

Paradoxes—Reading group 7

Chapter 7: Are any contradictions acceptable?

Up to this point in the book, Sainsbury has worked on the assumption that no contradictions are acceptable—so, given that all paradoxes (by definition) lead to contradictions, something must be done about them! In this final chapter, Sainsbury considers the possibility of relaxing this assumption, asking: *are any contradictions acceptable?* In particular, he focuses on the following two claims:

1. Some contradictions are true.
2. For some contradictions, it is rational to believe that they are true.

The version of (1) that Sainsbury considers in this chapter is known as *dialetheism*: the view that all contradictions are both true *and* false. As Sainsbury writes, though (p. 150), “the view that some contradictions are both true and false does not add up to the view that some contradictions are acceptable, for one might go on to insist that anything perceived to be false should be rejected.” It is only when dialetheism is combined with (2) that one arrives at the possibility that is *rational* to believe that some such contradictions are true. Sainsbury dubs this position *rational dialetheism*.

Why be a dialetheist? Sainsbury explains:

The main positive case for dialetheism is that there is no better response to various paradoxes, notably, but not only, the Liar and Russell's paradox, than simply to accept the contradictions in question as true. (Sainsbury, p. 150)

(Cf. here the claim that one must endorse a new form of logic—so-called *quantum logic*—in order to evade the paradoxes of quantum mechanics. In general: changing the rules of logic is always a nuclear option which one has available as a response to problems of this kind! See also the *Duhem-Quine thesis*.)

Contradictions entail everything

Recall that, in \mathcal{L}_1 and \mathcal{L}_2 (i.e., *classical logic*), the following inference is valid:

$$\phi, \neg\phi \models \psi.$$

This is known as *ex falso quodlibet*, or the *principle of explosion*: it says that from a contradiction, anything can be derived. On this, Sainsbury writes the following:

This is quite unproblematic for the classicist, since he holds that no contradictions are true. Although arguments with contradictory premises are classically valid, none of them are sound: we could never use them to prove anything, since we could never establish the premises.

As soon as one allows that there is even one true contradiction, explosion ensures that one has a sound argument for any arbitrary proposition. One would be committed to holding that everything is true. This conclusion is absurd, and is accepted by dialetheists as absurd. They accordingly reject the classical inference rule. (Sainsbury, p. 151)

One consistent dialetheist logic in which explosion is *not* a valid inference is Priest's *logic of paradox*—I will explain in the meeting! (See e.g. Sider, *Logic for Philosophy*, for the details.)

Concerns about intelligible content

Sainsbury now considers the following objection to dialetheism:

[W]ere there a sentence which is both true and false, there could be no coherent understanding of it, for there would be no determinate fact concerning what it ruled out, and what ruled it out. (Sainsbury, p. 152)

Sainsbury is not convinced by this concern—he takes it to rest on an understanding of meaning which cooks the books against dialetheism:

The content of a declarative sentence is given by two disjoint sets: the set of worlds at which it is true, and the set of worlds at which it is false. (This is one way of expressing a

version of the view that the meaning of a sentence consists in the conditions under which it is true.) Suppose, for some sentence, the actual world belongs to the set of worlds at which it is true. Then it is not the case that the actual world belongs to the set of worlds at which it is false, since the set of worlds at which it is false is, by hypothesis, disjoint from the set of those at which it is true.

It is very plain that this kind of possible worlds semantics builds in the assumption that no sentence can be true and false, and provides not a shadow of an argument for it. It is not the mere fact of using possible worlds in the semantics which delivers the result. Rather, it is the assumption of disjointness of the set of worlds at which a sentence is true and the set of those at which it is false. There is nothing in the apparatus to prevent a sentence being associated by the semantics with a set of worlds at which it is true which overlaps the set of worlds at which it is false. To argue that no such association should be made requires philosophical work, which is not done merely by alluding to the apparatus. (Sainsbury, p. 152)

Acceptance and rejection

Rational dialetheism seems to be in tension with the following principle:

F: Anything false should be rejected.

The reason is that “it is hard to see how it could be rational to accept what it is impossible to accept.” (p. 153)

In response to this, Priest—a rational dialetheist—rejects **F**, writing that “Truth and falsity come inextricably intermingled ... One cannot, therefore, accept all truths and reject all falsehoods” (Priest 1986, p. 106) What one *should* do, for Priest, is *reject all falsehoods which are not also truths*.

Sainsbury closes with the following observation from Priest:

[W]hether or not dialetheism is correct, a discussion of the questions it raises, concerning fundamental notions like negation, truth and rationality ... can hardly fail to deepen our understanding of these notions. (Priest 1993, p. 35)