

THE COSMOLOGICAL ARGUMENT FROM CONTINGENCY

“Now to take away the cause is to take away the effect. Therefore, if there be no first cause among efficient causes, there will be no ultimate, nor any intermediate cause. But if in efficient causes it is possible to go on to infinity, there will be no first efficient cause, neither will there be an ultimate effect, nor any intermediate efficient causes; all of which is plainly false. Therefore it is necessary to admit a first efficient cause, to which everyone gives the name of God.” (St. Thomas Aquinas, *Summa Theologiae* I.2.3)

Distinguished Proponents: Plato, Aristotle, Al-Farabi, Avicenna, St. Thomas Aquinas, and G.W. Leibniz

Summary Form of the Argument:

Premise 1. Dependent beings exist

Premise 2. Either dependent beings exist because of an infinite series of other dependent beings or because of an independent being.

Premise 3. Not because of infinite series of other dependent beings

Conclusion: Therefore because of an independent being which theists call God

Expanded Form of the Argument

Dependent Beings Exist

The first premise should be obvious. We are surrounded by things whose existence depends on other things. Human beings are dependent upon parents, food, sunlight, air, and a whole host of other things for their existence. A plant depends upon carbon dioxide and sunlight for its existence. Chemical compounds depend upon their elements, which in turn depend upon subatomic particles, the strong and weak force, etc. We call these beings “*contingent*” or *dependent* because they rely on something other than themselves for their existence. It is clear that dependent beings are everywhere; so much so, that we find from the outset difficulty in naming anything that does not depend on something else for its existence. This dependency is just another way of saying that these beings are *effects* from *causes*. Every effect (dependent being) needs a cause. Take away the cause and there will be no effect. Take away the causes of human existence like food and water and that person will soon cease to exist.

Either because of an infinite series of other dependent beings or because of an independent being

Now the second premise is clear too, and it sets up a dilemma. The causes of dependent beings must themselves either be dependent, or not dependent. There is no third alternative. If we continually add dependent beings, we must proceed to infinity because we cannot stop with a dependent being. Dependent beings, by their nature, require another being and such beings cannot have the “last word” of a series. The only alternative to stopping an infinite regress is stop the series with an independent being whose existence it makes no sense to inquire as to upon what it depends, for an independent being simply depends upon nothing.

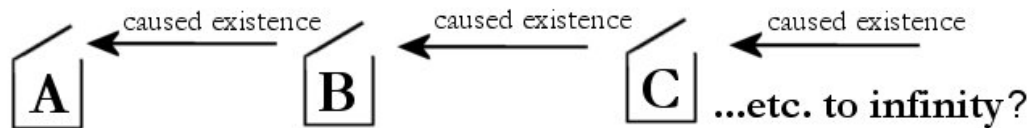
Not because of infinite series of other dependent beings

So the first two premises are obviously true, but what about the third? Why can’t there be an infinite series of dependent things relying on one another? Imagine this scenario: “Excuse me John, can I borrow a hammer?” “Sure, Steve no problem, but I first need to borrow one myself from Bill.” “Bill, can I borrow a hammer?” “Oh of course, but I have to go and borrow it from Sam first.” “Hey Sam...” etc. Now with a little thought, this cannot go on literally to infinity if Steve is ever able to actually borrow and use a hammer. Something cannot give what it doesn’t have. Somebody has to actually have the hammer before anyone else can borrow it. In other words, there has to be a first “hammer-lender” if you will, before anything else in this hammer lending series can receive it. So whenever we see a man actually using a hammer, we now know there cannot have been an infinite number of steps prerequisite to him acquiring that tool.

Now imagine if existence were like that hammer. A being such as yourself could never exist at all if your existence presupposed an infinite number of causes like the above. An infinite number of steps cannot be completed and so in philosophical terms, any infinite series is *untraversable*. Just like with the hammers, if anything exists, it must be the case that there was not an infinite number of prerequisite steps or causes required for this dependent being to have existence.

To look at it another way, suppose we use boxes to symbolize dependence in existence:

The Dependent Series



Dependent being A exists now, if and only if B exists. But B exists if and only if C exists. If the series of "if and only if" dependency progresses infinitely, the existence of A will *never be satisfied*. But obviously the existence of A is satisfied, because it exists right now. Therefore, the dependent series must end. But the series cannot end with another dependent being (for this being would need another) so the series must end with an independent being, a first that is dependent on no other.

So any dependent being existing around you right now is like the man who has received a hammer from someone else. Its existence is received by another, and since it exists it cannot be because of an infinite number of other dependent things, but must ultimately be because of a first being completely independent and needing nothing whatsoever for its existence.

This is true regardless of how many dependent beings there are. Adding to the number of dependent beings makes no qualitative progress, far from adding to the solution, they only become a part of the problem. Even if the universe were infinitely old, all that does is increases the number of dependent beings and that would mean that there are now even more things that need an explanation!

Therefore because of an independent being which theists call God

With the infinite series of dependent things being impossible, by a process of elimination this leaves a finite series that stops at an independent being.

The whole argument is summarized by Leibniz this way:

Now we must rise to metaphysics, by making use of the great principle, little used, commonly, that nothing takes place without sufficient reason, that is, that nothing happens without it being possible for someone who knows enough things to give a reason sufficient to determine why it is so and not otherwise. Assuming this principle, the first question we have the right to ask will be, why is there something rather than nothing? For nothing is simpler and easier than something. Furthermore, assuming that things must exist, we must be able to give a reason for why they must exist in this way, and not otherwise.

This sufficient reason for the existence of the universe cannot be found in the series of contingent things, that is, in the series of bodies and their representations in souls; for, since matter is in itself indifferent to motion and rest, and to one motion rather than another, we cannot find in matter the reason for motion, still less the reason for a particular motion. And although the present motion found in matter comes from the preceding motion, and it, in turn, comes from a preceding motion, we will not make any progress in this way, however far back we go, for the same question always remains. Thus the sufficient reason, which needs no other reason, must be outside this series of contingent things, and must be found in a substance which is its cause, and which is a necessary being, carrying the reason of its existence with itself. Otherwise, we would not yet have a sufficient reason where one could end the series. And this ultimate reason for things is called God.

THE NATURE OF AN INDEPENDENT AND NECESSARY BEING: WHAT MUST A *COMPLETELY INDEPENDENT* BEING BE LIKE?

The Independent Being Must Be Limitless The first aspect regarding the nature of this being is that it cannot be limited in any way, *that is an infinite being can lack no positive perfections*. To be limited in any way is a sure sign that something is dependent. Finite beings have determinate modes of existence - one among many possible modes (i.e. a lion exists in a lion essence or mode of existence, while a zebra exists with a zebra essence, any material thing has a particular size and a particular weight in a particular place, etc). In other words, anything that is limited, anything that is not pure existence, could really be otherwise than it is, viz., such a being *could* really be different. *And so we have to ask why does this particular limited being have the mode and limitations that it does and not some other?* Given all the other possibilities, every limited being has only this possibility actualized (this size, in this place, this color, etc.) and not some other. Why? “Nothing” cannot be the explanation since out of nothing, nothing comes, so there has to be a reason. If something is limited in mode, there must be a reason *why it has this particular mode and no other*.

Something has to “tip the scale” between equipossibles. As Aquinas writes:

Now whatsoever is possible to be has a cause, because, as in itself it is equally related to two things, namely being and not being, it follows that if it acquires being this is the result of some cause.¹

There needs to be then a *principle of determination*, a *cause*, that determines one mode over the other. But if all limited modes of existence are determined by something else, then no limited being can be independent. An Independent Being can have no cause whatsoever. Moreover, the Independent Being itself could not cause its own mode of existence, because a being cannot exist prior to itself in order to determine its own essence. It must be then that to be absolutely self-sufficient and uncaused is to be pure existence, or *qualitatively infinite* – its essence or “whatness” is simple existence without any limitation.

There may seem to be any number of things or entities in the world, that are not dependent on outside causes and yet these things aren’t gods, e.g., space, time, the ultimate material particles, etc. Only a being of pure actuality, pure existence, is necessary, not able to be otherwise, and ultimately self-explanatory. The essence of the truly Necessary Being is infinite existence. As Aquinas argues, “God is subsisting being itself”.²

The Independent Being Must Be One There can be only *one* Independent Being. If we assume for a moment the possibility of there being two, then we must admit that they must be *distinct* in some way (for how else could there be two?), and that would mean one must lack something that the other has. But if one lacked something the other has, it could not be infinite as we have said above it must be, it would be limited in that respect from the other. The difference needed to make them two beings instead of one would also be a limitation, but the Independent Being cannot have a limitation.

The Independent Being Must Be Immaterial Because every material thing is *limited* by time and space, the Independent Being cannot be material. It is clear that to exist as a material being is to have one spatial location and not some other (a student cannot be at the park, at home, and at school all at the same time). It is also clear that to exist materially is to exist at one time, now, and not at some other time such as in the future. These are both examples of the limitations of material beings. Since the Independent Being is limitless, it cannot be limited by space and time and therefore cannot be a material body.

The Independent Being Must Be Changeless and Eternal Since the Independent Being is without any limitation whatsoever, it cannot change. For change is an actualization of a potency, acquiring a new mode of being that one currently is does not have, but clearly if something currently does not have a mode of being this is a limitation. An unqualified Independent being is qualitatively infinite, its “whatness” is without limitation and hence there is nowhere for it to “qualitatively go”. A being that is without any existential limitation cannot become or acquire a new mode of existence. Since time is a measure of

¹ Aquinas, *Summa Contra Gentiles* Bk 1 Ch 15

² ST I.4.2 cf. ST.I.3.4

change, an unchanging being cannot exist in time but must exist eternally. Since change is not possible for the Independent Being, such a Being is eternal and timeless.

The Independent Being Must Be the Cause of Everything That Exists As we saw above, there can be only one Independent Being. This means that everything else that exists must be a dependent being of some sort or another. Since our argument shows that dependent beings cannot fully account for themselves, but must regress and end with an Independent Being, everything that exists depends upon this Independent Being for its existence. It is the Cause of everything that exists.

Hence, the Cosmological argument from contingency is a demonstration that an Independent Being exists and must be infinite in essence, one, immaterial, changeless and eternal cause of everything else that exists.

Objections

“A series of dependent beings can rely on each other in a circular order of dependence.”

This objection entails a contradiction in that ultimately it says a thing is a cause for its own existence. A being must already exist before it can cause anything. To say that A causes B which causes C which then in turn causes A is a contradiction because A cannot cause itself, neither immediately nor through another. Chicken-A cannot lay an egg that hatches chicken-B, which it in turn matures and lays an egg that hatches chicken-C, which again in turn matures and lays the egg that hatches chicken-A!

“The whole set of dependent beings, say the universe, can be the explanation for its own existence. God is not needed.”

The whole universe is just a collection and not really anything over and above the sum total of its individual parts. In other words, the physical universe itself is *dependent* on its parts, since without them it wouldn't exist. So the whole of the universe cannot account for its parts, since it cannot even exist without them. It would also be contradiction for the whole universe to depend on its parts for its existence (which all wholes do) and that those parts in turn depend upon the whole for their existence since as said above, it is impossible for anything to cause its own existence, either immediately or mediately through an instrument.

“Why can't there be an infinite number of dependent beings? Each member of the series fully causes the one that depends on it.”³

Dependent beings cannot cause anything unless they themselves are caused first, and so *each dependent being in a dependent series cannot even first account for itself, let alone account for another*. Adding more dependent beings that derive their existence from something else does not make any qualitative progress in explaining the existence of the original and only adds to the number of things that need an explanation. A bigger set of dependent beings cannot account for itself any more than one dependent being can. If an explanation for a dependent being is only another dependent being, the original question arises and hence it is no explanation at all. The purported solution becomes only part of the problem.

As an analogy, take the example of a series of moving train cars. Train cars are dependent on their movement from an *engine* that can move itself and does not have to rely on anything else. Those cars do not move at all if there is not an engine somewhere in the series. If there were just one train car there couldn't be any movement, and motion is not achieved by adding more and more cars. Even if there were an infinite number of only train cars, we would never have an engine and hence would never have motion. So if any train car is in motion, we know that there must be an engine attached somewhere that does not depend on its motion from something else.

Nor could it make sense to say some being A depends *completely* on another *dependent* being B, since results in self-contradiction:

If A *depends completely* on some extrinsic source, B, it makes no difference whether there is but one B in existence, or more than one. Nor does it matter whether the number

³ An objection offered by Paul Edwards, “The Cosmological Argument” in *Critiques of God*, ed. Peter Angeles; Amherst, Prometheus Books 1997, p. 50)

of B's is finite or infinite; and if infinite, it doesn't matter if there is a last member or not. In any of these cases B must of itself be capable for accounting for the existence of A...If B is, like A, something *completely dependent* on another, then it is self contradictory to assert that A *depends completely* on B. And to suggest that there may be an infinite series of B's without a last member is but to suggest an infinite number of self-contradictions.⁴

It is a contradiction to say that a being can rely completely and only on a cause that is itself just another dependent being. For example, imagine a billiards player knocking the eight ball into a pocket. It's a complete misunderstanding to say that the eight ball's movement depends *completely* on the cue ball, for the cue ball itself is dependent on its motion from the cue stick, which in turn is dependent on the man, etc. In other words, it would be a contradiction to say that the eight ball was completely dependent on the cue ball, but also dependent on the man too, since that would mean the cue ball was the complete cause and not the complete cause.

“This argument commits the ‘fallacy of composition’⁵. You can’t go from dependent parts to a dependent universe.”

First, one must be careful with the fallacy of composition. The nature of the property in question must be taken into consideration. For example, is perfectly legitimate to infer that since every part of a table is made out of wood, that the whole table is made out of wood. The relevant concern is if a certain property is “composable” like “being made of wood” is and it seems existential dependency is like this. A collective whole of dependent beings only gives you a whole set of dependents in the same way that continually adding men in need of a hammer only gives you a set of individual hammerless men. After all, it is intuitively true that wholes cannot exist without their parts. So any universe cannot be independent of its parts that make it up, and if those parts are dependent, well then the universe is too – both on the parts and whatever the parts depend upon. Finally, one could argue that there is no fallacy of composition for there is no composition. The first being under consideration needs explanation for its existence and deferring that explanation to infinity can never suffice.

“But cause and effect are distinct ideas. I can conceive of one without the other. Since it is possible for me to imagine an effect without a cause, such there is no contradiction in thinking something can begin to exist without a cause.”⁶

This confuses what one is capable of in thought with what is possible in reality. Inconceivability and impossibility are distinct concepts. One can *conceive* of a tree with an indefinite number of leaves, but that doesn't mean there can *be* a tree with an indefinite number of leaves. In the same way, one may be able to *imagine* something popping into existence out of nothing and by nothing, but that such a thing could *really do* that is nonsense. If we know anything at all, we know “out of nothing, nothing comes” (*ex nihilo nihil fit*). Our own intuitions tell us that something cannot come out of nothing and this principle is confirmed all the time in our daily experience. A three-ring circus or a NASCAR race cannot just pop into one's living room, uncaused, out of nothing. Because of this intuition, philosophers have coined the term, *principle of sufficient reason* which simply means; whatever exists or happens has a reason for its existence or happening either from itself or from another. The principle is assumed all the time in solving even our most simple of daily problems; e.g., if you put your keys on the table, and now they are gone, there must be a reason as to why the keys moved. Things do not just disappear and appear without a reason. The denial of this could be called the “pop theory” that things just pop into existence with no cause at all. *But surely this never happens in our experience and there is no good reason to think that it could.* Propositions such as “I will die someday”, “fire is hot”, and “if I drop a rock it will fall,” “the sun will rise tomorrow:”, etc., are exceptionless occurrences in our world, and so one is entitled to give a firm assent to them without reasonable fear of error. Since the principle of sufficient reason is every bit as certain as these or any other

⁴ Joseph Bobik, *Aquinas on Being and Essence: A Translation and Interpretation* (Notre Dame, University of Notre Dame Press, 1965) 179

⁵ The fallacy of composition is illegitimately applying a property of a part to a property of a whole. For example, it does not follow that because every player on a basketball team is a good player, that therefore they have a good team. The players may not function well with each other. Another example is that since all the parts of an elephant are light, the whole elephant is light.

⁶ This was the objection of David Hume (David Hume; *Treatise on Human Nature*, Oxford, Clarendon Press, 1888) p. 79

law of physics, it is simply arbitrary and *ad hoc* to deny it here in favor of the “pop theory”. As Craig strappingly states:

That something should spring into existence out of nothing is so counter-intuitive that to attack Maimonides and Aquinas at this point seems to color one’s intellectual integrity. The old principle that *ex nihilo nihil fit* appears to be so manifestly true that a sincere denial of this axiom is well-nigh impossible...The causal proposition [affirming *ex nihilo nihil fit*] could be defended as an empirical generalization based on the widest sampling of experience. The empirical evidence in support of the proposition is absolutely overwhelming, so much so that Humean empiricists could demand no stronger evidence in support of any synthetic statement. To reject the causal principle is therefore completely arbitrary...it is completely confirmed in our experience. Constantly verified and never falsified, the causal proposition may be taken as an empirical generalization enjoying the strongest support experience affords.⁷

So given that the principle of causality is every bit as common as any scientific law, just as we have a law of gravity, or a law of thermodynamics, etc., why object to there being a “law of causality”? Such an objection would be wholly unwarranted, unscientific, inconsistent and arbitrary. Clearly anyone advancing such a counterintuitive notion as denying the principle of sufficient reason must shoulder the *burden of proof*, and to shift the proof onto the theist would commit the “appeal to ignorance” fallacy. *There is no good reason to deny this principle and every reason to accept it.* Thus, the theist is amply justified in holding to the principle of sufficient reason and “out of nothing nothing comes”.

“Quantum mechanics proves that something can come out of nothing.”

This is a popular misunderstanding based upon *quantum fluctuation* theories on the origin of the universe. The quantum vacuum that scientists speak of is not really nothing. This vacuum contains virtual particles and energy. While this theory is widely rejected for describing the origin of the universe, even if true, this underlying array of fundamental forces is not self-explanatory. Where did it come from? As M.A. Corey writes:

This view (non-theistic cosmogenesis) is fallacious, however because sudden quantum appearances don’t really take place out of “nothing”. A larger quantum field is first required before this can happen, but a quantum field can hardly be described as being “nothing”. Rather it is the thing of unsearchable order and complexity, whose origin we can’t even begin to explain. Thus trying to account for the appearance of the universe as a sudden quantum fluctuation doesn’t do away with the need for a Creator at all; it simply moves the whole problem backwards one step to the unknown origin of the quantum field itself.⁸

“You have no right to use the term ‘cause’ beyond the realm of the sensible world.”

The causal principle based on the understanding that something cannot come out of nothing. There are not different “types” of nothing like an “in the realm of the sensible world ‘nothing’” and an “outside the sensible world ‘nothing’”. Nothing is just nothing. So this restriction is arbitrary. Secondly, we can use analogous terms in reference to realities that transcend our phenomenal order. There is nothing repugnant in the notion of “being” or “cause” that would prevent such terms from being applied to a transcendent order. So at least *a priori* there is nothing contrary to human reason in applying them to God. What justifies the necessity of such a cause is the principle of sufficient reason and causality and the nature of contingent beings. So to restrict our language to the order of the sensible would place these undeniable principles in question.

“If everything needs a cause, who or what caused God?”

⁷ William Lane Craig, *The Kalam Cosmological Argument* (Eugene: Wipf and Stock, 2000) p. 143 - 145
Even the atheist Bertrand Russell argued the causal principle was as certain as any other physical law (*The Problems of Philosophy* (London: Oxford University Press 1979) p. 68-9)

⁸ M.A. Corey, *God and the New Cosmology* (Lanham, Md.: Rowman and Littlefield, 1993) 43, quoted in Dean Overman *A Case Against Accident and Self Organization* (Lanham, Md.: Rowman and Littlefield, 1997) 158

This is an old worn out objection that really indicates a misunderstanding of the cosmological argument. It is not a premise of the argument that “everything needs a cause”. The operating principle is that every existing being needs a sufficient reason for its existence. If the being has this reason in itself, then there is nothing further to say, the being exists independently, and the point is proven. If the sufficient reason lies in another, then the being is *contingent* or *dependent* on that other and therefore the being is *caused*. *Only dependent beings need a cause*. An Independent Being, by definition, does not rely on any cause for its existence

Thus ends the argument.