

How Sensory Intentionality Is Caused

I will explain how the sense faculty uses a physical form to produce an immanent act of sensing in which the object has an intentional existence. This explanation will not require the special action of God.

The sense faculties do not get an intentional form from a special act of God. All physical forms are potentially the sources of intentional existence. For as Aquinas says early in the *summa theologiae* (I 3, 2 ad 3), form is not individuated of itself. This is an insight that Thomists have not sufficiently taken account of. Just as prime matter has no being of itself and is just a principle of individuation, so form has no individuation of itself. The cash value of this statement is that a form is a principle of communication and union between beings just as matter is a principle of incommunication and division between beings. Matter is a principle of incommunicability; form is a principle of communicability.

That is why any agent can produce an effect. A form existing first in the agent then exists in the patient. In both the agent and a patient the form is individuated. However, it is not individuated as a form but as a received form. Therefore as an acting form it can be shared by both the agent and the patient. This is true of the physical forms that the environment imposes on the sense organs. To be specific, the state of act that the environment imposes on the sense organs is a state of motion. Motion is an incomplete act. It is therefore an incomplete form. But to the extent that it is a state of act it is, like any form, a principle of communication shared between beings. I will continue to refer to it as a form received in the patient, the sense organs, from the agent, the environment.

1.

How does intentional existence come about in sensation? On the side of the object, no form is restricted to being a form of a given subject of itself; so it can unite two subjects intentionally. On the side of the agent, the act of sensation is caused by the substantial form alone, not by the union of form and matter.

The sense faculties do not produce their own form but get intentional existence out of the physical form. Because the body is a composite of matter and substantial form, action received by the body's sense organs is also received by the body's substantial form. Once the environment acts transitively on the sense faculty, the sense faculty can perform the immanent act of sensing. It is enough that the immanent act of sensation be an act of the substantial form alone for the already present transitive action to acquire an intentional existence. Sensation is an act aiming at this object because it is specified by this object, specified by a transitive action that is already physically acquired because it has been acquired by the union of substantial form and matter, the body. But once acquired, the transitive act is able to specify an immanent act that is intentional because the immanent act is performed by the substantial form alone. The sensitive substantial form possesses again what it already possessed through the sense organs, that is, through the body of which it, the substantial form, is a part.

The sensitive soul has an action of its own, an action not belonging to the union of soul and matter, the body, except indirectly. Because the soul acts on its own, the form received from the sensed thing can be the principle of an intentional action. To be the principle of an intentional action it does not have to be a special kind of form, and the external agent does not have to exercise two different kinds of acts on the sense organs. Any form can be the principle of an intentional action, because no form is individuated, restricted to being the actuation of only this potential subject, on its own, or in itself. Any form can be an "idea" (Simon's term) if received by the appropriate receptor. Therefore the right kind of agent can use this form for an intentional action. The right kind of agent is a substantial form that produces actions on its own, not actions of the composite. Because the substantial form is not in itself a principle of incommunicability, by acting on its own it can perform an act that intentionally unites it with another thing. Although that agent produces actions of its own, it uses the form received in the sense organs to produce its act,

uses that form as the specifier of the act produced. That use is the sense in which the sensitive soul uses the body as an instrument. The body does not just supply the object, as in intellection, but the form that specifies the power toward the object.

By providing the sense faculty with a specifier, the action of the environment puts the previously potential sense faculty in act so that it must produce the act of sensing. So there is a prior efficient causality to the efficient causality by which the sense faculty produces its act. That prior efficient causality is the efficient causality that imposes the action of the environment on the sense organ and therefore on the faculty of sensation, which faculty belongs to the substantial form alone because its act belongs to the substantial form alone. In this way, efficient causality on the sense organ becomes the formal causality by which the sense faculty is actualized and therefore produces its immanent action. Because the body is a composite of matter and substantial form, action received by the body's sense organs is also received by the body's substantial form. Having been put in act by the physical transitive action of the environment, the substantial form produces another act, an intentional immanent act, which is an act of the substantial form alone.

For an operative potency that is not always performing its act to perform its act, the potency itself must be put in act passively by another cause. For example, the agent intellect puts the potential intellect in act; the intellect puts the will in act. The action of the environment puts the sensory power in act. What happens in sensation is what happens in the case of any immanent act that is not always taking place. For an immanent act that is not always taking place, the faculty of the act must move from potency to act, from potentially performing the immanent action to actually performing it. But nothing moves itself from potency to act. So for an immanent act to take place its faculty must first be activated passively by receiving a transitive action. For example, an appetite cannot perform an immanent act of desire until a cognitive faculty has presented it with an object.

That is, until a cognitive faculty has imposed a form on it. Likewise, the potential intellect must receive a form from the agent intellect, so that the potential intellect now activated can perform the immanent act of knowing.

The coming into existence of the immanent act of sensing is simultaneous with the reception of the transitive act on the part of the faculty. Likewise, once cognition imposes a form on an appetite, an elicited act of desire exists. But in the case of sense faculties, the act received transitively that puts the faculty in an act is a motion, a state of passion. So the act performed by the sense faculty itself can only exist as long as the motion exists. In this way, the act of the sense faculty depends on its object in the order of exercise, the object being the received action cognized as action. Also, since the received act that puts a sense faculty in act is only a motion, sense powers are the lowest cognitive powers, and are not sufficient in the order of exercise to produce a specifier by themselves. Nor are they sufficient to produce a specifier distinct from the immanent act of sensing. That is, the immanent act of sensation does not virtually include a transitive act by producing a specifying form distinct the act of sensing, such as a concept or idea, as its instrument.

2.

I am claiming that the animal substantial form performs an action of its own, an action belonging to the form not to the composite. Does that claim imply that this substantial form is subsistent? No. The only reason that the sensory environment can act on the substantial form is that this is a form united with prime matter resulting in the existence of a physical subject. So the fact that the environment can act on this substantial form gives no reason whatsoever for considering this substantial form a subsistent substantial form, because the power that performs the immanent act of sensing is a power put in act by the physical action of the environment. And the physical action of the environment can put that power in act only because the form to which the power belongs is a form that unites with

matter to constitute a physical agent. There is nothing here indicating the subsistence of that substantial form. On the contrary, this analysis points to its being not subsistent insofar as it is a substantial form capable of producing acts of sensation.

The reason that a material substantial form such as an animal's soul is able to be the agent of an intentional act is, as was said above, that form is not individuated of itself. Therefore form is not a principle of incommunicability of itself. It is a principle of communicability, of shared reality, of communication between things. That is also why the intellectual soul is able to do what it does. But giving the animal substantial form an act that it performs "on its own", or better said, an act of its own, does not make the animal substantial form a candidate for immortality, because it does not make the animal substantial form subsistent. Although sensation is an act of the substantial form alone, not of the body composed of matter and form, it cannot take place except through the actualization of the substantial form by means of the actualization of the whole, the body, of which that form is the part. So the animal substantial form could perform no act in the state in which it, the substantial form, was separated from matter. So it could not exist in separation from matter.

The argument for the immortality of the rational soul first establishes that the soul has subsistence and immateriality. But the immateriality in question is proven by the fact that the soul can relate to universals as such. Since matter is the principle of individuation matter must not enter into the causing of that activity. None of this applies to the animal soul even given the fact that the animal soul has an activity of its own of the kind I have described here.

Pedagogically, it may be helpful to look at this way. If we had discovered the fact that sensation was an act of the soul alone before we discovered that intellection was an act of the rational soul alone, we would not be tempted to even ask whether this discovery

argues for the subsistence of the animal soul. Nor to ask whether the animal soul was "immaterial" in the sense in which the rational soul is. As Wittgenstein said, "don't think, look." Look at the situation I just described, the situation of a power being put in act because that power belongs to a form that is capable of being acted on physically by the physical environment. That kind of substantial form is not by that fact subsistent. Rather, if that is the only kind of immanent act this substantial form is capable of, this substantial form quite obviously is not subsistent. There is nothing in such a substantial form that can act independently of the form's dependence on matter, independently of the form's relation of inhering in matter. Rather, the action of that form is entirely dependent on the form's ability to receive physical action precisely because it is the form of a physical agent that is made such an agent by the form's union with matter.

Of course we have to work out the exact wording of how the act of the rational soul relates to the body as opposed to how the act of the animal soul relates to the body. We say that the rational soul depends upon the body only for the presentation of an object and that the animal soul uses the body as an instrument, in the way described above. But however these exact wordings are worked out, we won't have to say that the animal soul is immortal or that the rational soul is not immortal.

One of the reasons that Simon's position is not sufficient is that the same alleged double action on the part of the external agent must take place in every physical transaction. But every physical transaction does not result in the intentional existence of an object. The nature of the faculty on which the alleged double action takes place must have something to do with the existence of a result that is an intentional result. In confirmation of this think of anesthesia. The double action is presumably already present in the sense organ. But that double action has not produced an intentional existence because the faculty is not properly disposed. In addition to the action received from the environment, the

nature of the faculty has to have the right kind of ability to take advantage of that alleged double action. So why not just put the capability in the faculty rather than in the alleged second level action?

Please take note how radically nonCartesian my theory of sensation is. By giving the act of sensation to the soul alone, I might appear to be Cartesian. But the soul that performs the act of sensing is not a substance. Therefore it is not a separate substance from the body. The soul that performs the act of sensing is the animal substantial form. Moreover, the soul is put in act so that it can produce the immanent act of sensing by the physical action received in it because the physical action is received in the body of which the soul is a part. Likewise the object of the immanent act of sensing is that same physical action that put the soul in act so that it can produce the immanent act of sensing. So the new element provided by the soul alone, that is, the immanent action, exists in the context of a causal system, and only exists because of its place in the context of causal system, that is through and through physical. Because the new element is an act of the form alone, we might tend to view that new element in abstraction from all the other elements. But if we do so we are distorting the reality we're trying to understand.

3.

A state of the sense organ is the means through which awareness of the object takes place, but this state cannot be just a form previously received and now existing in the organ. Such a form would have no relation to another; and so it would have no relation to the object. A received action, however, has a relation to another, a relation to another essential to its very existence as an action; for a change's relation of dependence on its efficient cause is what makes the change an action. Another form may have a relation to another that ceases to exist when the term of the relation ceases to exist. For example, my size may have a relation of double to another size. But that relation can cease to exist when

the other size ceases to exist or changes. But action is related to another such that if the other ceases to exist, the action ceases to exist. So the means through which awareness takes place is a state of action, and this state is a means to awareness of that to which the action is related, a means to awareness of something other than the action. For to be aware of action as action is to be aware of it as coming from its agent.

In sensation we produce an act as an entitative existent, but the object of that act is action as dependent on the external agent, and so the action's dependence on an external agent now exists intentionally. The intentional existence of that dependence results from us; the entitative existence of that dependence results from the environment.

I place my hand close to a source of heat. Because of anesthesia I do not feel the heat, although the temperature of my hand is raised. Now the anesthesia wears off. The heat in the hand that already exists there physically now also exists there intentionally. We go from relating to something as a passion to relating to it as an object. At the same time that we relate to it as an object we relate to it as an action. The sensory object is action known as action, action objectified as, or cognized as, action.

To say that action as action is the sensory object is to say that action as action is the cause of sensation in the order of specification. How does it come about that this kind of cognition, unlike other kinds, has for its cause in the order of specification not just action but action objectified as action, as emanating from an agent? This can be the case if and only if action is also the cause of the sensation in the order of exercise. The physical action must be an efficient cause of the sense act in the order of exercise, such that whatever other efficient causality there might be, the sense act cannot take place without its physical efficient causality.

External action must be a cause of sensation in the order of exercise because it is the cause of sensation in the order of specification. The cause in the order of specification is

action grasped as action. If this action were not also a cause in the order of exercise, the causes of sensing in the order of exercise could operate and could bring a sensation of an object about in the absence of such an external action. But it would be impossible to relate to that object as action experienced as such, unless the sense faculty were actually undergoing that action. Hence that action must also be a cause in the order of exercise. That is, in sensation, the object that is the cause of our cognition in the order of specification includes, as one of the features that causes our cognition in the order of specification, the causing of our sensation by that object in the order of exercise. The object of a sensation that was not caused in the order of exercise by the external action, of sensation that could be brought about in the absence of such an external action, could not be action grasped as action. For it could take place in the absence of the action.

And since the necessary and essential means for the sensory faculty's act is action received in the organ from the agent, the sensation necessarily objectifies the agent as a real existent; in other words, the object necessarily includes the real existence of something as acting on the sense organ. To say this is NOT to say that the existence of the agent is arrived at by inferring its existence as something hidden behind the sensory object that awareness of the object reveals only indirectly. Awareness of action as action is direct awareness of action as dependent on an agent and so direct awareness of the real existence of the agent. The awareness that the object causes is awareness of the object itself. So at least part of the object we are aware of is action, causality, on the sensory power, perceived as action, as causality or causal dependence.

We are aware of actual existents sensed as such (as actual existents) as causes of our awareness in the order of exercise. An imaginary apple and an actually existing sensed apple are both causes of our cognition in the order of specification. The sensed apple is also a cause of our cognition in the order of exercise, and in sensation we are aware of the object

as causing our cognition in the order of exercise.

Another reason for the inadequacy of Simon's view is that the intentional action of the object on the sense would not be enough to make sensation intuitive. Even the intellect receives forms intentionally by the action of the agent intellect. But the forms received from the agent intellect do not objectify the agent of the form, but something else. The senses are intuitive because the form received objectifies the agent of the form. And that is because the form by which the senses know, the form they receive, is the action received from the agent objectified as action from the agent.

4.

Now I will consider the objection that the immanent act itself can be considered a form produced by the sense faculty. So the sense faculty could be said to produce a specifier through which the object is made present to the faculty. Yes we can call the immanent act a form, as we can call in a state of act a form. But the causal significance of so calling it is clearly different on the sense level from what it is on all other levels of cognition.

When it produces the sense act does the sense power produces anything entitatively new? Yes, it produces the immanent act. The question is does the immanent act also produce something else. In other words does the sense power produce anything new other than the immanent act itself, in particular, does it produces a new intentional form through which the immanent act takes place? The answer is no. Higher immanent acts, for example, those of the intellect, envelope productive acts of new forms. This is what Simon describes. The senses are too low for that.

Once sense cognition has taken place, all interior forms of cognition are able to take place. The interior forms of cognition envelope the production of new forms; these productive activities are ancillary to the immanent acts of cognition. But there is a huge

difference between the function of these new forms and the immanent act that exists in sense cognition. Once interior acts of cognition have taken place, we are in an habitual state in which we can either recall or recreate the forms through which the object of the interior act is present to the interior act. The object of the sense act cannot be made present again by an act of the senses, except through a new act of the object imposing a new state of motion on the sense organs, a new state that is the form through which the immanent act of sensing takes place. If we want to call the immanent act a form, it does not have the causal function of being that which makes the object present, as is the causal function of the forms produced by all of the interior acts.

Only the act of the environment on the sense organs makes the object of the sense faculty present. If we call the immanent act a form, a specifier, it is not a specifier that puts us into an habitual state of being able to recall that object the way it was present when that form was produced, when the specifier was produced. That is what we can do in imagination, memory and intellection. So calling the sense act a form does not have the causal cash value relative to sensory cognition that the forms produced by other kind of cognition have.

There is still some advantage, however, to describing the immanent act produced by the sense faculty as an intentional form. (If we do, we should not call it an expressed intentional form, since an expressed intentional form implies that there was previously an impressed intentional form, and in this case the previous form was not yet an actually intentional form. Intentionality does not actually exist until an act of sensation exists.) The advantage is that we can call the form produced by the senses an impressed species relative to the forms produced by acts of imagination and memory, expressed species. So there would be an intentional form prior to the intentional form produced by the act of imagination. There would be an intentional form that would be a source of the intentionality of the form produced by the imagination. For all higher acts of cognition seem to produce such an intentional form on the basis of a prior intentional form.

The senses are aware of the environment's action on them as action precisely because the environment does not communicate an intentional form, only a physical form. Therefore the intentional form produced by the senses when moved from potency to act can attain no other object than the object that moves them from potency to act. In the dark, the eyes are ready to produce awareness of color but need to be united with an object, united with an object not by a cause that will directly produce an intentional union, the senses themselves to that, but by a cause that physically moves the intentional cause from potency to act.

In sensation, the terminus of the immanent action, the object of sensation, is physically present, or else the immanent action would not be taking place. The object, therefore, does not need a medium between it and the faculty, a medium such as an expressed specifier. The object is the very action by which the faculty is moved to act (objectified as action, that is, as emanating from the agent). Therefore the presence of the

object does not require another form, another state of act. In the case of other cognitive powers, the object is not the very physical existence of something; so the physical existence of something cannot account for its being an object.

Sensation occurs without the production of an expressed species. Why? The reception of an impressed specifier (and we can all it that if we wish, as long as we know that it is a cause of intentionality that exists subsequently to it) from the environment actualizes the faculty for an action that does not require the production of anything other than the action. Why does it not require the production of anything other than the action itself? Because the terminus of the action is physically present or else the action wouldn't be taking place.

A criticism of my theory: doesn't the form through which consciousness exists have to be a two-sided form, a form having an entitative side by which it exists in the knower and an intentional side by which it makes the objects present? Does my theory account for both sides? Yes, the intentionality comes from a substantial form that has an act of its own as a form, as something not individuated because of itself. It can thus become the other through another form that likewise is not individuated because of itself. The result is a state, an accidental mode of being, having both modes of existence. That state is the immanent act of sensing. So I am not really contradicting Cajetan on the existence of two kinds of entities, things and intentional forms.

5.

Sensed red versus imagined red. The features possessed by these two reds are identical, otherwise we would not be imagining red. How then can we say that sensed red differs from the imagined red in being sensed as action, being objectified as the way the environment is acting on us? Since the features are the same, there is no feature in the sensed red making it action. It is the same set of features objectified in a different way,

once as action, once not. What does it mean to be objectified as action?

The features in both cases are objectified as dispositions existing in the sensed a thing. In both cases they are objectified as dispositions to act. In sensation they are objectified as active dispositions by which something is actually acting; in imagination they are not objectified as dispositions by which something is actually acting. And dispositions do not change when they are acting or not acting; the change is in the patient, not the agent. So the same features are sensed and imagined.

In imagination, we are aware of red as the manner in which the active dispositions of the environment can potentially act on me. In sensation we are aware of red as the manner in which the active dispositions of the environment actually act on me. To see something as red is to see what it is, at least in part, as being disposed to act redly and so disposed that it does act redly. To imagine it is red is to imagine it as so disposed without being aware of the as so acting.

The form through which sensation occurs, that is, the action received, has an entitative relation of dependence, or is an entitative relation of dependence, on an agent. In sense awareness, that entitative relation exists intentionally. In imagination, the object exists intentionally, but its entitative relation to its cause does not; for the form through which imagination takes place is not (does not have) an entitative relation of dependence on the object but on the subject of awareness. In sensation the action received, which is a feature of ourselves, a feature existing entitatively in us, has or is a relation of dependence on what is not ourselves. (A relation of dependence in the order of efficient causality.) In imagination, a feature of ourselves, the image in the psychological sense, has a relation of dependence on our own efficient causality, not on the efficient causality of the environment.

The object of the soul's act of sensing *and* the form by which the sense power produces its act are the same thing: the action of the environment. Memory and

imagination also objectify the action of the environment, but they do not objectify it under the aspect of an action presently occurring. For memory and imagination do not take place through that very action as the form through which the object is made present. In sensing, the form through which the object is present is that action itself.

In the memory, we are aware of an object as something that did dominate over us, did thrust itself upon us, that was thrust upon us. So in memory, we have an awareness of ourselves as having been dominated over in this way, as having had this object thrust upon us, etc. but in imagination, we have an awareness of an object, like a red surface or a musical note, as potentially thrusting itself upon us as something that can potentially thrust of itself upon us, or be thrust upon us.

6.

Does the eye become red when we see red, since seeing a red surface is being aware of a manner in which the environment is acting on the senses? No, red is the environment's action on the eyes objectified as related to the agent a *dodge*. Consider another example, an oblong shape in our visual field. Here, unlike in the case of red, there is a physical analogue of the perceived object received in the sense organs: light does form a pattern with an oblong shape on the retina. But the reception of that shape on the retina is not what it means to see the oblong shape. To see the shape is to relate to it, not as a quality of the subject that sees, but as an object. To see the shape is to be aware of a manner in which we are acted on; we are acted on in a manner characterized by an oblong shape. We are aware of being acted on in that manner as an action, that is, as coming from an agent as so as a characteristic of an agent. Light acts on the organs of sight in an oblong manner or circular manner or square manner. The action of light is characterized by the circular or oblong, etc. shape.

The eye does not become red physically. For entitatively the senses do not relate to

the action received from the environment as action. Entitatively they relate to it as passion. So in order to relate to it as action, the faculty of sight must relate to it in another mode of existence than entitative existence. Sight becomes red intentionally; it becomes the manner in which the agent acts on it intentionally. So it becomes the agent as acting, as agent, intentionally.

7.

Does this account of sensation put the sensed quality in the thing? That is something the account must explain, namely, how the sense quality gets to be objectified as a characteristic of the thing.

Action seen as action is action seen as a communication from, a communication of, the disposition by which the agent acts; it is action objectified as a manifestation of the disposition by which the agent acts. Action manifests the agent as disposed by being what it is to act in this manner. Action manifests what the agent is as including a disposition to act in this manner. The quality is objectified as being in the thing because the thing is objectified as having an active disposition which is characterized by this mode of acting.

We sense red as the manner in which the active dispositions of the environment are acting on us. Red is a manifestation of the active dispositions of the environment. To be aware of red as the manner in which we are acted on is to be aware of it as a manifestation of the active dispositions of the environment; so we are aware of it as characteristic of the active dispositions of the environment. And so we are aware of the active dispositions of the environment as characterized by this manner of acting.

Also, for action to be sensed as action it must be sensed as coming from the agent, and whatever is from the efficient cause must first of all be in the efficient cause.

First there is a physical union of the disposition of the environment with the sense organ, because that is what the change undergone by the sense organ is, namely, a physical

union, a physical contact between the active dispositions of the environment and the organ. Second, there is an intentional union of the sense faculties with the active disposition of the environment. There is an intentional union with the active disposition of the environment as actually causing a physical change in the sense organ and therefore in the sense faculties.

8.

Objects of sensation appear to exist in the same sense, with the same firmness, as the knower, who grasps himself by reflection, exists. The existence known by reflection may be more certain. But the existence that appears in sensation appears as no less genuine existence, and appears as no less a cognition-independent existence, than does the existence known by reflection. And notice that in both cases the appearance of existence is through an appearance of causality. Self-awareness is awareness of the self as the cause of its acts.

We don't first ask "Is this a genuine sensation or not?"; we ask "Does X really exist or not?" "Is this object of awareness a real existent or not?" Later, we ask "Was I really seeing it or just imagining it?" I.e., was I performing the cognitive function that takes place through my eyes or not?" For we are later aware that the function performed by means of the eyes is also performed by means of the action of the environment on my eyes.

Or we ask "Does the object really exist?" and if the answer is no, then we conclude we were not really seeing it. At some point, we become aware that some faculties have objects that really exist. So we must start with awareness of the real existence of some objects and then become aware of that the acts of knowing them, and the faculties of those acts, are acts and faculties bearing on real existence.

Whether it is a genuine perception or an hallucination, there is always the appearance of real existence. Why? As I turn my head, I do not know what objects will enter my field of vision next. That statement is merely negative. More than that negative

statement, when a new object enters my field of vision, the object enters the vision as if it itself were causing its presence in my vision. I am causing my eyes to move and, so, am causing my field of vision to change direction; and I am aware that I am so doing. But I am aware of the objects as if their existence was causing their presence in my vision. So there is the appearance of the dependence of awareness of the object, not just on the subject of the awareness, but on the object itself. Appearance of dependence means there is always the appearance that the awareness is caused, not just by the subject of awareness being what it is, but by the object's being what it is. But the appearance of causal dependence on the object is the appearance of dependence on the action of the object. How can awareness of the object appear to depend on the action of the object? (Dependence on) The action of the object must itself be, or at least be part of, the object, X, we are aware of. For that is what it means to say (i.e., For to say that is to say) that X is an object of sensory awareness.

In a conclusion reached by inductive reasoning, I become intellectually aware that an experience is a genuine awareness of action on my sense organs as action, that is, that my present sensory awareness is a genuine contact with cognition-independent existence. And inductive reasoning makes me aware that in hallucination something other than sensory awareness is going on. So if an experience is not hallucinatory, it IS an awareness of action as action, of causal dependence as causal dependence. But inductive reasoning does not convince me of the existence of the external world by concluding to the existence of a cause hidden behind what my senses are aware of. Inductive reasoning clarifies intellectually, and therefore by causal reasoning, the nature of the experience I am having. It tells me that the experience is a direct awareness of action as the action of (and so as a manifestation of) a really existing agent. (See the dispute between Gilson and Mercier. See the footnote in Joseph Owens An Elementary Christian Metaphysics. My position it is the midway between

Gilson and Mercier.)

9.

Some random thoughts:

Simon says sensation is both transitive and immanent action. Can we say it is transitive action in the order of specification and immanent action in the order of exercise? But sensation's exercise depends on transitive action, because its exercise depends on the presence of its object, which object is transitive action.

In ordinary instrumental causality, the principal cause produces a change in the instrument. The change that the instrument undergoes because of the principal cause allows the power of the agent to exist intentionally in the instrument. In sensation, the principal agent, the sense faculty, relies on a change that a different agent causes in the sense organ.

Some more vocabulary of action used to describe sensation or the contrast between sensation and imagination: there are "weak" sensations (Simon uses the phrase in his essay on sensation) and "feint" sensations. Likewise, images are "weaker" or "fainter" than sensations are.

Putnam's problem of how we know we are not just a brain floating in a tank: It makes no sense to look outside of sense knowledge for evidence that can only be found within sense knowledge. This is a *reductio ad absurdum* of the view that one cannot justify sense knowledge by *reductio ad absurdum*. Therefore it is not only irrational to believe that we are in tank, it is not possible for it to be rational to believe that we are in tank. The only possible evidence for such a believe would be evidence that would circumvent the tank and thus contradict its own hypothesis.

The following thoughts are offered strictly for what they're worth. I neither endorse them or reject them.

This is the lowest form of cognition because the form through which it occurs is the same (thing) as the object, i.e., is also the object. (This also true of self-reflection, the other kind of consciousness that gives us an actual existent directly and as such.) (The identity of species and object is a better formula than Simon's identity of immanent action and transitive action. There is an immanent action distinct from a transitive action, but not a species distinct from an object. On the other hand, in the immanent act the same transitive act exists again intentionally. Or, the immanent action is an intentional existence of the transitive action itself.)

But then how are we aware in sensation of red as action? The awareness of action as such is in the act of sensation, rather than the object. It is in the self-awareness of ourselves undergoing an act; an awareness we have that is consubstantial with the awareness of the object and awareness of ourselves as aware of the object. Does this mean that there is a very minimal but essential reflection on the self at the level of sensation? Why not? That would be the first kind of consciousness (Leibniz's *petites conceptions?*), a chimp=s kind would be next, and so on.

In memory, I not only have the recalled awareness of the object but the recalled awareness of myself as sensing the object. I can also recall myself imagining an object. But recall myself as imagining or sensing are two different kinds of recollection; their objects are different insofar as the OCU includes itself. For the kind of awareness of self caused by sensation differs from the awareness of self caused by imagination; so likewise the recollection of the self-awarenesses differs. In memory, the awareness of self that I recall is still derived from the action of the object, but at one remove.

(Both recollection of self, as imagining or as sensing, can be wrong; but what is new about that?)

Do animals other than chimps lack self-consciousness because they do not recognize themselves in mirrors? No, self-consciousness exists at the most basic level, the sense of touch. So dogs and cats are aware of their own existence. But when they look in a mirror they do not associate what they are aware of by sight with one of the things they are aware of by touch, or with the self-awareness that any act of sight gives them. When the ability to associate those two things emerges, it is not the emergence of self-consciousness as something radically new. It is just one step in the development of what was there all along.

(So all that it takes to get self-consciousness of the kind chimps show when they look at a mirror is the scholastic's good old faculty of the COMMON SENSE, which unites the objects of the other faculties, here, sight and touch?)

How does the physical action cause the faculty to give the physical action an immaterial, intentional existence? Perhaps this way. The physical action causes the faculty to go from potency to act with respect to being aware of itself undergoing the action. That is, perhaps this way. When an animal's body undergoes action passively, the animal soul must undergo it also. Certain of the body's organs are used by the soul for its sense power's. The soul is aware of its own existence as that which undergoes this action passively by being part of the body. A thing is knowable in so far as actual. Sometimes the soul knows itself through its own action. Here, it knows itself through an actuality that is not its own action. Still the soul is put in act by this action. Therefore it can know itself as so put in act. Its knowledge of itself is an action. But the act undergone which makes it eligible to be known is not that action.

But can we say this self-consciousness is what sensation consists of? Perhaps.

Perhaps sensation is a knowing of our self as undergoing an action. And so it would be an awareness of action as action. Still where does intentional existence come in?

Through the sensory power the soul becomes directly aware of its own existence. So it is not by reflecting on an act of the sense power that it knows itself through its own actuality. In other words, the double act model of self-awareness does not apply. It is precisely the act of the sense power to make the soul aware of itself as undergoing a passion, and hence to make us aware of action has action.

If I do not receive an immaterial or intentional form from the action of the sensed object, sensation must be explained by the nature of the receiver not of the received. What nature must the receiver have to accomplish this? Awareness of action as action would be by its identity with itself also awareness of subject of sensation as undergoing action. Can we say that awareness that a change undergone by the sense organ is a passion relative to me is the same as awareness that it is an action relative to something other than me?

The senses are aware of themselves as going from potency to act. They are in potency relative to union with an object. What makes sensation different is that the object they are united with is nothing but their going from potency to act relative to union with the object; that is, they are intentionally united with their going physically from potency to act as the environment acts on them physically. This action moves them from potency to act for performing the immanent act of being intentionally united with the action that actualizes them physically.

Maybe this is how to reply to Haldane on "the language of thought". Sensation does not need a formal sign because it does not need a sign. A sign makes something other than itself present to knowing power. In sensation, the action received in the faculty is the impressed form and is also the object; so the object is not something other than the form by which the object is cognized. The senses are aware of it as action because sense cognition takes place in dependence on the action and merely elevates the action to the status of object.

Because the sense faculties do not produce their own form through which they become aware of the object, they grasp the object as action on them. In other words, its status as object depends by way of efficient causality on itself; therefore it is grasped, it is objectified, as an action on the senses. on us.

Poinsot, signs, cx, formals signs, language, AI, Feb 26, 1999

What makes something an instrumental sign? Awareness of what some noise or shape is by means of formal signs.

AI, Adler-U, Jun 17, 1998

How to ask a machine: Are you conscious? Don't ask it if it is self-conscious. Ask about the contents of self-consciousness, that is, the prior consciousness of the other that self-consciousness is consciousness of.

Are you related to, do you have a relation to ... To the word "triangle"? Yes. To that for which the word "triangle" is used? Here one answer might be "Yes, I have a relation to that triangle, and that triangle, and that triangle, ad infinitum" (Wittgenstein on the series). Since it can't be related to an actual infinity of triangles, can we replace the reference to the members of the set by a reference to a formula the covers each member, the formula for a

triangle? Yes, but then we have to ask the same questions about each sign in the formula.

Can I ask it "But do you have the kind of relation to that for which "triangle" is used that my Poincaré article shows to be a necessary cause of the behavior of using "triangle" meaningfully?" "Yes, I am related to that, that, that, etc. and each of them instantiates that for which "triangle" is used." But do you have a relation to it such that what individuates that, and that, and that is not included? "Well, I've got a relation to a math formula that applies to all triangles." But do you have a relation to each term in the formula such that you are related to that for which the term is used without including what differentiates this and that? (Mother's death example relevant here, i.e., relevant to Turing, and so is the genitalia example.)

Now the substantial form possesses the action of the environment as its own state of act, that is, the substantial form becomes this prior state of act intentionally, intentionally becomes the action as action.

And given the nature of that formal causality as a transitive action, the object specified for the intentional act is the physical act known as action.

We sometimes say that the difference between sensation and intellection is that the sense faculty uses the body as an instrument. What is the cash value of saying this however? The sense faculty uses the body in place of the concept. That is, it uses the body as having been actualized by the transitive action of the environment as the means by which the intentional act that has the prior transitive action as its object comes about. Like the concept, the body so used is that by means of which knowledge takes place, not that which is known.

The kind of activity that the rational soul has on its own and that therefore makes the rational soul subsistent is immaterial activity in which the body does not have a part.

The question of where intentionality comes from in sensation, if not from a distinct kind of intentional form, will be discussed below.

There will be an objection based on the quotation Simon cites about forms of being received immaterially. Is that quotation from Aristotle or from Aquinas? Especially if it is from Aquinas, I will be accused of not saving whatever it is that Aquinas is trying to say by it. But in the context is it the form of the whole or the form of the part that he is speaking of? In other words, when he says that X is received immaterially, is he talking about X's status as an object of awareness? As an object of an intentional, and hence immaterial, state? Or is he talking about X as an accidental form received by the subject, the form by which the subject becomes aware of the object? If he means the first, that creates no problem for me. But how do we know which one he means given the ambiguity of the phrase "receiving forms" in his whole discussion of knowledge?