

Problems for Credulism

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[1] Paradigms of defeating evidence.

E: Ernie says Precious is a bird.

So F: Precious can fly.

Opposer: Orna says Precious is a dog.

Underminer: Ursula says Ernie is uninformed about Precious's species; he's just guessing.

Refiner: Regina says Precious is a penguin [...or a toy helicopter].

Opposers: speak *directly* for $\sim F$. [...but then indirectly for unreliability of E wrt F]

Underminers: speak *directly* for the unreliability of E wrt F, rather than for $\sim F$. [...but then indirectly for $\sim F$]

[2] Underminers screen off E from F?

$\text{Old}(F) \leq \text{New}(F|U) < \text{New}(F)$

$\text{Old}(F) = \text{Old}(F|U)$

Undermining can itself be defeated, comes in degrees, can be mixed with opposing or supporting information.

Smoke: I smell smoke, which tends to make me auditorially hallucinate.

Radio: I seem to hear a radio... So a radio is nearby.

Birds: I seem to hear birds... So birds are nearby. [Smoke undermines *and* opposes]

Siren: I seem to hear a siren... So firemen are nearby. [Smoke undermines *and* supports]

[3] First order evidence E for F [includes whether E is reliably connected with F]

“Higher order” evidence: whether E supports F, whether I'm justified in believing F, whether I'm bad at assessing E's bearing on F, whether I do believe E, ...

		Higher-order evidence or beliefs	
		can have downward impact	can't
First-order evidence or beliefs	can have upward impact	<NW>	<NE>
	can't	<SW>	<SE>

[4]

(a) I have toothache.

(b) My toothaches have 9 times/10 been followed by headaches.

(c) This toothache isn't a member of some more specific epistemically relevant class about which I have different inductive evidence. [just needs to be true? needs to be reasonably believed?]

So (d) I will soon have a headache.

Quotidian undermining evidence = evidence opposing (b).

Undermining evidence targeting reasonability of (a).

Undermining evidence targeting inference from (a) and other premises to (d).

[5] If (a) is to be defeasible, shouldn't it be decomposed into:

(a1) I have THAT.

(a2) THAT is toothache.

Or: (a2') THAT is the kind of thing I seem to remember learning to count as toothache,
and (a2'') My memory is reliable,
and ...

Eventually we'll reach premises I think we ought to count as immediately justified, and yet are still underminable.

Even (a1) is arguably such: let the undermining hypothesis be: "You may well be in condition C, in which subjects have illusions of thinking demonstrative thoughts of form (a1); *and* the best theoretical account of that says that subjects unsure of whether they're in C should be less confident of (a1)."

Dogmatism = immediate justification exists and can be [always is] *underminable* in this way. (Dogmatism about perception; the content of experience matches what you're immediately justified in believing; the justification comes from the internal phenomenology of the experience; do Moorean arguments exhibit this or that defect?)

Dogmatism -> Undermining, but not by opposing a premise you were epistemically relying on.

[6] Mediate justification can *also* be undermined without opposing a premise you were epistemically relying on.

Examples for the toothache/headache argument in [4]: "You're bad at doing this kind of induction." "There's no such thing as inductive justification..."

[7] **Credulism** = Some justification (whether mediate or immediate) can be undermined without opposing premises you were epistemically relying on.

[8] Some special awkwardness about combining dogmatism about perception and orthodox forms of probabilism?

Yes, but (i) it hasn't been adequately identified, and:

(ii) s/dogmatism about perception/dogmatism/

(iii) s/dogmatism/credulism/

[9] Credulism: The *benefits of some learning* can be undermined without opposing premises you were epistemically relying on.

(b) 9/10 past toothaches followed by headache

Not (b)

(a) I have toothache

(d) Headache soon!

Not (a)

(i) My pre-existing high credence in (b) and my structure of conditional credences *predicts* that raising (a) will raise (d).

(ii) s/predicts/explains why/

(iii) the benefit that raising (a) contributes to (d) *epistemically relies on* the pre-existing high credence in (b).

How to combine credulism with this picture? How to represent undermining that *doesn't* work by opposing premises you were epistemically relying on in this way?

Undermining of immediate justification: undermine not something “downstream” from what you learned, but undermine the learned proposition itself

Undermining of mediate justification: harder to know how to represent it in this picture. But presumably not [illustration].

[10] Classical updating:

Messy world \implies Some minimal formal characterization of an update (e.g., what proposition to conditionalize on) \implies Formalism tells you how to that update “propagates” over a full characterization of the subject’s epistemic state

Silence about the first step.

Plantinga’s climber.

Have experience E \implies conditionalize on “I have E”?

Get into X \implies update on *some* proposition e? [White restricts attention to subjects who are fully aware of what experiences they have. It’d be strange for *less* self-aware subjects to be capable of being *better* justified in their beliefs about the world. More thinking *can* make you epistemically worse off; can more *epistemic self-awareness*?]

Which proposition? A thought: Getting into an *underminable* epistemic position X can’t be updating on “I’m in X,” because you can undermine support for what you updated on, but confidence that you were in X (non-epistemically described) should still be available. [This holds for Jeffrey updating too.] So get into X \implies updating on some e other than “I’m in X”
Have E and have credence y_1 in u \implies conditionalize on e_1 ; Have E and have credence y_2 in u \implies conditionalize on e_2 ; ...

Here epistemically interesting stuff is happening offstage, outside the formalism.

[11] Jeffrey updating [illustration]

Messy world \implies Formal characterization of an update

$\{(e, 1+b), (\sim e, 1)\}$ where b is a non-negative real

Bayes Factors turn out to be what you need to keep invariant, for commutativity

[sometimes order matters?]

\implies How the update “propagates”

Jeffrey updating is “rigid” wrt the partition $\{e, \sim e\}$

$\text{New}(-|e) = \text{Old}(-|e)$

$\text{New}(-|\sim e) = \text{Old}(-|\sim e)$

$\text{New}(h) = \frac{\text{New}(h|e)\text{New}(e) + \text{New}(h|\sim e)\text{New}(\sim e)}{\text{New}(e) + \text{New}(\sim e)}$

$= \frac{\text{Old}(h|e)\text{New}(e) + \text{Old}(h|\sim e)\text{New}(\sim e)}{\text{New}(e) + \text{New}(\sim e)}$

(more...)

[12] As Weisberg argues in “Commutativity or Holism,” these formalisms can’t permit onstage *undermining* of the formally specified update. [Jeffrey can allow *opposing* defeat.]

Classical: You just become certain that e, doesn’t matter what your confidence is in any u--- unless that has an offstage bearing on what e you should be updating on.

Jeffrey (i): e:~e Bayes Factor is a good measure of how much an update confirms e. Intuitively, when the update is undermined, it should confirm e less. Yet Commutativity requires Bayes Factors to be invariant.

Jeffrey (ii)/Christensen and Weisberg: For any update that’s rigid on e:~e, if u starts out probabilistically independent of e [as it would if it’s a pure underminer] it must end so. So raising u after the update on e won’t lower e.

“The basic problem is that a probabilistic correlation between u and e needs to be introduced when experience E is had. Initially u has no probabilistic bearing on e, but it should have a negative bearing on e once e has been boosted on the basis of [having] E. Rigidity, however, prevents any such correlation from being introduced when E has its effects. Because conditional probabilities *on* e are held fixed, conditional probabilities *of* e cannot be amended.”

[13] That is the problem for credulism and orthodox forms of probabilism. Solutions?

* Abandon credulism

* Let this epistemic effect happen offstage.

* New formalisms that can represent the effect onstage.

* The effect *is* encoded in the priors; but we give up identification of “pre-existing high credence in Y predicts...” with “... epistemically depends on Y.”

(more...)

[14] Let's look at what the awkwardness combining dogmatism and probabilism is *said* to be.

Setup e supports h , u undermines that support, where $u \rightarrow e$, $u \rightarrow \sim h$.

$Old(e) < 1$

New is result of updating p with e

Results:

(i) $New(\sim u) < Old(\sim u)$ [because $u \rightarrow e$ and $Old(e) < 1$]

(ii) $New(h) \leq New(\sim u)$ [because $u \rightarrow \sim h$, so $h \rightarrow \sim u$]

So (iii) $New(h) < Old(\sim u)$.

How much of a constraint will that be? $Old(u)$ will usually be close to 0, since $u \rightarrow e$.

(iv) $Old(\text{if } e \text{ then } h) \leq Old(\sim u)$ [because $u \rightarrow (e \ \& \ \sim h)$, so $(\text{if } e \text{ then } h) \rightarrow \sim u$]

(v) $New(h) < Old(\text{if } e \text{ then } h)$ [a bit harder to show for Jeffrey]

So (vi) $New(h) < Old(\text{if } e \text{ then } h) \leq Old(\sim u)$.

That is, updating on e can't raise h higher than you had pre-existing credence in "if e then h ."

That is, when you update on some e that doesn't entail h , any benefit you get for h *epistemically depends on* "if e then h ."

[15] **Reject propositionalism about sources of justification?**

Have $E \implies$ update on any e ?

Should want *that update on e* to be underminable, not only its effect on h s that e doesn't entail

[16] Variations between your antecedent confidence in "if e then h " and whether/how much your update on e ends up raising your credence in h . What explains these?

* the support e gives you for h epistemically depends on "if e then h "

* both epistemically depend on another proposition further upstream

*** if e supports h , you must/should have high prior confidence in "if e then h " but you aren't epistemically depending on it**

[17] Why "must" you have high confidence in "if e then h "?

"Broomean" commitments

[18] Why "should" you have high confidence in "if e then h "?

(a) Have E [and things are otherwise good] \implies justified in believing h

(b) Now know I am/will have $E \implies$ justified in believing h ?

[Having E /updating on a proposition; also Reflection]

Suppose you [take yourself to have] a priori reason to believe you'll have E : is your justification to believe h *a priori*? [disambiguate; some justification is had before having some experiences \rightarrow it's epistemically prior to the justificatory force of those experiences]

(c) Hypothesize I'll get into E : then h . So justification to believe "if I have E , then h " is *available*?

Such justification to believe "if I have E , then h " epistemically depends on E .

When you get E , you're entitled to believe h directly (and that's why you *could* earlier be justified in believing "if I have E , then h "); it's not that you have to get h by modus ponens (relying on antecedent justification for "if I have E , then h ").