.

Connectionism: energy flows through the system, diffusing across the associations in proportion to their strengths; an association gains incrementally in strength each time energy flows along it.

The model is open to having the 'cognitive-affective units' defined by other areas of psychological research. What is crucial to the model is the connectionism.

It therefore looks to be a useful integrative perspective.

It provides an efficient explanation of attitude content, strength, and the relation between them, as we will see.

But it seems unable to accommodate attitude function, if this is understood as an irreducible dimension of attitudes. Hence my concern with this question.

2. Attitudes and their Components

Attitudes are often defined as cognitive states that relate an object to a valence; disliking celery relates celery to a negative valence; valuing democracy relates democracy to a positive valence.

I think the cognitive structure of an attitude is best understood as the set of cognitive and affective states that explain this overall valence.

My pro-democracy attitude is explained by a large set of my cognitive states, including my belief that democracy is the best way to keep the peace, my desire that peace be kept, my belief that democracy best co-ordinates the autonomy of the individuals ruled over, and so on.

This set is sometimes understood as the 'base' of an attitude that is a separate cognitive structure.

I think this proliferates structures unnecessarily, which carries an explanatory cost (see section 6).

We should instead think in terms of rough-grain and fine-grain – or, perhaps better, low-res and high-res – descriptions of the same cognitive structure.

3. Attitude Content

An attitude's content can be described in low-res (prodemocracy) or high-res (states comprising the attitude).

A high-res description can include states whose valence opposes the low-res valence (e.g. belief that current models of democracy give too much power to media owners) or ones that distinguish varieties of the object (e.g. preference for one voting system).

To put this in the metaphysical language I will use of attitude functions: the content 'pro-democracy' is *reducible to* this set of cognitive and affective contents.

Reduction is not elimination. I'm not denying that I have a pro-democracy attitude content. I'm not denying the utility (in some contexts) of rough-grained language.

I'm saying: my pro-democracy attitude is not a separate item caused by the set of cognitive-affective states that explain it; my pro-democracy attitude *is* that set.

4. Attitude Strength

An attitude's strength is not its degree of valence (which is an aspect of content), but how firmly the attitude is part of the cognitive system.

It's measured by how *certain* the subject is of it, how *important* it is to them, its *centrality* to their self-image, and whether it expresses a larger *value* of theirs.

These together predict the degree to which the attitude *persists*, how *resistant* it is to attempts to change it, how much it *influences cognition* and *influences behaviour*.

Talk of 'strong' and 'weak' attitudes might suggest a binary distinction, but this is just an artefact of how the scalar difference is operationalised.

5. Attitudes in the Personality System

Here is why I think CAPS helps to model attitudes:

- An attitude just is a set of cognitive and affective units connected by a complex network of associations.
- An attitude's content (whatever level of specification)
 is a function of the contents of that network's members.
- An attitude's strength can be modelled as a function of the strengths of connections between those members.
- The stronger overall the set of associative connections that bind the set together, the more *persistent* and *resistant* to change that overall attitude will be.
- The stronger this set of connections, the more easily and readily the attitude is brought to bear on cognition, so the more *certain* the subject is of it and the higher its *influence on cognition and behaviour*.
- Conversely, the more *important* an attitude is to the person, *central* to their self-image, and bound up with larger *values*, the more these associative connections will have been deployed in deliberation and behaviour.

6. Beyond the Recalled/Constructed Dichotomy

CAPS therefore explains why the measures of attitude strength predict the effects of attitude strength.

It also helps to motivate – and to refine – a promising solution to one of the long-standing problems of attitude psychology:

?- are attitudes persisting states that are recalled when needed - or - are they temporary states that are constructed when needed?

Maio and Haddock propose that strong attitudes are stable and enduring, weak attitudes constructed when needed (2010: 43).

This explains why weak attitudes are more malleable, not only by persuasion but also by subtle situational effects (including nudges) and by cognitive dissonance.

In each case, cognitive and affective states are added to the set from which the attitude is constructed.

With strong attitudes, by contrast, the low number and strength of associations between newly introduced members and the existing members of the set (relative to the number and strength between those existing members) would mean that newly introduced items would not exert much influence in the set as a whole.

CAPS provides a clear model of how this works.

But it also has three implications for this idea:

- Attitude strength is a matter of degree, so, it is not strictly true that some attitudes are recalled and others are constructed. Rather, stability across instances of the attitude expressed depends on its degree of strength.
- Content and strength are not mutually independent, even though they are mutually irreducible. The overall content of an attitude expressed is not simply a function of its components' contents, but also of the influence each component exerts over the attitude as a whole.
- Two attitudes equally highly stable when specified in rough grain (low res) might differ in levels of instability revealed by finer grain (higher res) specifications.

All of this explanatory and predictive role of CAPS rests on identifying the overall attitude with (reducing it to) the set of cognitive and affective states that explain it.

For if we think of the attitude as a separate cognitive structure – an association between an object and a valence, caused by the states that explain it – then we face a dilemma:

- Either we need to explain why these cognitive structures appear when needed and disappear soon after, when others are persisting states;
- *Or* we allow that they persist once constructed and need to explain why they are no longer influential when a contrary attitude is created.

The explanatory and predictive advantage of thinking of attitudes in terms of CAPS is partly that this dilemma does not arise

Instead, the existence and influence of the attitude is simply explained by the existence and influence of the states that comprise it.

7. So Where Does Function Fit In?

Problem: there seems no place for function in CAPS.

Content and strength fit in well because connectionism is all about strengths of associations between contents.

So it looks like CAPS model of attitudes requires that we *either* eliminate attitude functions altogether *or* reduce them to patterns of content and strength.

My preference is for reduction, since this preserves the explanatory and predictive utility of attitude functions.

Is this reduction plausible? Some salient functions ...

Object-Appraisal function is to maximise reward and minimise punishment, to facilitate approaching what is beneficial and avoiding what is harmful.

- served best by attitudes strong enough to have high level of influence over cognition and behaviour (Maio and Haddock 2010: 40); but also ...
- -what counts as reward, punishment, benefit, and harm must be determined by other attitudes, strong enough not to be simply revised to accommodate behaviour;
- object-appraisal function is thus strength combined with strong associations with other strong attitudes.

Value-Expressive function is to express an individual's self-concept and central values.

- since attitude strength is measured by how *important* it is to the subject, its *centrality* to their self-image, and whether it expresses a larger *value* of theirs (plus their certainty of it), all strong attitudes should fit description of value-expressive function;
- weaker attitudes serve this function by associating its object with an existing strong attitude; e.g. I have strong positive attitude towards healthy food and discover that blueberries are very healthy.

Social-adjustment function is to help one to associate oneself with or dissociate oneself from some specific social group.

- in high-res: the set of cognitive and affective states comprising the attitude includes belief about target group's attitudes and strong attitude towards group.

Ego-defensive function is to protect self-image from any threats. Example: negative attitude towards golf had by bad golfer who considers herself excellent at sport.

- I don't know what to say here. Please help. Thank you.

Works Cited

Maio, Gregory and Geoffrey Haddock. 2010. The Psychology of Attitudes and Attitude Change. London: Sage.

Mischel, Walter, and Yuichi Shoda 1995. A Cognitive-Affective System Theory of Personality: Reconceptualizing Situations, Dispositions, Dynamics, and Invariance in Personality Structure. *Psychological Review* 102: 246–68.