

The Concept of an Objective Purposiveness of Nature Is a Critical Principle of Reason for Our Reflective Judgment

There is clearly a big difference between saying that certain things of nature, or even all of nature, could be produced only by a cause that follows intentions in determining itself to action, and saying that *the peculiar character of my cognitive powers* is such that the only way I can judge how those things are possible and produced is by conceiving, to account for this production, a cause that acts according to intentions, and hence a being that produces things in a way analogous to the causality of an understanding. If I say the first, I am trying to decide something about the object, and am obliged to establish that a concept I have assumed has objective reality. If I say the second, reason determines only how I must use my cognitive powers commensurately with their peculiarity and with the essential conditions imposed by both their range and their limits. Hence the first is an *objective* principle for determinative judgment, the second a subjective principle for merely reflective judgment and hence a maxim imposed on it by reason.

For if we want to investigate the organized products of nature by continued observation, we find it completely unavoidable to apply [*unterlegen*] to nature the concept of an intention, so that even for our empirical use of reason this concept is an absolutely necessary maxim. Now, obviously, once we have adopted such a guide for studying nature and found that it works, we must at least try this maxim of judgment on the whole of nature too, since this maxim may well allow us to discover many further laws of nature that would otherwise remain hidden to us since our insights into the inner nature of its mechanism is so limited. But while that maxim of judgment is useful when applied to the whole of nature, it is not indispensable there, since the whole of nature is not given us as organized (in the strictest sense of *organized* as given above). But

when we deal with those products of nature that we can judge only as having intentionally been formed in just this way rather than some other, then we need that maxim of reflective judgment essentially, if we are to acquire so much as an empirical cognition of the intrinsic character of these products. For we cannot even think them as organized things without also thinking that they were produced intentionally.

Now if we present the existence or form of a thing as possible only) under the condition that there is a purpose, then the concept of the thing is inseparably connected with the concept that the thing is contingent (in terms of natural laws). That is also why those natural things that we find possible only as purposes constitute the foremost proof that the world as a whole is contingent, and are the sole basis for a proof that holds both for common understanding and for the philosopher: that this whole depends on and has its origin in a being that exists apart from the world and (given how purposive these forms are) is moreover intelligent. Hence these things are the sole basis for proving that teleology cannot find final [*Vollendung*] answers to its inquiries except in a theology.

But what does even the most complete teleology of all prove in the end? Does it prove, say, that such an intelligent being exists? No; all it proves is that, given the character of our cognitive powers, i.e., in connecting experience with the supreme principles of reason, we are absolutely unable to form a concept of how such a world is possible except by thinking of it as brought about by a supreme cause that *acts intentionally*. Hence we cannot objectively establish the proposition: There is an intelligent original being; we can do so only subjectively, for the use of our judgment as it reflects on the purposes in nature, which are unthinkable on any principle other than that of an intentional causality of a supreme cause.

If we tried, from teleological bases, to establish dogmatically the proposition that such an intelligent being exists, we would get entangled in difficulties from which we could not extricate ourselves. For such inferences would have to presuppose the proposition that the organized beings in the world are impossible except through a cause that acts intentionally. This means that we would have to be willing to assert that, merely because we need the idea of purposes in order to study these things in their causal connection and to cognize the lawfulness in that connection, we are also justified in presupposing that every thinking and cognizing being is subject to the same need as a necessary condition, and hence that this condition attaches to the object rather than merely to ourselves, as subjects. But there is no way that such an assertion can be upheld. For purposes in nature are not given to us by the object: we do not actually *observe* purposes in nature as intentional ones, but merely add this concept to nature's products in our *thought*, as a guide for judgment in reflecting on these products. And an a priori justification for accepting such a concept, as having objective reality, is even impossible for us. Hence there is absolutely no proposition left us except one that rests on subjective conditions only, the conditions under which judgment reflects commensurately with our cognitive powers. This proposition, if expressed as holding objectively and dogmatically, would read: There is a God. But in fact the proposition entitles us human beings only to this restricted formula: The purposiveness that we must presuppose even for cognizing the inner possibility of many natural things is quite unthinkable to us and is beyond our grasp unless we think of it, and of the world as such, as a product of an intelligent cause (a God).

Now if this proposition, which is based on an indispensable and necessary maxim of our judgment, is perfectly satisfactory for all speculative and practical uses of our reason from every *human* point of view, then indeed I would like to know just what we have lost if we

cannot also prove it valid for higher beings, i.e., prove it from pure objective bases (to which unfortunately our powers do not extend). For it is quite certain that in terms of merely mechanical principles of nature we cannot even adequately become familiar with, much less explain, organized beings and how they are internally possible. So certain is this that we may boldly state that it is absurd for human beings even to attempt it, or to hope that perhaps some day another Newton might arise who would explain to us, in terms of natural laws unordered by any intention, how even a mere blade of grass is produced. Rather, we must absolutely deny that human beings have such insight. On the other hand, it would also be too presumptuous for us to judge that, supposing we could penetrate to the principle in terms of which nature made the familiar universal laws of nature specific, there simply could not be in nature a hidden basis adequate to make organized beings possible without an underlying intention (but through the mere mechanism of nature). For where would we have obtained such knowledge? Probabilities are quite irrelevant here, since we are concerned with judgments of pure reason. Hence we can make no objective judgment whatever, whether affirmative or negative, about the proposition as to whether there is a being who acts according to intentions and who, as cause (and hence author) of the world, is the basis of the beings we rightly call natural purposes. Only this much is certain: If at any rate we are to judge by what our own nature grants us to see (subject to the conditions and bounds of our reason), then we are absolutely unable to account for the possibility of those natural purposes except by regarding them as based on an intelligent being. This is all that conforms to the maxim of our reflective judgment and so to a basis that, though in the subject, attaches inescapably to the human race.

§ 76 Comment

The following contemplation would greatly deserve elaborate treatment in transcendental philosophy; but here I insert it only as a digression intended for elucidation (not as a proof of what I have set forth here).

Reason is a power of principles, and its ultimate demand for principles aims at the unconditioned. Understanding, on the other hand, always serves reason only under a certain condition, one that must be given to us. But without concepts of the understanding, to which objective reality must be given, reason cannot make objective (synthetic) judgments at all. As theoretical reason it has absolutely no constitutive principles of its own, but merely regulative ones. Two points emerge from this. First, if reason advances to where understanding cannot follow, it becomes transcendent, displaying itself not in objectively valid concepts, but instead in ideas, though these do have a basis (as regulative principles). But, second, since the understanding cannot keep pace with reason, while yet it would be needed to make ideas valid for objects, it restricts the validity of those ideas of reason to just the subject, yet in a universal way, i.e., as a validity for all subjects of our species. In other words, understanding restricts the validity of these ideas to this condition: that, given the nature of our (human) cognitive ability, or even given any concept *we can form* of the ability of a finite rational being as such, all thinking must be like this and cannot be otherwise – though we are not asserting that such a judgment has its basis in the object. Let me illustrate my point by some examples. I am not urging the reader to accept these examples immediately as proved propositions; they are both too important and too difficult for that. But they may still provide him with food for meditation, and serve to elucidate what is our proper task here.

It is indispensable and necessary for human understanding to distinguish between the possibility and the actuality of things, and this fact has its basis in the subject and in the nature of his cognitive powers. For if the exercise of these powers did not require two quite

heterogeneous components, understanding to provide concepts, and sensible intuition to provide objects corresponding to these, then there would be no such distinction (between the possible and the actual). If our understanding were intuitive rather than conceptual it would have no objects except actual ones. For we would then be without concepts (and these deal with the mere possibility of an object) and also be without sensible intuitions (which do give us something actual, yet without allowing us to cognize it as an object). But our entire distinction between the merely possible and the actual rests on this: in saying that a thing is possible we are positing only the presentation of it with respect to our concept and to our thinking ability in general; but in saying that a thing is actual we are positing the thing itself [*an sich selbst*] (apart from that concept). Hence the distinction between possible and actual things holds merely subjectively, for human understanding. For even if something does not exist, we can still have it in our thoughts; or we can present something as given, even though we have as yet no concept of it. Hence the two propositions, that things can be possible without being actual, and that consequently one cannot at all infer actuality from mere possibility, do indeed hold for human reason. And yet this does not prove that the distinction lies in things themselves [*selbst*]; there clearly is no such implication. It is true that those two propositions also hold for objects insofar as our cognitive power, which is conditioned by the sensible, deals also with objects of sense; but they do not hold for things in general, i.e., even for things in themselves. That this is so is evident from the fact that reason forever demands that we assume something or other (the original basis) as existing with unconditioned necessity, something in which there is no longer to be any distinction between possibility and actuality; and for this idea our understanding has absolutely no concept, i.e., it cannot find a way to present such a thing and its way of existing. For if the understanding *thinks* it (no matter how), then we are merely presenting the thing as possible. If the understanding is conscious of it as given in

intuition, then it is actual, and no thought of possibility comes in. Hence the concept of an absolutely necessary being, though an indispensable idea of reason, is for human understanding an unattainable problematic concept. This concept does hold for the use we humans make of our cognitive powers in accordance with their peculiar character; but by the same token it does not hold for the object, and hence for every cognizing being. For I cannot presuppose that thought and intuition are two distinct conditions for the exercise of the cognitive powers of every such cognizing being, and hence for the possibility and actuality of things. An understanding to which this distinction did not apply would mean: All objects cognized by me are (exist); such a being could have no presentation whatever of the possibility that some objects might not exist after all, i.e., of the contingency of those that do exist, nor, consequently, of the necessity to be distinguished from that contingency. What makes it so difficult for our understanding with its concepts to match reason here is merely this: that there is something which for it, as human understanding, is transcendent (i.e., impossible in view of the subjective conditions of its cognition), but which reason nevertheless treats as belonging to the object and turns into a principle. Now in this kind of case the following maxim always holds: where cognizing certain objects is beyond the ability of our understanding, we must think them in accordance with the subjective conditions for exercising our powers, conditions that attach necessarily to our (i.e., human) nature. And if the judgments we make in this way cannot be constitutive principles that determine the character of the object (as is indeed inevitable where the concepts are transcendent), they can still be regulative principles, safe and immanent in their employment and commensurate with the human point of view.

We said that reason, when it considers nature theoretically, has to assume the idea that the original basis of nature has unconditioned necessity. But when it considers nature practically, it similarly

presupposes its own causality as unconditioned (as far as nature is concerned), i.e., its own freedom, since it is conscious of its own moral command. Here, however, the objective necessity of the action, in other words, duty, is being opposed to the necessity that the action would have if it were a mere event with its basis in nature rather than in freedom (i.e., the causality of reason); and the action that morally is absolutely necessary is regarded as quite contingent physically (i.e., we see that what ought necessarily to happen still fails to happen on occasion. It is clear, therefore, that only because of the subjective character of our practical ability do we have to present moral laws as commands (and the actions conforming to them as duties) and does reason express this necessity not by *is* (i.e., happens) but by *ought to be*. This would not be the case if we considered reason, regarding its causality, as being without sensibility (the subjective condition for applying reason to objects of nature), and hence as being a cause in an intelligible world that harmonized throughout with the moral law. For in such a world there would be no difference between obligation and action, between a practical law that says what is possible through our doing, and the theoretical law that says what is actual through our doing. It is true that an intelligible world in which everything would be actual just because it is (both good and) possible – and, along with this world, even freedom, its formal condition – is for us a transcendent concept that is inadequate for a constitutive principle for determining an object and its objective reality. Yet the concept of freedom serves us as a universal *regulative* principle because of the (in part sensible) character of our nature and ability, and the same applies to all rational beings connected with the world of sense, insofar as our reason is capable of forming a presentation of them. That principle does not objectively determine the character of freedom as a form of causality; rather, and with no less validity than if it did do that, it makes the rule that we ought to act according to that idea a command for everyone.

Similarly, regarding the case before us, we may grant that, unless we had the kind of understanding that has to proceed from the universal to the particular, we would find no distinction between natural mechanism and the technic of nature, i.e., connection in it in terms of purposes. For the fact that our understanding has to proceed from the universal to the particular has the following consequence: In terms of the universal supplied by the understanding the particular, as such, contains something contingent. And yet reason requires that even the particular laws of nature be combined in a unified and hence lawful way. (This lawfulness of the contingent is called purposiveness.) Therefore, unless the power of judgment has its own universal law under which it can subsume that particular, it cannot recognize any purposiveness in it and hence cannot make any determinative judgment about it. Differently put: It is impossible to derive the particular laws, as regards what is contingent in them, a priori from the universal ones supplied by the understanding, i.e., by determining the concept of the object. Hence the concept of the purposiveness that nature displays in its products must be one that, while not pertaining to the determination of objects themselves, is nevertheless a subjective principle that reason has for our judgment, since this principle is necessary for human judgment in dealing with nature. The principle is regulative (not constitutive), but it holds just as necessarily for our *human judgment* as it would if it were an objective principle.

§ 77

On the Peculiarity of the Human Understanding That Makes the Concept of a Natural Purpose Possible for Us

In the preceding Comment we mentioned peculiarities of our cognitive power (even of the higher one), and how we are easily misled into transferring these peculiarities to things themselves as if they were objective predicates. But in fact these peculiarities concern ideas, to which

no commensurate object can be given in experience, so that they can serve us only as regulative principles in the pursuit of experience. Now the same applies to the concept of a natural purpose as regards the cause that makes it possible to apply such a predicate: that cause we can find only in our idea of it. And yet here the result which conforms to that idea (i.e., the product itself) is given in nature. Hence the concept of a causality of nature which implies that nature is a being acting according to purposes seems to turn the idea of a natural purpose into a principle that is constitutive of the natural purpose. In this respect this idea is distinguished from all others.

But (in fact) the distinguishing feature consists merely in this: the idea in question is a principle of reason for the power of judgment, not for the understanding. Hence it is a principle that helps us merely to apply understanding generally to possible objects of experience, namely, in those cases where we cannot judge determinatively but can judge merely reflectively. Therefore, even though in those cases the object can be given in experience, yet we cannot even *determinately judge* it in conformity with the idea (let alone do so with complete adequacy) but can only reflect on it.

Hence this distinguishing feature of the idea of a natural purpose concerns a peculiarity of *our* (human) understanding in relation to the power of judgment and its reflection on things of nature. But if that is so, then we must here be presupposing the idea of some possible understanding different from the human one. Just as, in the *Critique of Pure Reason*, we had to have in mind a possible different intuition if we wanted to consider ours as a special kind, namely, as an intuition for which objects count only as appearances). Only by presupposing this idea can we say that because of the special character of our understanding must *we consider* certain natural products, as to how they are possible, as having been produced intentionally and as purposes. And we do say this,

though without implying that there must actually be a special cause that determines objects on the basis of the presentation of a purpose, i.e., without implying that the basis that makes such products of nature possible could not be found, even by an understanding different from (higher than) the human one, in the very mechanism of nature, i.e., in a causal connection that does not necessarily [*ausschliessungsweise*] presuppose an understanding as cause.

So what matters here is how our understanding relates to judgment: we must find in this relation a certain contingency in the character of our understanding, so that we can take note of this peculiarity as what distinguishes our understanding from other possible ones.

We find this contingency quite naturally in the *particular* that judgment has to bring under the *universal* supplied by the concepts of the understanding. For the universal supplied by our (human) understanding does not determine the particular; therefore even if different things agree in a common characteristic, the variety of ways in which they may come before our perception is contingent. For our understanding is a power of concepts, i.e., a discursive understanding, so that it must indeed be contingent for it as to what the character and all the variety of the particular may be that can be given to it in nature and that can be brought under its concepts. Now all cognition requires not only understanding but also intuition; and a power of *complete spontaneity* as opposed to *receptivity of intuition* would be a cognitive power different from and wholly independent of, sensibility: thus a power of complete spontaneity of intuition would be an understanding in the most general sense of the term. Hence can conceive of an *intuitive* – understanding as well (negatively, merely as one that is not discursive), which, unlike ours, does not (by means of concepts) proceed from the universal to the particular and thus to the individual, For such an understanding there would not be that contingency in the way nature's products harmonize with the

understanding in terms of *particular* laws. It is this contingency that makes it so difficult for our understanding to unify the manifold in nature so as to give rise to cognition. This task, which an intuitive understanding does not need to perform, can be accomplished by our understanding only through a harmony between natural characteristics and our power of concepts; and this harmony is very contingent.

Therefore our understanding has this peculiarity as regards judgment: when cognition occurs through our understanding, the particular is not determined by the universal and therefore cannot be derived from it alone. And yet this particular in nature's diversity must (through concepts and laws) harmonize with the universal in order that the particular can be subsumed under the universal. But, under these circumstances, this harmony must be very contingent, and must lack a determinate principle as far as the power of judgment is concerned.

How then can we at least conceive of the possibility of such a harmony – one that is presented as contingent and hence as possible only through a purpose that aims at it – between the things of nature and our judgment? To do this, we must at the same time conceive of a different understanding: without as yet attributing any concept of a purpose to this understanding, we can then present this harmony between the particular natural laws and our judgment as *necessary* relative to that understanding, even though our own understanding can conceive of this harmony only as mediated by purposes.

The point is this: Our understanding has the peculiarity that when it cognizes, e.g., the cause of a product, it must proceed from the *analytically universal* to the particular (i.e., from concepts to the empirical intuition that is given); consequently, in this process our understanding determines nothing regarding the diversity of the particular. Instead (under the supposition that the object is a natural product) our understanding

must wait until the subsumption of the empirical intuition under the concept provides this determination for the power of judgment. But we can also conceive of an understanding that, unlike ours, is not discursive but intuitive and hence proceeds from the *synthetically universal* (the intuition of a whole as a whole) to the particular, i.e., from the whole to the parts. Hence such an understanding as well as its presentation of the whole has no *contingency* in the combination of the parts in order to make a determinate form of the whole possible. Our understanding, on the other hand, requires this contingency, because it must start from the parts taken as bases – which are thought of as universal – for different possible forms that are to be subsumed under these bases as consequences. We, given the character of our understanding, can regard a real whole of nature only as the joint effect of the motive forces of the parts. Let us suppose, then, that we try to present, not the possibility of the whole as dependent on the parts (which would conform to our discursive understanding), but the possibility of the parts, in their character and combination, as dependent on the whole, so that we would be following the standard set by intuitive (archetypal) understanding. If we try to do this, then, in view of that same peculiarity of our understanding, we cannot do it by having the whole contain the basis that makes the connection of the parts possible (since in the discursive kind of cognition this would be a contradiction) The only way that we can present the possibility of the parts as dependent on the whole is by having the whole contain the basis that makes possible the form of that whole as well as the connection of the parts required to make this form possible. Hence such a whole would be an effect, a product, *the presentation of which* is regarded as the *cause* that makes the product possible. But the product of a cause that determines its effect merely on the basis of the presentation of that effect is called a purpose. It follows from this that the fact that we present certain products of nature as possible only in terms of a kind of causality that differs from the causality of the natural laws pertaining to matter, namely, the causality of purposes

and final causes, is merely a consequence of the special character of our understanding. Therefore, this principle of the causality in terms of final causes does not pertain to how such things themselves are possible through this kind of production (not even if we consider them as phenomena), but pertains only to the way our understanding is able to judge them. This clarifies at the same time why we are far from satisfied in natural science if we can explain the products of nature through a causality in terms of purposes: the reason for this is that all we demand in such an explanation is that natural production be judged in a way commensurate with our ability for judging such production, i.e., in a way commensurate with reflective judgment, rather than with the things themselves and for the sake of determinative judgment. And to make these points we do not have to prove that such an *intellectus archetypus* is possible. Rather, we must prove only that the contrast between such an intellect and) our discursive understanding – an understanding which requires images (it is an *intellectus ectypus*) – and the contingency of its having this character lead us to that idea (of an *intellectus archetypus*), and we must prove that this idea does not involve a contradiction.

When we consider a material whole as being, in terms of its form, a product of its parts and of their forces and powers for combining on their own (to which we must add other matter that the parts supply to one another), then our presentation is of a whole produced mechanically. But we get no concept of a whole as a purpose in this way; the inner possibility of a whole as a purpose always presupposes that there is an idea of this whole and presupposes that what these parts are like and how they operate depend on that idea, which is just how we have to present an organized body. But, as I have shown, it does not follow from this that it is impossible for such a body to be produced mechanically. For that would be tantamount to saying that it is impossible (contradictory) *for any understanding* to present such a unity in the combination of a thing's

manifold without also thinking of the idea of that unity as causing it, in other words, without thinking of the production as intentional. But this consequence that an organized body cannot be produced mechanically would in fact follow if we were entitled to regard material beings as things in themselves. For then the unity that is the basis on which natural formations are possible would be only the unity of space, and yet space is not a basis responsible for the reality of products but is only their formal condition; space merely resembles the basis we are seeking inasmuch as no part in space can be determined except in relation to the whole (so that in its case too the possibility of the parts is based on the presentation of the whole). But in fact it is at least possible to consider the material world as mere appearance, and to think something as its substrate, as thing in itself (which is not appearance), and to regard this thing in itself as based on a corresponding intellectual intuition (even though not ours). In that way there would be for nature, which includes us as well, a supersensible basis of its reality, though we could not cognize this basis. Hence we would consider in terms of mechanical laws whatever is necessary in nature as an object of sense; but the harmony and unity of the particular laws of nature and of the forms based on them are contingent in terms of mechanical laws, and so this harmony and unity, as objects of reason, we would at the same time consider in terms of teleological laws (as, indeed, we would consider the whole of nature as a system). So we would judge nature in terms of two kinds of principles, and the mechanical kind of explanation would not be excluded by the teleological as if they contradicted each other.

This also allows us to see what we could otherwise have suspected, but could hardly have asserted with certainty and have proved: that although the principle of a mechanical derivation of purposive natural products is compatible with the teleological principle, the mechanical one could certainly not make the teleological one dispensable. In other words, when

we deal with a thing that we must judge to be a natural purpose (i.e., when we deal with an organized being), though we can try on it all the laws of mechanical production that we know or may yet discover, and though we may indeed hope to make good progress with such mechanical laws, yet we can never account for the possibility of such a product without appealing to a basis for its production that is wholly distinct from the mechanical one, namely, a causality through purposes. Indeed, absolutely no human reason (nor any finite reason similar to ours in quality, no matter how much it may surpass ours in degree) can hope to understand, in terms of nothing but mechanical causes, how so much as a mere blade of grass produced.. For it seems that [*wenn*] judgment is quite unable to study, even if it restricts itself to experience as its guide, how such objects are possible, without using the teleological connection of causes and effects. Yet it also seems that for external objects as appearances we cannot possibly find an adequate basis that refers to purposes, but it seems instead that, even though this basis also lies in nature, we must still search for it only in nature's supersensible substrate, even though all possible insight into that substrate is cut off from us: hence it seems [(German) *so*] that there is absolutely no possibility for us to obtain, from nature itself, bases with which to explain combinations in terms of purposes; rather, the character of the human cognitive power forces us to seek the supreme basis for such combinations in an original understanding, as cause of the world.

§ 78

How the Principle of the Universal Mechanism of Matter and the Teleological Principle Can Be Reconciled in the Technic of Nature

Reason is tremendously concerned not to abandon the mechanism nature employs in its products, and not to pass over it in explaining them,

since without mechanism we cannot gain insight into the nature of things. Even if it were granted that a supreme architect directly created the forms of nature as they have always been, or that he predetermined the ones that in the course of nature keep developing according to the same model, still none of this advances our cognition of nature in the least; for we do not know at all how that being acts, and what its ideas are that are supposed to contain the principles by which natural beings are possible, and so we cannot explain nature by starting from that being, i.e., by descending (in other words, *a priori*) from that being to nature. Or suppose we try to explain by ascending (in other words, *a posteriori*), i.e., we start from the forms of objects of experience because we think they display purposiveness, and then, to explain this purposiveness, we appeal to a cause that acts according to purposes: in that case our explanation would be quite tautologous and we would deceive reason with mere words – not to mention that with this kind of explanation we stray into the transcendent, where our cognition of nature cannot follow us and where reason is seduced to poetic raving, even though reason's foremost vocation is to prevent precisely that.

On the other hand, it is just as necessary a maxim of reason that it not pass over the principle of purposes in dealing with the products of nature. For though this principle does indeed not help us grasp how these products originate, yet it is a heuristic principle for investigating the particular laws of nature. ...