1. The phenomenal content thesis

Two responses to apparent examples of changes in content w/o phenomenal character: appeal to phenomenal content, or say that there can be distinct but indistinguishable phenomenal properties.

The proponent of phenomenal content holds something like the following principle:

Distinctness/Distinguishability

Necessarily, for any phenomenal properties $F$, $G$ such that $F \neq G$, if $A$ instantiates $F$ and $B$ instantiates $G$, then what it’s like to be $A$ is distinguishable from what it’s like to be $B$.

Why tie phenomenal content to Distinctness/Distinguishability? If one did not think of phenomenal properties as satisfying Distinctness/Distinguishability, then there would be no reason to look for a special sort of content which supervenes on phenomenal properties: one could say that phenomenal properties supervene on the sorts of representational properties discussed above, which include external objects, like our golf balls, as constituents.

In looking for a kind of content that supervenes on phenomenal character, we have to remember that the wanted identity thesis requires us to preserve supervenience in the other direction as well. Given this, and the fact that we want the phenomenal content thesis to entail Distinctness/Distinguishability, we might define the phenomenal content thesis as

Phenomenal Content Thesis

There is a class of representational properties $R$ such that, necessarily, $A$ and $B$ are alike with respect to their $R$-properties iff what it is like to be $A$ is indistinguishable from what it is like to be $B$.
The Phenomenal Content Thesis is entailed by three claims: the claim that phenomenal properties are identical to some representational properties; Distinctness/Distinguishability; and the (presumably undeniable) claim that distinguishable phenomenal properties are distinct.

2. THE PROBLEM OF PHENOMENALLY SILENT CONTENTS

Let’s begin with the fact that a pair of experiences of indistinguishable golf balls might be indistinguishable, and yet differ in content. Our aim is to find contents in common between a pair of phenomenally identical experiences which, respectively, represent $b_1$ and $b_2$. Given Distinctness/Distinguishability, the singular propositions which attribute various qualities to $b_1$ and $b_2$ won’t do; but how about the corresponding existentially quantified propositions which ascribe these qualities to something in the environment of the perceiver?

Problem: this commits us to the claim that perceptual experiences have these sorts of existential propositions among their contents. But the claim that experiences have existential propositions as their contents is counterintuitive: perceptual experiences seem to be directed at particular things. When I look at a tomato, it seems to me that I am representing a particular thing as red and round — not that something or other is red and round. Of course, I might well come to believe this general proposition on the basis of the experience — but that is not sufficient for it to be part of the content of that visual experience.

A better view: Consider again our experiences of the golf balls. Simplifying (and ignoring for now questions about the visual representation of size and location), let’s say that these have as contents the propositions expressed by

- $b_1$ is white & round & of such-and-such size & in location $l$ relative to me
- $b_2$ is white & round & of such-and-such size & in location $l$ relative to me

We need to identify some representational property in common between these phenomenally identical experiences. But to do this we needn’t ascribe to each experience the further content

$$\exists x \,(x \text{ is white & round & of such-and-such size & in location } l \text{ relative to me})$$

Instead, we can just point out that both experiences have as their content a proposition which is a value of the propositional function corresponding to the open sentence

- $x$ is white & round & of such-and-such size & in location $l$ relative to me
This propositional function is not, of course, a proposition; but this shouldn’t matter. The point of phenomenal content is to find some representational property of subjects with which phenomenal character can be identified. That representational property might be: the property of being such that there is some value of the relevant propositional function such that the subject stands in the relation of sensing to it. There’s no need to, in addition, require that these subjects bear the attitude of sensing to the proposition that this propositional function is true of something.

Extending this strategy to representation of kinds.

The reason why this strategy works is that perceptual representation of objects and natural kinds is ‘phenomenally silent’: there cannot be a pair of experiences which differ representationally only in which objects and properties they represent as in the environment, and which are distinguishable from each other. The above strategy appears to be a perfectly general way of dealing with phenomenally silent contents, which would otherwise appear to be a counterexample to the conjunction of Distinctness/Distinguishability with the identity of representational and phenomenal properties. Whenever confronted with a subject who stands in the sensing relation to a content $P(c)$ which contains some phenomenally silent constituent c, the proponent of the Phenomenal Content Thesis should (setting aside the complications to do with attention discussed above) identify the subject’s phenomenal properties with the following representational property: the property of standing in the sensing relation to some value of the propositional function $P(x)$.

3. PHENOMENALLY SNEAKY CONTENTS

The argue against the Phenomenal Content Thesis it suffices to show that there can be a pair of indistinguishable experiences which differ with respect to the representation of class $C$ of properties, despite the fact that members of $C$ are not, in the above sense, phenomenally silent. Let’s call properties of this sort *phenomenally sneaky*. More formally:

A class $C$ of properties is phenomenally sneaky iff (i) there can be a pair of experiences which are indistinguishable from each other and yet differ only in their representation of the $C$-properties, and (ii) there can be a pair of experiences which are distinguishable from each other, and yet differ only in their representation of the $C$-properties.

If the $C$-properties satisfy (i), then representation of $C$-properties cannot be a part of the representational properties mentioned in the Phenomenal Content Thesis, since, if they were, a pair of experiences of the sort guaranteed by (i) would falsify Distinctness/Distinguishability, and hence the Phenomenal Content Thesis. But if the $C$-properties satisfy (ii), representation of the $C$-properties must be a part of those representational properties, since otherwise a pair of experiences of the sort guaranteed by (ii) would be a pair of experiences which were distinguishable yet alike in the relevant representational properties, which again would falsify the Phenomenal Content thesis.
So to argue against the Phenomenal Content Thesis, it suffices to argue that some properties are phenomenally sneaky.

3.1. Phenomenal content and phenomenal continua

Imagine, to take the standard example, that we have a series of color patches such that each color patch in the series is indistinguishable (to some subject) from the next, but that the first is distinguishable from the last. If this relation holds between the color patches as experiences by some subject, then an analogous relation appears to hold between the phenomenal character of the subject’s experiences of the color patches: the phenomenal character of each experience in the series is indistinguishable from the next, but the first is distinguishable from the last. Let’s call any such series a phenomenal continuum.

If there are phenomenal continua, then colors are phenomenally sneaky. For, given the sort of intentionalist thesis argued for above, the first and last experiences in the series must differ in their representation of color properties. But sameness in the representation of color properties is transitive: if one e1 represents the same color property to be instantiated as e2, and analogously for e2 and e3, it follows that e1 and e3 also represent the same color property to be instantiated. Hence it follows if the first and last experiences in the series differ in their representation of color properties, so must at least two consecutive experiences in the series. But by the description of phenomenal continua these experiences will be indistinguishable from each other; hence color properties satisfy clause (i) of the definition of phenomenally sneaky properties.

But they plainly also satisfy clause (ii), since two experiences could be alike representationally but for their representation of the color of one or more objects, and yet be distinguishable. Hence if there are phenomenal continua, then colors are phenomenally sneaky, and the Phenomenal Content Thesis is false.

Though running the argument in this way will be convenient for reasons which will become clear below, one could also establish the same result by arguing that phenomenal continua show the falsity of Distinctness/Distinguishability, which is entailed by the Phenomenal Content Thesis. For the first experience in the series must have a different phenomenal character than the last. And if the first experience has one phenomenal character — say, C — and the other has another phenomenal character — say C* — then there must be a change in phenomenal character at some point in the series, which means that there must be a pair of consecutive experiences in the phenomenal continuum which have different phenomenal characters. But since each experience in the series is indistinguishable from the next, this entails the falsity of Distinctness/Distinguishability.

Reply to this argument: say that ‘sameness of phenomenal character’ is intransitive.
But it is hard to see how this could be a satisfactory stopping point. Talk about the ‘phenomenal character of experience’ is just a way of talking about the phenomenal properties of subjects. But if there are such things as phenomenal properties, sameness of these properties just can’t be intransitive. Indeed, it’s a bit hard to see what this would mean, if not the absurd claim that there are times t1, t2, t3 such that A is alike in being F at both t1 and t2, alike in being F at both t2 and t3, but not F at both t1 and t3. Hence, if it’s to be coherent, denying the transitivity of ‘sameness of phenomenal character’ must be a way of denying that there are such things as phenomenal properties of subjects. But this is hard to swallow.

Are there phenomenal continua? Two arguments for:

1. From finite perceptual discriminatory abilities.
2. From experience.

Problem with argument 1: the possibility that our discriminatory abilities might be ‘quantized.’ Further question: could they be necessarily quantized? Response: yes, since this follows from Distinctness/Distinguishability.

Problem with argument 2: if there are phenomenal continua, there are three-member phenomenal continua.

Graff’s argument against the possibility of phenomenal continua: they falsify platitudes like “If any two patches look the same in respect of colour, then if one looks red so does the other.” How to falsify this platitude by using it as the inductive premise in a sorites argument, given the existence of phenomenal continua.

Reply: two interpretations of “looks the same”: (i) ‘is represented as having the same color’; (ii) ‘is indistinguishable from.’ But we can grant the truth of Graff’s platitude under interpretation (i), and it is not so hard to deny it under (ii).

This line of argument against the Phenomenal Content Thesis is a general one. If phenomenal continua are possible with color representation, they’re also possible with perceptual representation of size, shape, location, etc. Hence if phenomenal continua are possible, all of these properties are phenomenally sneaky.

3.2. **Perceptual constancies and phenomenal match**

A quite different way of arguing for the existence of phenomenally sneaky properties begins with examination of perceptual constancies.

Cases of perceptual constancy are typically presented as cases in which a subject’s visual system represents some quality of a perceived object as constant despite certain phenomenal changes over the course of the subject’s experience. So, for example, cases of
lightness and color constancy are cases in which the color of an object is represented as constant despite changes in illumination; cases of size constancy are cases in which the size of an object is represented as constant despite changes in relative distance (and hence changes in the size of the relevant retinal image); cases of shape constancy are cases in which the shape of an object is represented as constant despite changes in relative orientation (and hence changes in the shape of the relevant retinal image).

It is natural to think of these as cases in which overall phenomenal character is a function of two different represented qualities. Consider, for example, a normal visual experience of a receding object. There is an obvious phenomenal difference between an experience of the object when it is relatively near and when it is relatively far; and this corresponds to a difference in the representation of the object’s relative distance while the object’s size is represented as constant. The phenomenal character of the subject’s experience is a function from the pair of the constant quality (size) and the variable quality (relative distance). Good evidence for this is that any difference in ‘size phenomenology’ brings with it a difference in one or the other.

This seems to be a general feature of cases of perceptual constancy. In each case, the phenomenology seems to be function $f$ of some quality $c$ represented as constant and some other quality $v$ represented as variable. This raises the question of whether it is possible that

$$f(c_1, v_1) = f(c_2, v_2)$$

for $c_1 \neq c_2$ and $v_1 \neq v_2$. Call these cases of phenomeunal match.

If cases of this sort were possible, then the $c$-properties and the $v$-properties will be phenomenally sneaky.

(It might still be the case that representation of either $c$ or $v$ supervenes on phenomenal character plus the facts about the representation of the other quality, but this would not be enough to give us phenomenal content, since a given phenomenal character would be consistent with more than one combination of representational facts about the two qualities.)

Of course, this is only an objection is there is reason to believe that cases of phenomenal match are possible. But I think that a reasonable case can be made that they are. Here’s a possible example involving shape constancy:

Experience 1: An ordinary quarter is suspended in the air in front of me and rotated slightly so that, as we might say, it “looks elliptical.” Though we might describe the case this way, it is a standard case of shape constancy, so it looks
like I am representing the shape of the quarter as constant (circular) and its orientation as varying as it is rotated.

Experience 2: I get an elliptical piece of metal done up in just the right way to “look like” a rotated quarter. I can hold the piece of metal in my hand and see its shape clearly. It is then suspended in the air in front of me so that the phenomenal character of the experience matches the phenomenal character of experience #1. Presumably when the piece of metal is in my hand I am able to visually represent it correctly as elliptical; and there seems to be no reason to think that I should represent its shape as changing while it moved to the position in which it is suspended in the air in front of me. So at the end I am still representing the shape of the coin as elliptical.

This is also enough to show how analogous cases might be constructed for other perceptual constancies. For example, we can imagine differently sized but otherwise indiscernible objects moved different distances from the subject (against a featureless background) to create a pair of experiences with the same phenomenal character. If the initial experiences of the objects sizes are veridical — and there’s no reason to doubt that they could be — then the initial experiences of their sizes will represent them as of distinct sizes. If the objects exhibit size constancy in the usual way, as the objects are moved further away from the subject, they will appear to stay the same size. Hence the phenomenally identical experiences will, in this sort of situation, represent the objects as of distinct sizes, from which it follows that representation of size (and relative distance) fails to supervene on phenomenal character.

We might also imagine objects of different lightness viewed through changes in level of illumination, or objects of different hue viewed through changes in the color of the light under which they are presented.

Reply 1: Consider again the two “quarter” experiences above. What the friend of phenomenal content needs is some representational property of these two experiences which is such that (i) the two experiences each have this property and (ii) any two experiences which have this property have the same phenomenal character. How about this disjunctive property: the property of either visually representing a circular shape at (say) a 30 degree relative orientation or representing an elliptical shape at a 0 degree relative orientation. This seems to satisfy (i) and (ii).

The problem, however, is that once we see how examples like the above “quarter” experiences can be generated, we can also see that, if the above cases are possible, then indefinitely many other such examples are also possible. And that means that we won’t be able to rest with the disjunctive property mentioned above; instead we’ll need a disjunctive property with indefinitely many disjuncts to handle the indefinitely many
shape/orientation combinations which can be combined to give us an experience with the right phenomenal character.

Could phenomenal properties be identical to indefinitely long disjunctive properties like the one sketched above? It seems not: if there’s any property with which I can be directly acquainted, grasp, and self-predicate, it is the property of having an experience with the phenomenal character of my experience right now. But then suppose for reductio that this is identical to an indefinitely complex disjunctive property; it follows that I am immediately acquainted with, grasp, and self-predicate this indefinitely complex disjunctive property. But I can’t do any of these things. Hence no such claim of property identity can be correct.

Reply 2: The proponent of phenomenal content might try to get around this problem by appeal to a very coarse-grained view of the contents of perceptual experience. If we think of the contents of perceptual experiences as sets of possible worlds (or centered worlds, situations, or other truth-supporting circumstances), then we can avoid the use of disjunctive representational properties, since there is a set of circumstances in which experiences with the phenomenal character of the “quarter” experience are veridical. It is the set of worlds in which the quarter is circular and at a 30 degree orientation or ... [fill in the relevant disjunction here]. And specifying the relevant set of worlds via disjunction needn’t make the content itself disjunctive; on this conception of content, there’s no such thing as a disjunctive content, since contents are simply unstructured collections of circumstances.

But this very coarse-grained view of content is unsuitable for the purposes of the proponent of phenomenal content. It is certainly true that making the contents of perceptual experiences coarse-grained makes it easier for those contents to supervene on phenomenal character; but, by minimizing differences between contents, it also makes it harder for phenomenal character to supervene on sensed content. Examples: experiences with impossible contents.

3.3. Phenomenal content and the representation of change

The problems for phenomenal content which result from perceptual constancy seem to stem from the fact that the content of an experience at \( t \) can vary depending upon the phenomenal character of the subject’s experiences immediately leading up to \( t \). It seems essential to the “quarter” experience, for example, that one being able to inspect the quarter (and the elliptical fake quarter) before they are moved into the relevant orientations. We can also use this feature of the content of experience to construct an argument against phenomenal content using the representation of motion:

Suppose I am playing a carnival game where I have to shoot a duck which moves slowly from left to right. But the game is broken, so that the duck moves very, very slowly (though visibly). In fact, it moves slowly enough that were I to
quickly open and shut my eyes, it would be impossible for me to tell that the duck was moving at all. Now imagine some experience $e_1$ in the series where the duck is moving which is short enough that it has the same phenomenal character as the open-and-shut eyes case.

Next, imagine another series of experiences the next day, when the game is really broken, and I am staring at a stationary duck, and select an experience $e_2$ of the same duration as $e_1$.

If the foregoing is correct, it seems that $e_1$ and $e_2$ will be alike in phenomenal character. After all, it was stipulated that the duck was moving slowly enough that, had I opened and shut my eyes at the beginning and end of $e_1$, I would not have been able to tell that the duck was moving.

But it seems that these two experiences will differ in content. $e_1$ is part of a visual experience during which I represent the duck as in constant motion; hence during $e_1$ I am presumably representing the duck as in motion. There’s no reason to think that $e_2$ is anything other than a veridical experience, so presumably in $e_2$ I am representing the duck as stationary.

This, like the examples involving perceptual constancy, is a challenge to the existence of phenomenal content. And as in the case of perceptual constancy, the defender of phenomenal content can reply in one of two ways: by trying to show that the two experiences really do differ in phenomenal character, or by trying to show that they really do have the same content.

Against the first option: Imagine that a molecule-for-molecule duplicate of the subject of $e_1$ is created, and is in existence for just the duration of $e_1$. The phenomenal character of the subject’s experience would (again, given internalism about phenomenology) be indistinguishable from a similarly short-lived subject looking at a stationary duck. Wouldn’t the experiences of each represent the duck as stationary?

So let’s consider instead the possibility of denying that the experiences differ in content. The most plausible way to do this seems to me to be to say that, although the full experience of which $e_1$ is a part represents the duck as moving, $e_1$ itself does not. The problem, though, is that the full experience can be divided without remainder into $e_1$-sized chunks. If we think of the full experience as a series of such chunks, we’ll then have to say that no experience in the series represented the duck as moving, but that the whole series of experiences together did. But this has some odd consequences. Presumably if $e_1$ did not represent the duck as moving, it represented the duck as stationary. (This is anyway needed to get us to phenomenal content, since it should be uncontroversial that $e_2$ represents the duck as stationary.) But that means that (again by parity), during the full experience of the moving duck, the subject is constantly representing the duck as
stationary. How can this be reconciled with the fact that the subject of the experience is representing the duck as in constant motion?

There is also a more radical response available to the defender of phenomenal content, and that’s just to deny that it makes sense to talk about the phenomenal character, or content, of part of an extended visual experience. But this is, again, hard to believe. There surely was something that it was like to be the subject of $e1$, and this is sufficient for $e1$ to have a phenomenal character. And we can certainly imagine asking, of that subject: At what point did he represent the duck as being at that location? This question should have an answer; but any such answer will attribute a content to the visual experience at a particular time, rather than over the whole course of the experience.