## Dimensions of the Methodological Individualism/Holism Debate

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#### **Abstract**

Analyzing the doctrine of methodological individualism and its opposition to methodological holism, I start by briefly reviewing three historical periods in which the discussion around it was very lively (i.e., the turn of the century around 1900, the 1950s, and the 1980s-90s) explicating the variety of characterizations of methodological individualism. To highlight the connection of these philosophical discussions to social scientific practice, intradisciplinary as well as interdisciplinary dynamics, I then look into the debates around *microfoundations* (in the 1980s) and so-called *economics imperialism* in the social sciences (and its impact within political science in the 1990s). While both the *microfoundations* project and *economics imperialism* are driven by methodological individualists, here too it seems important to pay attention to the variety of understandings of methodological individualism as well as the exact ambition of their undertakings (evaluated along different dimensions, i.e., ontological, epistemological, axiological, and institutional). Overall, I conclude that when looking into the history of the social sciences, the best philosophers can do when discussing methodological individualism and holism is to carefully distinguish the broad variety of positions that can be evaluated along multiple dimensions, to demonstrate the benefits of methodological pluralism as well as expose the downsides of methodological monocultures.

#### Introduction

The debate between methodological individualists and methodological holists deals with one of those classic problems in social science where defining the problem itself amounts to entering a minefield, there are so many aspects to the problem that it is hard to cover all of them all at once. On top of that, the problem has been refocused time and again throughout the history of the social sciences. In Section 1, I briefly review three historical periods in which the discussion around methodological individualism and its opponents was very lively which allows us to explicate a variety of definitions of and motivations for methodological individualism. In Section 2, I introduce a couple of caveats and distinctions to attend to in the debate. To highlight the connection of these philosophical discussions to social scientific practice, intradisciplinary as well as interdisciplinary dynamics, I look first into the debate about microfoundations, in Section 3, and then into the so-called *economics imperialism* in the social sciences, prominent in the 1980s-90s, in Section 4. In Section 5, I conclude that when looking into the history of the social sciences, the best philosophers can do when discussing methodological individualism and holism is to carefully distinguish the broad variety of positions (considering multiple dimensions along which these positions can be evaluated), demonstrate the benefits of methodological pluralism as well as expose the downsides of methodological monocultures.

#### 1. Some historical milestones.

With respect to methodological individualism, Lars Udehn (2002: 479) identifies three periods of intense debate in the history of the social sciences as professionalized since the 19<sup>th</sup> century, i.e., the turn of the century around 1900, the 1950s, and the 1980-90s. This debate was not only animating the social sciences at times, it could also be considered foundational for the philosophy of the social sciences as the long-time editor of the *Philosophy of the Social Sciences* journal, Ian Jarvie, writes: "Emerging from Weber and the Austrian school before there was a philosophy of the social sciences, this [debate over methodological individualism] in a way was the founding debate of the subject in the 1950s." (Jarvie 2011:24)

While the popularization of the wording *methodological individualism* is traditionally linked to the economist Joseph Schumpeter in 1908 (in German), the first exposition of the doctrine of methodological individualism is usually ascribed to Carl Menger who in the 1870s developed Austrian methodological individualism in economics in opposition to the German Historical School – this dispute is characterized as the *Methodenstreit*.¹ Economics –following the *marginalist revolution* of the 1870s of which Menger was part– then further develops into the methodological individualist discipline *par excellence*, while sociology and anthropology are more predominantly methodologically holistic –with explanations invoking social 'wholes', their structure, culture, and/or function– much influenced by Emile Durkheim's anti-individualism. Durkheim was one of the leading advocates of methodological holism at the turn of the century (see, e.g., his *The Rules of Sociological Method*), famously stating that "the determining cause of a social fact must be sought among the antecedent

<sup>1</sup> Udehn (2002:484) writes: "Already in his *Principles of Economics* (1871), Menger tried to reduce the complex phenomena of the economy to their simplest elements, that is, the actions of individual human beings (Menger [1871] 1976, p.46ff). In his next work, *Problems of Economics and Sociology* (1883), he went from practice to principle and formulated the first ambitious program of methodological individualism, or "atomism," in the history of the social sciences. In order to understand economic phenomena we must go back to their true elements, individual human beings, and try to find "the laws by which the former are built up from the latter" (Menger [1883] 1963, p.93)."

social facts and not among the states of the individual consciousness." (Durkheim [1895] 1982:134) A sociologist who was not defending methodological holism though, and typically contrasted with Durkheim, was Max Weber.

Weber is often considered the main proponent of methodological individualism during this period. In a letter to economist Robert Liefmann, Weber writes: "... if I now happen to be a sociologist according to my accreditation papers, then I became one in order to put an end to the mischievous enterprise which still operates with collectivist notions (Kollektivbegriffe). In other words, sociology, too, can only be practiced by proceeding from the action of one or more, few or many, individuals, that means, by employing a strictly 'individualist' method." (Weber quoted by Guenther Roth 1976: 306) Interpretive understanding is central to sociology, according to Weber: sociology is "a science concerning itself with the interpretive understanding of social action and thereby with the causal explanation of its course and consequences" (Weber quoted by Roth 1976: 315) and sociology "treats the single individual and his action as the basic unit, as its 'atom,' if a questionable analogy is allowed here." (Weber quoted by Udehn 2002: 485) It might indeed be a questionable analogy, as an atom does not attach any particular motives or meaning to its actions, while Weber's plea for methodological individualism is to be understood as an explanatory guideline according to which we want social phenomena to be explained in terms of the actions of individual agents enabling us to subjectively understand the meaning or motives for action of those individual agents. These phenomena cannot be solely explained by collectivist notions, by a form of socio-cultural determinism which Weber perceived in methodological holism.

The second period of intense debate around methodological individualism and holism happens in the 1950s. Let us look at John Watkins, a student of Karl Popper, who argues for methodological individualism as follows: "All social phenomena are, directly or indirectly, *human* creations. A lump of matter may exist which no one has perceived, but not a price which no one has charged, or a disciplinary code to which no one refers, or a tool which no one would dream of using. From this truism I infer the methodological principle which underlies this paper, namely, that the social scientist can continue searching for explanations of a social phenomenon until he has reduced it to psychological terms." (Watkins 1952a:28-29)<sup>2</sup> Next, he specifies what sort of knowledge we are after: "An understanding of a complex social situation is always derived from a knowledge of the dispositions, beliefs, and relationships of individuals. Its overt characteristics may be *established* empirically, but they are only *explained* by being shown to be the resultants of individual activities." (Watkins 1952a:29)

Notice how Watkins emphasizes explanation and the logical derivations from psychological regularities and laws. In a follow-up article, Watkins writes about methodological individualism: "This principle states that social processes should be explained by being deduced from principles governing the behaviour of participating individuals and from analyses of their situations, and not from superindividual, 'holistic,' sociological laws." (1952b:186) The language is very much aligned with the Hempel and Oppenheim (1948) paper in which they proposed that the logic of explanation requires, at least implicitly, the use of general laws. Watkins also reasons within what would later be called the layer-cake model (cf., Oppenheim and Putnam 1958), with a level of psychological laws and a level of sociological laws, as well as a relation of reduction from the sociological to the psychological level.

Watkins, however, stops at the psychological level in the layer-cake, which is according to him a 'natural stopping-place': "But the ultimate premisses of social science are human dispositions, i.e.

<sup>&</sup>lt;sup>2</sup> Watkins also explicitly uses the terminology "methodological holism", e.g.: "I am arguing against methodological holism, and for methodological individualism. Our arguments [i.e., Watkins' and Walter Eucken's] tend to coincide because 'historicism' is closely related to 'holism': the belief in laws of development presupposes a 'whole' which undergoes the development." (Watkins 1952a:27)

something familiar and understandable. They 'are so much the stuff of our everyday experience that they have only to be stated to be recognized as obvious.' And while psychology may try to explain these dispositions, they do provide social science with a natural stopping-place in the search for explanations of overt social phenomena." (Watkins 1952a:32-33) Similar to Max Weber, Watkins refers to familiarity and understanding as central aspects of social science. Different from Weber though, as Udehn highlights, Watkins and his contemporaries were advancing methodological individualism as a principle about social explanation: "Methodological individualism was advanced by Max Weber and the Austrians in particular, as a principle about the definition of collective concepts. It has been advanced, especially by Popper and his followers, as a principle about the explanation of social phenomena." (Udehn 2002:497)

The critics of Watkins' methodological individualism also focus on explanation and laws, for instance, Leon Goldstein: "And this can be provided only by a system of socio-cultural laws. There is nothing absurd about the possibility of discovering such laws, and the fact that the principle of methodological individualism is not compatible with the search for them is hardly ground for the rejection of a perfectly tenable program." (Goldstein 1956:811) "Such laws would be concerned with the kinds of conditions under which determinate change may be expected in sociocultural systems, and if the theoretically necessary and sufficient conditions for some determinate kind of change were to obtain, we may reasonably expect that the change would take place. Who the people are whose institutions are changing is not relevant to the problem. The view of the methodological individualist seems to be that social change results from conscious effort, though the results are often more than people bargained for." (Goldstein 1956:812) Without those laws, and with only methodological individualism, many questions cannot be answered: "To the theoretical questions of institutional development and change, of major interest to sociologists and anthropologists, they seem to have paid little attention. And it is precisely upon the analysis of such questions that the principle of methodological individualism breaks down." (Goldstein 1956:802-803)<sup>3</sup>

The third period of intense debate I would like to highlight starts in the late 1970s and goes on in the 1980-90s, with, *inter alia*, the appearance of Analytical Marxism. Three of the most prominent scholars of this variety of Marxism, combining Marxism with analytical methods, were G.A. Cohen, John Roemer, and Jon Elster. As Marxism is arguably one of the most methodologically holist research approaches in the social sciences, it is interesting to see how (most) Analytical Marxists advocate methodological individualism.

Let us briefly look at Elster's advocacy of methodological individualism. The language has now evolved from laws to mechanisms and Elster is interested in laying bare the microfoundations (micromechanisms if you prefer) of Marx's claims about social causalities. Elster writes that: "History is made by individuals and must be explained in terms of individual action" (Elster 1983:32), and how methodological individualism is 'trivially true': "To explain social institutions and social change is to show how they arise as the result of the actions and interaction of individuals. This view, often referred to as methodological individualism, is in my view trivially true." (Elster 1989:13) To explain is "to provide a mechanism, to open up the black box and show the nuts and bolts, the cogs and wheels." (Elster 1985:5) Thus, Elster defends looking for mechanisms, microfoundations for Marxism, as nothing but individual properties, goals, beliefs, actions, and interactions, to explain social structure

<sup>&</sup>lt;sup>3</sup> For readers interested in further exploring these 1950s debates between methodological individualists like Hayek, Popper, and Watkins, on the one hand, and their critics, like Ernest Gellner, Maurice Mandelbaum, and, Goldstein, on the other hand, I recommend the volume by O'Neill (1973) which contains many of the important contributions from this period.

and social change: "It is the belief that the world is governed by local causality that compels us to search for mechanisms of ever-finer grain." (Elster 1983:29)

While the Watkins-era might be pictured in the layer-cake model —with level-specific laws and the idea of micro-reduction— the Elster-era is best captured in the Coleman boat with intra- and interlevel mechanisms. Many defenders of methodological individualism in this period are also looking at rational choice theory as the best option to deliver the microfoundations, something which coincides with the export of rational choice theory from economics to other social sciences. I will return to the Coleman boat and the microfoundations requirement (and its critics) in Section 3, and, rational choice individualism and imperialism in Section 4. Let us first sort out some important distinctions and limitations of the debate between methodological individualists and holists.

#### 2. Some important distinctions and limitations.

As the distinction between Max Weber –focusing on defining collective concepts— and John Watkins –focusing on the explanation of social phenomena— already shows, self-declared methodological individualists might have diverging ideas about what individualism is mainly about. A variety of questions seem to be addressed: (1) Can collectivist concepts like *class* or *state* be reduced to individualist concepts? (2) Are social-level entities and events reducible to individual-level entities and events? Is society just an aggregation of individuals? (3) Can social entities be agents? (4) Are individuals socially constrained? (5) Can social phenomena always be explained in terms of individuals, their actions, and beliefs? Depending on whether you are an individualist or a holist your answer to these questions –some ontological, others semantic or methodological— will vary. I will not discuss these different questions here, I just want to stress that this chapter deals with *methodological* individualism and holism, which should neither be mixed up with *ontological* individualism and holism, nor with *political* versions thereof.<sup>4</sup>

The first important distinction not to lose out of sight is the one between ontological and methodological claims. The former considers whether macro-level social entities are built exclusively out of individuals and their properties ("social entities are composed of individuals"), or whether social entities or their properties are sui generis ("social entities act independently of individuals"). The latter, the methodological one, is not a claim about what there is but about how to gain knowledge of what there is, and this is often understood in terms of explanation, i.e., whether all macro-level social phenomena are ultimately explicable in individual terms, or whether some social phenomena are better explained in social terms. Taking an individualist position on the ontological question does not necessarily imply an individualist position on the methodological one, or one could be a methodological holist without subscribing to ontological holism. In the history of social science and philosophy, we can find quite some defenses where the distinction between ontological and methodological claims is not being made. Take Watkins (1952a), quoted above, who infers methodological individualism from the truism (according to him) that all social phenomena are, directly or indirectly, human creations. (I must add that he qualifies that argument in another article soon afterward (1952b): "I no longer believe that methodological individualism is entailed either by the truism that social objects are created by personal attitudes or by the 'invisibility' of social structures (though I believe that these two considerations support methodological individualism).")

<sup>&</sup>lt;sup>4</sup> Those interested in *ontological* individualism might turn to Epstein (2015), for *political* individualism one could start with Kymlicka (2001).

Although the distinction between ontological and methodological issues is being emphasised by philosophers time and again, this way of reasoning keeps on popping up; a recent example is Pierre Demeulenaere in his introduction to *Analytical Sociology and Social Mechanisms* where he writes that methodological individualism, "can be expressed very simply: Social life exists only by virtue of actors who live it; Consequently a social fact of any kind must be explained by direct reference to the actions of its constituents." (2011:4) Like many have done before him, Demeulenaere makes an inference from composition to explanation; one starts with certain *a priori* or necessary truths concerning social ontology, the nature of social reality, thus deciding on the locus of causation, justified by 'metaphysical commonplace', doubtful transcendental arguments, or even without further argument . . . and, then, the methodological consequences, e.g., the best level of explanation, seem to follow 'automatically' from the ontological stance. This could be called the *ontological fallacy* (cf., Van Bouwel 2003).<sup>5</sup>

Secondly, pleas for methodological individualism are often confused with claims for political individualism (and politics more generally), or motivated by the idea that the use of methodological holism would necessarily result in a threat to political individualism. Schumpeter already emphasized a long time ago the importance of making a sharp distinction between political and methodological individualism: "Both concepts have nothing in common. The first refers to general statements like the freedom of people to develop themselves and to take part in well-being and to follow practical rules. The second does not include any proposition and does not involve a specific starting point. It just means that one starts from the individual in order to describe certain economic relationships." (Schumpeter [1908] 1998: 90-91)

One could respond by pointing at some form of affinity between methodological individualism or methodological holism and some political positions. For instance, the sociologist applying methodological holism might picture the individual as rather determined or steered by social structures or cultural influences, while the economist working within methodological individualism might emphasize the opportunities and choices for the individual to flourish. First, these perspectives are not necessarily incompatible (although they might be perceived as such by the public, cf. Nettle et al. 2023). Second, as we have seen above with Analytical Marxism, there are examples of social scientists who might share similar political values but have a very different methodological position (on the individualism/holism debate). Some Marxists (e.g., Mandel 1989) completely disagreed with Elster's methodological interventions and Elster's conviction that they would uphold Marxist values (or would help to explain and change social reality).

The distinction is important to stress as there are still so often political arguments being formulated for or against certain methodological positions, while the possible combinations between the methodological positions and different political positions are manifold. It is unfortunately not uncommon in the debate that critics of a methodological position try to associate it with an unpopular political position, a form of *guilt by association*. Let us hope we can get beyond those caricatures.

<sup>&</sup>lt;sup>5</sup>The ontological fallacy refers to problematic ways in which consequences regarding the best form of explanation are being drawn from ontological arguments. Notwithstanding the critical questions I raise concerning the ontological approach, let me emphasize that ontological debates could play a legitimate role in considering methodological possibilities of a particular theory, model or approach. The ontological moves I criticize are different in that they are often made *a priori* (not on the basis of a thorough study of social scientific practice) and that the results of the ontological statements are to be generalized across the social sciences (not limiting them to the particular theory, model or approach).

Now, let us turn to what the methodological debate is about, namely what position provides the better social explanations. We can distinguish at least five different positions in the literature (as seen from contemporary philosophy, which is of course historically situated too)<sup>6</sup>:

Strong MI: Social phenomena can/must always be explained in terms of individuals, their properties, and actions, i.e., by individualist explanations.

Strong MH: Social phenomena can/must always be explained in non-individualist terms, by social structures, institutions, social functions, or, culture, i.e., by holist explanations.

*Weaker MI:* Individualist explanations of social phenomena are always better than holist explanations, even if there would be satisfactory holist explanations (there is a fine-grain preference). The individualist explanations also might assign a role to social institutions or social structure (*inter alia*, in combination with a microfoundations requirement).<sup>7</sup>

Weaker MH: Holist explanations of social phenomena are always better than individualist explanations, even if there would be satisfactory individualist explanations.<sup>8</sup>

MP or Explanatory Pluralism: Both individualist and holist explanations are indispensable in the social sciences. What is the better explanation will be dependent on the explanation-seeking question at stake (and explanation-seeking questions vary depending on the epistemic interests that have to be addressed).

In Section 3, I will explore the debate about microfoundations in the social sciences, as one instance in which 'what is the better explanation' is up for discussion. Before that, let me add one last reflection about some "givens" in the debate in particular with respect to the notion of stratified levels and the idea of a well-defined individual level.

Watkins (1952a) wrote about the 'natural stopping-place', the level of individual dispositions, when providing explanations of social phenomena. As Petri Ylikoski (2012) has convincingly argued, this idea of a natural stopping-place is very present in the debate, with the individual level being understood in an absolute way. The individual level, according to Ylikoski, is understood as (1) *unique*, in all social explanations the individual level would always be the same; (2) *comprehensive*, there is a consistent and well-defined individual level that is sufficient to cover all social phenomena and serve as a reduction basis for all non-individual social notions; and, (3) *privileged*, explanations in terms of this individual level have some special explanatory qualities that set them apart from explanations at other

<sup>&</sup>lt;sup>6</sup> A reviewer recommended me to mention that some might disagree with the characterization of these positions. 
<sup>7</sup>Among this weaker versions of methodological individualism, one could also count the versions that are less restrictively individual and allow social elements (without giving up the label of methodological individualism), i.e. *structural individualism, social individualism, institutional individualism*, etc., they are including *explanantia* that are not as strictly individualist as the strong version of MI would require, relaxing the requirement of exclusivity. Udehn (2002:498) writes: "The doctrine of methodological individualism, then, ranges from versions requiring that social phenomena be fully explained in terms of individuals, to versions requiring only that they be partly explained in terms of individuals. How large this individualistic part must be is not stated, and cannot be stated, at least not precisely, but it is possible to conceive of a version of methodological individualism that assigns virtually all explanatory power to social institutions and social structure, and only a small fraction of it to individuals."

<sup>&</sup>lt;sup>8</sup> One could also add holist explanations supplemented with individualist parts. In the end, one might wonder to what extent *Weaker MH* is then any different from *Weaker MI*. Udehn writes: "With the occurrence of institutional and structural individualism on the scene, important holistic elements were included in methodological individualism. The result is that the previous line separating methodological individualism and holism has become blurred and the two doctrines no longer appear as clear-cut opposites." (2002:502)

levels (cf., Ylikoski 2012:26). Ylikoski argues against this mainstream view of the individual level and defends that levels should be understood perspectivally, in the sense that the levels are dependent on the explanatory target (lbid., 25). The exact contrast between a lower or micro-level and a higher or macro-level depends on one's explanatory interests, not on a priori considerations, according to Ylikoski; there is no predetermined individual and/or social level. There is also no reason to stop opening the black box at the individual level, while it is often assumed (like Watkins did) that the individualist can stop opening the black box once we are at an individual level, the 'natural stopping-place', where contrary to explanations invoking supra-individual social structures or macromechanisms, no further microfoundations have to be provided. Furthermore, Ylikoski (2012) also argues that the idea of *levels* better be replaced by *scales*.

The problematic notion of levels is not limited to the social sciences, of course. Potochnik and McGill, among other philosophers of science, question the concept of universal and discrete hierarchical levels in the sciences more generally: "Indeed, the very notion of stratified levels depends on not only the ubiquity, but also the uniformity, of part-whole composition. For strata to emerge, atoms must always compose molecules, populations must always compose communities, and so forth. But the uniformity of composition needed for stratified levels simply does not exist." (2012:126)

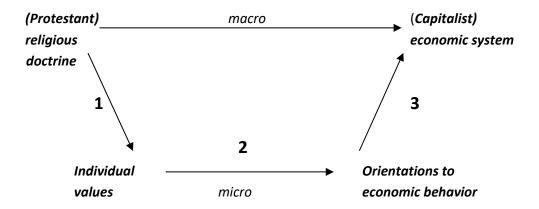
The take-home lesson of much of this literature in philosophy of science seems to be to avoid turning the levels into something absolute. Nevertheless, they could be of analytical usage when one focuses on particular levels that are relative to and specified in relation to one's research questions. So, exactly what level is relevant or how it is being specified might shift depending on what one wants to study. Explanations and theories might then exhibit a mono-level structure or rather include multiple levels simultaneously. Let us see how that played out in the history of the social sciences.

## 3. The 1980s microfoundations debate.

In this section, I return to the Analytical Marxists and further explore how they give form to methodological individualism, with a particular focus on the work of Jon Elster. Elster provides a systematic criticism of functionalism and teleological thinking in Marx's work and insists on the need for microfoundations in social science. He defines 'methodological individualism' in the following terms: "Social science explanations are seen as three-tiered. First, there is a causal explanation of mental states, such as desires and beliefs ... Next, there is intentional explanation of individual action in terms of the underlying beliefs and desires ... Finally, there is causal explanation of aggregated phenomena in terms of the individual actions that go into them. The last form is the specifically Marxist contribution to the methodology of the social sciences." (Elster 1985:4) The three steps of these explanations are visualized in the so-called Coleman boat -sometimes called the Coleman bathtub. This boat, a diagram taken from James Coleman, pictures a mechanism model of explanation in which a social phenomenon is, via underlying mechanisms, brought about by another social phenomenon; as such the black box of functionalism and teleological thinking in Marx's work is opened, and "the nuts and bolts, the cogs and wheels" (Elster 1985:5) are shown. The purely holist explanations of Marx actually do not constitute satisfactory explanations unless they are supplemented by microfoundations, by accounts of the underlying mechanisms on the individual level, or so the reasoning of Analytical Marxists goes.

To make this more concrete, let us look at a diagram taken from Coleman (1986) that clarifies how social mechanisms bring about social macro-phenomena or social outcomes, discussing the effect of religious doctrine on the economic system (based on Max Weber's book *The Protestant Ethic and the Spirit of Capitalism*). The diagram has, on the one hand, a macro-to-macro relation (which Coleman

labels as methodological holism) that connects large macro-level variables. Coleman (1986:1321) writes about macro-macro: "Some social theory and some social research are based entirely on relations of this sort. They exhibit a methodological holism that contrasts to the methodological individualism that grounds sociology in a theory of action." On the other hand, Coleman speaks of macro-micro-macro relations which he links to methodological individualism. This involves arrows 1, 2, and 3 in the diagram. Arrow 1, macro-to-micro represents how social situations and cultural environments influence and constrain individuals' actions, desires, and beliefs. Next, arrow 2 represents how individuals with their beliefs, desires, and action opportunities choose their preferred action among the feasible alternatives. Finally, arrow 3 represents how individual actions are transformed into various intended and unintended social outcomes, the way actions combine and generate a collective outcome, thus producing a new social situation. Coleman aims to have a theory of purposive action as a foundation for social theory, entailing the acceptance of a form of methodological individualism and the rejection of methodological holism (related to the macro-to-macro arrow).<sup>9</sup>



Coleman (1986:1327) then calls for contributions to the knowledge of relations of types 1, 2, and ("in particular to the most elusive of these three relations, the micro-to-macro relation") the relation of type 3. He seeks microfoundations.

Thus, the idea of microfoundations basically stipulates that: "all social facts, social structures, and social causal properties depend ultimately on facts about individuals within socially defined circumstances. Social ascriptions require microfoundations at the level of individuals in concrete social relationships." (Little 2012:138) Next, "an explanation of a macro-social phenomenon must be accompanied by a sketch of plausible microfoundations for the causal linkages it postulates" (Little 2013:605).

What does the microfoundations requirement imply for an explanation to the better one or to be satisfactory? According to scholars that support this microfoundations requirement, the validity of social explanations depends on whether a credible sketch of the microfoundations underlying a macro-to-macro relation can be given. Reading this requirement, a lot depends on how one understands "sketch", how fully specified do we want the microfoundations to be, and what does the

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<sup>&</sup>lt;sup>9</sup> Coleman's methodological individualism can be characterized as a weak version of MI. He writes, e.g., that the "theoretical position of methodological individualism is fully compatible with recognition of the constraints on action that social structure creates." (Coleman 1986:1310). Udehn (2002:495) calls Coleman's MI "peculiar" and classifies it as "structural individualism" which "is distinct from institutional individualism because it adds something to the latter. It is also more holistic, since it implies a set of interrelated positions that determine the interaction between individuals occupying these positions, an idea that is central to most versions of social holism." (Ibid.)

microfoundations requirement exactly imply for a social explanation to be satisfactory? Will the satisfactory explanation (1) only contain the lower part of the boat excluding the macro-to-macro relation, or (2) is the satisfactory explanation a combination of the macro and the micro level, or (3) is it just the macro-to-macro relation as a satisfactory explanation with the condition that a plausible account of the micro-level can be provided (without the latter having to be part of the explanation)? Advocates of the microfoundations requirement have been formulating different answers to these questions (cf., Van Bouwel 2019):

- (1) For some, a macro-explanation (i.e., the upper part of the Coleman boat relating macrofactors like the Protestant religious doctrine and a capitalist economic system) will never be satisfactory. Hedström and Swedberg (1998), for instance, state in their presentation of the social mechanisms approach: "In the social sciences, however, the elementary 'causal agents' are always individual actors, and intelligible social science explanations should always include explicit references to the causes and consequences of their actions." (Hedström and Swedberg 1998:11-12) For them, this does not only imply that we need a micro-level part in every explanation, but also: "that there exist no macro-level mechanisms; macro-level entities or events are linked to one another via combinations of situational, individual action, and transformation mechanisms, i.e., all macro-level change should be conceptualized in terms of three separate transitions (macro-micro, micro-micro, and micro-macro)." (Hedström and Swedberg 1996:299) As becomes clear after reading this quote, excluding (macro-to-macro) mechanisms on a macro-level does not mean that the defenders of social mechanisms want to exclude all references to entities on the macro-level from social explanations; they just consider a reference to (individual actions on) the individual, micro-level as a condition sine qua non of a satisfactory explanation. Underlying this claim seems to be an ontological conviction, a conviction concerning causation, namely that causal agents are always individual actors.
- (2) Where some see only the lower part of the Coleman boat as a satisfactory explanation (macro-to-micro, micro-to-micro, micro-to-macro), others see the satisfactory explanation as integrating both macro-level and the micro-level in the explanation. Some weaker versions of methodological individualism might recognize that there are indispensable holist (macro-to-macro) explanations, but that they do not stand on their own, they should be supplemented with individual-level microfoundations. Daniel Little (1994) writes, for instance: "social explanation must be explicitly grounded on an account of the microfoundations that produce them. [...] A putative explanation couched at the level of high-level social factors whose underlying individual-level mechanisms are entirely unknown is no explanation at all." (Little 1994:484).
- (3) Interestingly, Daniel Little revised his position a bit in his later work: "The requirement of microfoundations is not a requirement on explanation; it does not require that our explanations proceed through the microfoundational level. Rather, it is a condition that must be satisfied on *prima facie* grounds, prior to offering the explanation (...) In short, we are not obliged to trace out the struts of Coleman's boat in order to provide a satisfactory macro- or meso-level explanation or mechanism." (Little 2012:143). So, in this third option, the macro-level explanation is being considered satisfactory with the condition that some account of the lower part of the boat can be provided (without the latter having to be part of the explanation); microfoundations would play a justificatory rather than an explanatory role. Little adds that one argument for his position is scientific practice itself, "the fact that good sociologists do in fact make credible use of such claims." (Little 2012:145)<sup>10</sup>

Thus, in sociology, this search for microfoundations driven by methodological individualists, engendered an intradisciplinary dynamic in which competing theories and explanations were

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<sup>&</sup>lt;sup>10</sup> Let me add here that Daniel Little labels his current approach "methodological localism" and distinguishes it from "classical methodological individualism". (cf., Little 2014:56)

confronted with one another. The microfoundations project ended up being epistemically beneficial along at least three different epistemic dimensions, I think:

- (a) As mentioned above, among methodological individualists there is quite some variation about what the better explanation would be even if they agree that searching for microfoundations is important. The visualization of microfoundations making use of the Coleman boat is a great tool to spell out this variety of positions among methodological individualists. (In practice, some of these *Weaker MI* positions might be very difficult to distinguish from *Weaker MH* positions. One important difference here might be that most holists would never subscribe to a microfoundations requirement in all situations; they would rather wonder whether we are not all of the time providing all kinds of explanations and causal claims, without knowing the underlying mechanisms or foundations (cf., Kincaid 2015:1129)? Why should we have this requirement specifically for social explanations?)
- **(b)** A second epistemic dimension of the microfoundations project is that it could also be considered as developing a heuristic; aiming to establish microfoundations might help us to integrate the causal information of different levels with one another, stimulate the interaction and integration of pieces of explanatory knowledge. (A critic of the microfoundations requirement might welcome the integrative spirit, but why should we limit it to microfoundations at the individual level, why not extend it to identifying *macrofoundations* or a *macroroof*, aiming to integrate or to check the compatibility of the information contained in the social explanation with pieces of explanatory knowledge at a higher level, how the macro makes the micro work? (cf. Van Bouwel 2019) Or, why not require microfoundations of microfoundations (in this case that would be the sub-individual level), for instance, is this another instance of the 'natural stopping-place'?<sup>11</sup>)
- (c) The third epistemic aspect I would like to highlight is the confirming or justifying role of microfoundations. One could, for instance, understand Coleman's project as an intent to *justify* Max Weber's causal claim concerning the Protestant ethic and the rise of modern capitalism by providing micro-mechanisms; knowing the causal mechanisms by which individual actions are formed and influence social outcomes might play an important role in justifying causal claims. This does not imply that Coleman sees the micro-mechanisms as a *sine qua non* of every social explanation (i.e., that it has to be *part of* the explanation), or that Coleman would aim for reductionistic accounts, reducing the macro to the individual micro-level. Quite the contrary, Coleman's boat requires us to pay attention to the mechanisms by which social macro-facts condition the decision-making processes of individual agents, as such highlighting and attributing causal importance to the social macro level. (The critic might acknowledge that analyzing the interaction, cooperation, or mutual influence between microand macro-levels, definitely is epistemically beneficial, however, some questions do remain. What does this microfoundations requirement mean in practice; when are microfoundations satisfactorily stipulated in order for a macro-explanation to be justified?)

Overall, the quest for microfoundations in the social sciences is a positive and fruitful project of which I tried to highlight the different epistemic benefits (beyond being a mere attempt to prove methodological individualism correct). Dan Little, an important contributor to the microfoundations project, links his own account of explanation to pluralism, "this implies the legitimacy of a fairly broad

<sup>&</sup>lt;sup>11</sup> That *both* higher levels and lower levels might help to integrate causal information is a point that has been made more than once in the mechanisms literature, for instance, in relation to biology: "Higher-level entities and activities are thus essential to the intelligibility of those at lower levels, just as much as those at lower levels are essential for understanding those at higher levels. It is the integration of different levels into productive relations that renders the phenomena intelligible and thereby explains it." (Machamer et al. 2000:23).

conception of methodological pluralism in the social sciences, constrained always by the requirement of microfoundations." (Little 2012:146) It remains to be seen to what extent the microfoundations requirement leads to pluralism, or to what kind of pluralism. I have been defending methodological and explanatory pluralism myself and I disagree with Little about the microfoundations requirement always having to be fulfilled. As I illustrated in Van Bouwel (2006, 2014), in response to some explanation-seeking questions, holist explanations do not have to be complemented by accounts of microfoundations. We can have satisfactory and complete answers to some explanation-seeking questions without the underlying individual-level mechanisms, adding them would not make the explanation any better.

Moreover, there are some situations in which the microfoundations requirement might be counterproductive and just macro-explanations at the social level are to be preferred:

First, a macro-explanation without any microfoundations might provide the required explanatory information —answering the explanation-seeking question— in a very effective and non-redundant way. One could ask why it would be a problem to have a bit more explanatory information by providing microfoundations at the individual level (even if it is not strictly necessary to have a satisfactory explanation). It is not obvious that microfoundations always add useful explanatory information, just having the macro might sometimes be epistemically more advantageous or, given our limited cognitive systems, just the optimal level of explanatory information we can deal with —more microfoundational details might make the explanatory story more difficult to comprehend or process. (cf. Van Bouwel 2019)

Second, macro-explanations are easier to construct: we do not need specific causal information about individuals, nor to address the heterogeneity of underlying individual details. Sometimes microfoundations might increase intelligibility or provide more effective interventions, but in other cases, they might just provide too much and unnecessary information, decrease intelligibility – for instance, in cases of multiple realization—and blur what interventions would be more efficacious.

Third, macro-explanations might be more stable (insensitive to disturbance). Micro-explanations are sometimes misleading when it comes to answering contrastive explanation-seeking questions: each micro-explanation specifies one way to remove the contrast. The numerous other possibilities, involving other individual accounts, are neglected. The micro-explanation does not always give information about the sensitivity of the macro-state to changes at the micro-state; it sometimes picks one specific set of micro-changes that is sufficient to provoke a change at the macro-level. It does not tell us which other perturbations at the micro-level would produce the same change in the macro-state, and which perturbations would produce no change or a different change in the macro-state. (cf., Van Bouwel 2006)

Fourth, in practice, there is also the risk that the microfoundations requirement narrows the range of acceptable macro-explanations, i.e., the range of phenomena macro-accounts can address (something which happened in mainstream economics, for instance, according to Wren-Lewis (2007), I will return to that below). Thus, putting too much emphasis on plausibly connecting the macro to the micro as a way to assure ontological compatibility, or on having to be confident that microfoundations exist, carries the risk of missing out on satisfactory macro-explanations.

That said, for some explanation-seeking questions to be answered in the best way possible, we need micro-explanations, and given its epistemic benefits, the quest for microfoundations should definitely not be stopped. Both individualist and holist explanations are indispensable in the social sciences in order to address our different epistemic interests as well as possible, or so I have argued in my defenses of methodological and explanatory pluralism.

### 4. The dimensions of economics imperialism.

Historically speaking, the so-called *economics imperialism* in the second half of the 20<sup>th</sup> century offers us a good illustration of how methodological individualism, and the microfoundations requirement, impacted the social sciences. The central idea of economics imperialism is that conceptual and methodological tools from economics are being used to improve knowledge in the social sciences outside of economics, simultaneously expanding the explanatory scope of economics into other disciplines. Uskali Mäki describes it as follows: "Economics imperialism is a matter of persistent pursuit to increase the degree of unification provided by rational choice theory by way of applying it to new types of explanandum phenomena that are located in territories that are occupied by disciplines other than economics." (2002:238)

It should be emphasized that it is the *dominant* economic theory and methodology that is being applied far beyond its original home, in particular the technical apparatus of microeconomics. This apparatus includes the rational individual, maximizing utility in all decision-making, whose economic behavior is being coordinated through the markets (characterized by supply and demand functions). Typical non-market environmentsare then being treated as if a market were present, for instance, families, or political and governmental institutions (cf. public choice theory). In terms of social scientific disciplines, it implies that economic theory and methodology are being applied in disciplines like political science, sociology, history, anthropology, jurisprudence, and so on; topics and questions traditionally pertaining to these disciplines are then being addressed by the use of rational choice theory or game theory. The application in –some would say the invasion of– disciplines outside of economics is then understood as economics *imperialism*, the *colonization* of other social sciences – some would also point out how the particular microeconomics approach colonized economics internally.<sup>13</sup> In the late 20<sup>th</sup> century, it accompanies a move from a market economy to a market society.<sup>14</sup>

We have already discussed how methodological individualism is present in the microfoundations project, and the individualist rational choice imperialism pushes the same line, simultaneously defending its universal applicability, see, e.g., Hirshleifer: "What gives economics its imperialist invasive power is that our analytic categories —scarcity, cost, preferences, opportunities, etc.— are truly universal in applicability. Even more important is our structured organization of these concepts into the distinct yet intertwined processes of optimization on the individual decision level and equilibrium on the social level of analysis." (Hirshleifer 1985:53)<sup>15</sup>

<sup>&</sup>lt;sup>12</sup> This is one historical incarnation of MI, a very influential one within the social sciences of the second half of the 20<sup>th</sup> century. There existed of course also other projects driven by MI in the social sciences during that period, but I chose this one as it had a big impact (I am mainly focussing on its impact in political science here).

<sup>&</sup>lt;sup>13</sup>The label *imperialism* might sound too strong, but Gary Becker –author of the *locus classicus* (his 1976) of economics imperialism– actually agrees with the label: "This definition of "economic imperialism" is probably a good description of what I do." (Swedberg 1990:39) The use of *imperialism* in the title by Lazear (2000), a supporter, is also telling.

<sup>&</sup>lt;sup>14</sup>There is an interesting externalist account to be told here too, but that is beyond the scope of this chapter. Just one illustration, the 1980s Analytical Marxism and rational choice imperialism played an important role in the universal basic income debate, see Jäger and Zamora Vargas 2023:118ff.

<sup>&</sup>lt;sup>15</sup>Let me just remark that in rational choice models the agent does not necessarily have be a human individual, sometimes it is a nation-state, firm, etc. Remember the perspectival nature of levels mentioned above. Some philosophers have also argued that rational choice theory is not a 'pure' form of methodological individualism as it uses prior social information, information that originates from some prior social processes or phenomena.

A notable exponent of economics imperialism is Gary Becker, who was a professor at the University of Chicago and advocated for applying utility-maximizing behavior, market equilibrium, stable preferences, rational choice, and other core economic tenets to the domains of sociology, psychology, law, and other fields, see e.g., Becker's A Treatise on the Family (1981) as a paradigmatic work. Becker (1976) contended "that the economic approach is uniquely powerful because it can integrate a wide range of human behavior" (1976:5) and it is "not restricted in application to material goods or even markets" (Becker 1976:5); it goes beyond economics' traditional domain of market phenomena, to what had been considered outside of it, non-market settings, cf., his work on household behavior, discrimination, crime, addiction, etc. In his 1981, Becker writes: "The economic approach ... assumes that individuals maximize their utility from basic preferences that do not change rapidly over time, and that the behavior of different individuals is coordinated by explicit and implicit markets" (1981: ix). He continues, "this volume uses the assumptions of maximizing behavior, stable preferences, and equilibrium in implicit or explicit markets to provide a systematic analysis of the family." (1981: ix) And in his Nobel speech he concludes that: "The rational choice model provides the most promising basis presently available for a unified approach to the analysis of the social world by scholars from the social sciences." (Becker 1992:52, my italics)

The reactions to this economics imperialism within the social sciences have been wide-ranging, from wild appraisal (e.g., Lazear 2000), to considering it just a hegemonic practice with zero scientific surplus and radically rejecting it (e.g., Fine 2019). How appropriate is such imperialism? Here I will review some criteria developed by Mäki (2009) that can be used in evaluating economics imperialism. Mäki starts from the observation that economics imperialism can be understood as striving for unification, and that unification is considered a respectable achievement amongst most scientists and philosophers of science; it boils down to expanding the domain of phenomena explained by a more parsimonious theory. Becker stated in his Nobel Lecture that the rational choice model is "the most promising basis currently available for a unified approach" in social science. (Becker 1992: 52) However, we cannot just conclude that every attempt at unification and explanatory expansion is to be considered an unconditional success. Certain criteria can help us evaluate the unification and expansion. We will consider (4.1) *ontological*, (4.2) *epistemological*, (4.3) *axiological*, and, (4.4) *institutional* criteria. I will spend some pages on those criteria, as I think they explicate different dimensions which are also helpful in evaluating the different positions within the methodological individualism/holism debate.

## 4.1. Ontological dimension: Does economics imperialism involve genuine ontological unification?

A first question to consider is whether the instance of economics imperialism that one is evaluating actually leads to genuine ontological unification. As quotes from Becker and Hirshleifer mentioned above already illustrated, among supporters of economics imperialism ("truly universal in applicability") there is the idea that it leads to unification ("a unified approach to the analysis of the social world"). Mäki (2009) teaches us, however, that it is important to distinguish derivational unification from genuine ontological unification. To explain the difference, Mäki writes: "One of my favorite examples of derivational unification has been given by game theorist Robert Aumann (1985). Aumann is explicit about unification being a major virtue of theories (all the italics are added in the following). "Part of the greatness of theories like gravitation or evolution, or the atomic theory of matter, is that they cover so much ground, that they 'explain' so many different things. … The idea of gravitation itself, in the abstract, is rather mysterious; it is important because it enables us to relate the tides to the motion of the planets and to the trajectories of shells and missiles" (30). The accompanying feature is "spareness; as few as possible exogenous parameters should be used to

account for any particular phenomenon. . . . In addition . . . one would like spareness in the basic structure of the theory. . . . " (31)." (Mäki 2009:363)

He continues: "Further textual evidence suggests that what Aumann has in mind is derivational unification. As a general point, he says: "In constructing such a theory, we are not trying to get at the truth, or even to approximate to it: rather, we are trying to organize our thoughts and observations in a useful manner" (31–32). In relation to game theory, the principle applies: . . . a solution notion is the scientists' way of organizing in a single framework many disparate phenomena and many disparate ideas" (34–35). Economics is no exception to the general principle of derivational unification: Aumann says, "the validity of utility maximization does not depend on its being an accurate description of the behavior of individuals. Rather, it derives from its being the underlying postulate that pulls together most of economic theory ... Alternatives such as satisficing have proved next to useless in this respect. While attractive as hypotheses, there is little theory built on them; they pull together almost nothing; they have few interesting consequences. In judging utility maximization, we must ask not 'Is it plausible?' but 'What does it tie together, where does it lead?'" (35)." (Mäki 2009: 364)

The second kind of unification Mäki distinguishes is the more genuine ontological unification: "Ontological unification is a matter of redescribing large classes of apparently independent explanandum phenomena as forms or manifestations of a common system of entities, causes, and mechanisms. It is based on the representational capacities of theories in depicting such underlying systems." (Mäki 2009:364) It is then "a matter of generating a unification of a theory across a wider range of phenomena, not simply in a derivational way showing how the logical formulae of the theory could be applied to new phenomena, but in an ontological way where the theory is shown to increasingly represent the 'the simplest mechanisms and processes of the world's workings.'"(Mäki, 2009:364) If the contribution of a unifying theory is only derivational, little is gained in scientific terms, i.e., a theory might provide the tools to derive a lot of conclusions analytically, deriving a set of conclusions from a set of premises, however not empirically verified, achieving an expansion that does not increase the explanatory power of science. It might be considered a form of scientific expansion, but, if not accompanied by verification with empirical tests, it does not necessarily advance scientific understanding.

I already mentioned the *ontological fallacy* in Section 2. The derivational unification is a similar strategy, as it is a way of unifying the social sciences that starts with some *a priori* assumptions concerning social ontology (often based on questionable arguments, and raising doubts on whether the ontological assumptions could at all be revised). Next, this *a priori* ontological stance reduces epistemological matters into an ontological one – it is a failure to adequately sustain the distinction between ontology and epistemology, that is, a failure to deal with both ontology and epistemology in a non-reductive way. This fallacy is not limited to defenders of methodological individualism as I illustrated in Van Bouwel (2003).

Besides questions about how ontological unification is brought about, questions might also be raised about whether ontological unification should be an aim. The recent literature on scientific pluralism (e.g., Kellert et al. 2006, Chang 2012) shows that in scientific practice there are cases of theoretical and explanatory pluralism that will never converge in a unified account, being irreducible to one another. Moreover, those defenders of scientific pluralism argue that it is actually an epistemically preferable situation to have this plurality, and that aiming for ontological unification does not necessarily contribute to a better understanding or better explanations of the phenomena studied. These are all aspects to consider when evaluating along the ontological dimension.

# **4.2.** Epistemological dimensions of unification and interdisciplinarity driven by economics imperialism.

When evaluating the epistemological dimension, if one theory more successfully explains the phenomena to which it initially was applied as well as those previously explained by another theory, then the encompassing theory seems to be preferable; scientists generally prefer parsimony in theory choice, preferring theories that make the fewest assumptions. When we look at rational choice theory being applied outside of economics, and the promise that this could be a parsimonious encompassing theory for the social sciences, it seems important to consider some reactions (in terms of epistemic benefits or adequacy) to rational choice imperialism.

Political scientists, for instance, pointed out that economics imperialism is theory- and method-driven, not problem- or question-driven. The method dictates the problem, not vice versa. The focus is on the development of techniques, not on substantial political questions. Ian Shapiro (2002) elaborated on this distinction between theory- and method-driven on the one hand, and problem- and question-driven on the other. Problem- or question-driven "is understood to require specification of the problem under study in ways that are not mere artefacts of the theories and methods that are deployed to study it." (2002:590) Method-driven research leads "to self-serving construction of problems, misuse of data in various ways, and related pathologies summed up in the old adage that if the only tool you have is a hammer everything around you starts to look like a nail." (2002:598) For example, "making a fetish of prediction can undermine problem-driven research via wag-the-dog scenarios in which we elect to study phenomena because they seem to admit the possibility of prediction rather than because we have independent reasons for thinking it worthwhile to study them." (2002:609)

Economics imperialism is thus perceived by these political scientists as eager to prove that the dominant economic theory and method is superior by the self-serving construction of political problems and by substituting existing theories and/or methods in political science. This raises questions about the epistemic adequacy of the theory; is it apt to answer unaddressed political questions or rather driven to get the social world into one theory, with one preferred form of explanation? If one wants the social sciences to be as well-equipped as possible to answer a broad range of explanation-seeking questions, addressing different epistemic interests, then it will have to evaluate theories in terms of how adequate they answer our explanation-seeking questions. Falling back on one theory and one form of explanation might result in a suboptimal situation as concerns the amount of explanation-seeking questions that can be dealt with in the best way possible. (cf., Van Bouwel 2014)

Green and Shapiro (1994) also elaborated on the "Methodological Pathologies" of rational choice applications in political science, pointing at "the syndrome of fundamental and recurrent methodological failings rooted in the universalist aspirations that motivate so much rational choice theorizing. These concern the ways hypotheses are conceptualized, the manner in which they are transformed into testable propositions, and the interpretation of empirical results when tests are conducted." (Green and Shapiro 1994:33) The analytical elegance and often sophisticated mathematics might help to mask uncertainties, but Green and Shapiro illustrate convincingly the often sloppy empirical testing, the biased fashion of selecting evidence, selective interpretation of data, arbitrary domain restrictions, and so on (Green and Shapiro 1994: ch.3).

Moreover, commitment or confidence might be filling in gaps left by a lack of evidential support, as Gary Becker himself stated: "So I start with the assumption that behavior is rational, and ask, "As I apply this to a particular problem, is there behavior that I cannot explain with the rationality

model?" Since rationality can be pretty flexible and the data are often limited, I don't frequently encounter decisive evidence against rationality. Anyway, that is my way of doing things. Others are more agnostic about the scope of rationality, so they will approach a problem by asking, "Does this look like rational behavior or is it better interpreted in a different way?" Part of the difference, therefore, is the degree of *commitment* or *confidence* one has of finding rational behavior when investigating a particular set of phenomena." (Becker in Swedberg 1990:41)

Epistemologically speaking, the uncertainty regarding evidence is papered over by commitment. That does not make the uncertainty disappear, of course, what it mainly shows is the excessive confidence typical of some economics imperialism proponents. One could ask for some epistemic humility. A first step could be to not consider applications of rational choice imperialism as *substitutes* for the existing theories in a colonized field, but rather consider them as *complements* to the existing theories. This would open up for critical interaction, for assessing the relative strengths and weaknesses of different theories, acknowledging that they answer different explanation-seeking questions, considering some division of labor, and so on. The economics imperialist might contemplate replacing their excessive confidence with some epistemic modesty. <sup>16</sup> (cf., Mäki 2020)

As I already mentioned above, when we talk about economics imperialism, we talk about the dominant or mainstream microeconomics. Even within economics, many feel colonized by this dominant theory. It imposes an idea of microfoundations within economics too, i.e., that we can only accept something at the macro-level when we are confident that there are plausible microfoundations following the dominant theory. Simon Wren-Lewis (2007) warns us, based on his analysis of macroeconomics, that the microfoundations requirement in mainstream economics narrows the range of acceptable macro-explanations, i.e., the range of phenomena macro-accounts can address. He argues that the microfoundations requirement changed the way macroeconomics is done, with there being a much greater emphasis on the internal consistency of models nowadays and a greater tolerance of external inconsistency (cf., inconsistency with the data): "Features of real economies may not be incorporated into models because their rationale in terms of microeconomic theory has yet to be established. Taken literally, the microfoundations methodology implies that the pace of development of macromodels is governed by the speed of theoretical innovation, rather than empirical discovery." (ibid., 58) Thus, we learn from Wren-Lewis's analysis that requiring macroexplanations and macro-accounts to be plausibly microfounded could have as a consequence that explanations with empirical backing but lacking a microfoundations rationale would not be allowed/published. In those cases, a microfoundations requirement ends up hampering explanatory progress.<sup>17</sup> In short, when considering the epistemological dimension of economics imperialism

<sup>&</sup>lt;sup>16</sup>It might not be easy for mainstream economists to consider, for instance, some form of methodological pluralism. Thinking beyond methodological individualism is hard for mainstream economics according to Fine: "mainstream economics is extremely uncomfortable with the non-individualistic or what can be derived from it, not least with respect to issues of power and conflict, and equally ill at ease with the critical examination of the meaning and reconstruction of concepts and their normative content." (Fine 2019:140) "[the concept of financialisation] whilst understandably prominent as a deficiency of the mainstream, brought to light by the GFC, this is merely the tip of the iceberg of a legion of deficiencies driven even by a suspended methodological individualism: how we deal with innovation, distribution, monopolisation, globalisation, neoliberalisation, the exercise of power, conflicts, their meanings, contextualisation and determinants." (Fine 2019:141)

<sup>&</sup>lt;sup>17</sup>Along the same lines, Ben Fine writes: "With the New Classical Economics (NCE), and the emergence of rational expectations, representative individuals, and so on, macroeconomics was increasingly driven to the extremes of microeconomics, and assumptions to suit the theory rather than the subject matter." (...) "With real business cycles, and technical change treated as random shocks, the NCE was macro treated as micro, and not only taken to extremes but also in extreme ways. Lucas (2003) famously declares that micro has the prospect of

applications, we must make sure the claims are empirically evidenced, compare whether they answer substantial explanation-seeking questions (more) adequately (than existing theories), and check their ambition (substitutive vs complementary).

### 4.3. Axiological dimension: Are the contributions of economics imperialism valuable?

The next question to raise is whether the contributions of economics imperialism are at all valuable, significant, or, relevant. Some political scientists criticized the growing body of formal rational choice theory literature and labeled it irrelevant. According to them, this literature does not answer important societal questions, 'real-world problems'. See, for instance, Ian Shapiro's criticism already mentioned above, but also the analysis of the influential international scholar Stephen Walt: "In this sense, much of the recent formal work in security studies reflects the "cult of irrelevance" that pervades much of contemporary social science. Instead of using their expertise to address important real-world problems, academics often focus on narrow and trivial problems that may impress their colleagues but are of little practical value. If formal theory were to dominate security studies as it has other areas of political science, much of the scholarship in the field would likely be produced by people with impressive technical skills but little or no substantive knowledge of history, politics, or strategy." (Walt 1999:46)

And Walt continues: "Recent formal work in security studies has little to say about contemporary security issues. Formal rational choice theorists have been largely absent from the major international security debates of the past decade (such as the nature of the post-Cold War world; the character, causes, and strength of the democratic peace; the potential contribution of security institutions; the causes of ethnic conflict; the future role of nuclear weapons; or the impact of ideas and culture on strategy and conflict). These debates have been launched and driven primarily by scholars using nonformal methods, and formal theorists have joined in only after the central parameters were established by others. Thus one of the main strengths of the subfield of security studies –namely, its close connection to real-world issues – could be lost if the narrow tendencies of the modeling community took control of its research agenda." (Walt 1999:47)

One reply you could give to Walt's analysis is that policymakers working in international relations might tell what is *irrelevant* or what is *valuable* to them, but this is not necessarily generalizable to other segments of society. This raises some important questions about the relevance or significance of certain research lines and how to decide on which lines to develop. (cf., Kitcher 2001) Are these decisions to be taken by the social scientist herself, or some segment of the social scientific discipline or the community one is working in, or funding organizations, or citizens through some deliberative or representative democratic format?

A second, related aspect is the question of the *availability* of different research lines. One could make a case that the social sciences should be valuable for society at large, and that relevant knowledge for addressing the public's significant problems should be provided. (cf. Van Bouwel *forthcoming*) This obliges one to avoid an economics imperialism approach in substitutive mode or a unified approach in which some epistemic interests are not being addressed and are just unaddressable.

This latter aspect also shone through in some other critiques by political scientists on rational choice imperialism. Robert D. Putnam, for instance, warned us of the danger of *policy research* migrating toward *schools of public administration*, just as happened with practical economic studies that changed the economics department for *business schools*. "If one compares the size of economics

making macro superfluous, possibly by defining as economics only what can be done by microeconomics." (Fine 2019:136-137)

departments and business schools in today's academy, the cost of reducing a social science to sterile theoretical endeavors is obvious." (Quoted on *www.paecon.net*) So, the attempt at explanatory unification under rational choice imperialism risks decreasing the relevance of academic political science for (parts of) the public. One way to ensure that the social scientific disciplines remain relevant is to look into the institutional (social-epistemological) set-up, a division of cognitive labor that addresses a variety of epistemic interests and values, including the public's significant problems.<sup>18</sup>

## 4.4. Institutional dimension: How to ensure that economics imperialism contributes valuable, relevant, and sound knowledge?

Let me again start with some reactions of the political science discipline to rational choice imperialism in the 1990s. The increasing 'colonization' of political science by economists led to so much discontent that an anti-imperialist movement, Mr. Perestroika, was created in 2000.<sup>19</sup> The Perestroikans' main focus was that major journals of the field had been preoccupied with publishing research that conforms to the economics imperialism features. A lot of attention was paid to the institutional factors that favored economics imperialism. One main target was the American Political Science Review which, according to its critics, did not reflect the breadth and diversity of high-quality research done within political science. Kurt Jacobsen wrote: "One might imagine that the American Political Science Association preaches that the best governing system, despite all its faults, is a democratic one, but APSA luminaries obviously display grave doubts as to how far democracy ought to be allowed to go. From inception, the Association never entertained the wildly radical notion of conducting internal elections. What rules is a cozy arrangement whereby a committee chosen by the president nominates its successor members who picks the next governing council who pick the next president, and so on. Disgruntled political scientists link the absence of democracy in the organization to the suffocating disciplinary dominance, especially in the last decade, of formal models and rational choice theory." And, "the APSA of late has been run by rational choice exponents or sympathizers and its flagship journal, the American Political Science Review, reflects their unbending bent." (Jacobsen 2001)

Here the attention goes to the professional associations of the discipline (and how they are organized) as well as the flagship journals (and how they select papers), both institutional dimensions. In a more general way, the critic emphasizes how the increasing weight and dominance of the mainstream limit the space available for alternative approaches. In evaluating imperializing approaches—if we are in favor of keeping the social sciences relevant for the public—we do not want them to impose their theories and methodologies without them following some set of social-epistemic norms to ensure good scientific practice rather than using their institutional weight to exclude other approaches (neither do we want the mainstream to be completely replaced by the current alternative

<sup>&</sup>lt;sup>18</sup> Consider that in social-epistemological debates there is also some form of economics imperialism to be seen, in that ESK (the economics of scientific knowledge) develops alternatives to SSK (the sociology of scientific knowledge), cf., Fernandez Pinto 2016. Fernandez Pinto writes: "The crucial point here is to acknowledge that both ESK's thin conception of the social and its narrow understanding of diversity come (at least in part) from the conceptual and methodological framework imported from economics. For instance, economics' asocial understanding of rationality as utility maximization, simply ignores the ways in which different social and political values might influence positively or negatively the epistemic fruitfulness of scientific practice (...). Moreover, the strong methodological individualism of the economic models used in ESK impedes modeling a variety of nonhomogeneous agents, which in turn limits ESK's understanding of diversity in science." (2016:465)

<sup>&</sup>lt;sup>19</sup> The first steps of the movement were taken with a mass e-mailing by "Mr. Perestroika", as described in The New York Times on Nov. 4, 2000, "THINK TANK; Political Scientists Leading a Revolt, Not Studying One." Schram (2003) discusses the Mr. Perestroika movement in political science extensively, e.g.: "the ways in which contemporary social science all too often fails to produce the kind of knowledge that can meaningfully inform social life." (Schram 2003:836).

approaches). What the exact set of social-epistemic norms should be is not the topic of discussion here, we are just considering possible institutional dimensions of the challenges posed by economics imperialism here.<sup>20</sup> Stipulating a set of social-epistemic norms might help avoid an imperialist imposition of theories and methodologies as well as the substitution of alternative theories in the colonized field, and, on the opposite, contribute to a fair but critical interaction as well as the availability of a plurality of approaches to study the social phenomena concerned. Economics imperialism does not take place in a social vacuum, it affects what goes on in the disciplines being colonized, so these are all elements to be checked along the institutional dimension.<sup>21</sup>

## 5. Philosophers and the multi-dimensional individualism/holism debate in the social sciences.

While the historical milestones reviewed in Section 1 were perhaps announcing a long trench war between methodological individualists and holists, I hope that the subsequent sections made it clear that the debate is a lot richer once you look beyond two warring trenches. Considering the history of the social sciences, I think the best philosophers can do when discussing methodological individualism and holism is to carefully distinguish and spell out the broad variety of positions that can be evaluated along multiple dimensions, *inter alia*, the four dimensions specified in Section 4.

It is kind of surprising that still nowadays very straightforward defenses of methodological individualism are being written with great fervor. As discussed in Section 2, the passion might come from political or ontological convictions rather than the methodological intricacies of social scientific explanation (the kind of methodological individualism that is being defended is often a watered-down version, and it is not always entirely clear what the defenders want to save except for the label). On the other hand, the ones that formulate criticisms of some aspects of methodological individualism, seem to be too quickly put in the bag of methodological holism (e.g., Zahle 2023 labels me, an outspoken methodological pluralist as a methodological holist). The limitations of this thinking in terms of methodological monocultures should be exposed, I think. Therefore, I emphasized the upsides of some historical methodologically individualist projects like the microfoundations project in Section 3, just as much as I pointed out the downsides of an all too monistic approach of some MI-driven economics imperialism applications in Section 4.

The way in which I portrayed the debate is an invitation to give up all-or-nothing answers on philosophical grounds concerning the individualism/holism debate, answers that were often very a-historical and not very well-informed by social scientific practice. In this chapter, I looked for variety and nuance in historical examples, showing the positive contributions as well as the setbacks of particular methodological approaches. Rather than a winner-take-all approach that would favor one particular approach, I suggested shifting toward the development of criteria or dimensions along

<sup>&</sup>lt;sup>20</sup>One possible set could be Helen Longino's (2002:128-134) four norms for effective critical interaction between scientific approaches: (1) there should be venues for criticism (including e.g. journals being open for alternative approaches); (2) uptake of criticism; (3) publicly recognized standards for criticism; and, (4) communities must be characterized by tempered equality of intellectual authority. (cf., Van Bouwel 2008) An alternative approach to Longino's social-epistemic norms is to appeal to the economist's virtues like, e.g., intellectual integrity, cf., Fine: "Nonetheless, there is much to be said both for intellectual integrity –saying how it is as opposed to what is acceptable to the mainstream– and never forgetting that pluralism is a stance of equal voice in very unequal circumstances, given the mainstream's dominance." (Fine 2019:144)

<sup>&</sup>lt;sup>21</sup>Spelling out how each of these dimensions could play out in the different instances of the individualism/holism debate would lead us far beyond my word limit. For those interested in the third and fourth dimension (which traditionally get less attention in the debate), I could refer you to Van Bouwel (2014) for discussion of the axiological dimension and how to address the *relevance* question in the individualism/holism debate. For the institutional dimension and the importance of *availability* of different approaches (be them individualistic or holistic) see Van Bouwel (forthcoming).

which the methodological approaches and their interaction can be assessed –assessments that can be very local and contextual. Hopefully, this might lead us to a further fine-tuning of philosophical positions, stimulate more dialogue and comparison among competing approaches, and perhaps engender a better intellectual division of labor in studying the social world.

Throughout, I emphasized the benefits of taking a pluralist stance, considering the complementarity of methodologies and approaches, keeping an eye on how the social sciences can best address the plurality of epistemic interests that exists among the public(s), and how we might need a wide range of forms of explanations to address those interests in the best way possible, searching for the most adequate explanatory information. Such a methodological pluralism is preferable to a theory-, method- or ontology-driven unification that would imply some (useful) forms of explanation being lost and wanted kinds of explanatory information becoming unavailable to us.

#### References.

Aumann, R. 1985. "What is game theory trying to accomplish?" In: K. Arrow and S. Honkapohja (eds.) *Frontiers of Economics.* Oxford: Basil Blackwell.

Becker, G. 1976. *The Economic Approach to Human Behavior*. Chicago, IL: University of Chicago Press.

Becker, G. 1981. A Treatise on the Family. Cambridge, MA: Harvard University Press.

Becker, G. 1992. "The Economic Way of Looking at Life" *Nobel Lecture*, December 9, 1992. Available here: https://www.nobelprize.org/uploads/2018/06/becker-lecture.pdf

Chang, H. 2012. Is Water H2o? Evidence, Realism and Pluralism. London: Springer.

Coleman, J. 1986. "Social Theory, Social Research, and a Theory of Action." *American Journal of Sociology* 91(6):1309-1335.

Demeulenaere, P. (ed.) 2011. *Analytical Sociology and Social Mechanisms*. Cambridge: Cambridge University Press.

Durkheim, E. [1895] 1982. The Rules of Sociological Method. Basingstoke: Macmillan.

Elster, J. 1983. *Explaining Technical Change. A Case Study in the Philosophy of Science*. Cambridge: Cambridge University Press.

Elster, J. 1985. Making Sense of Marx. Cambridge: Cambridge University Press.

Elster, J. 1989. Nuts and Bolts for the Social Sciences. Cambridge: Cambridge University Press.

Epstein, B. 2015. *The Ant Trap. Rebuilding the Foundations of the Social Sciences.* New York: Oxford University Press.

Fine, B. 2019. "Economics and Interdisciplinarity: One Step Forward, N Steps Back?" *Revista Crítica de Ciências Sociais* 119: 131-148.

Goldstein, L. 1956. "The inadequacy of the principle of methodological individualism." *Journal of Philosophy* 53(25):801-813.

Green, D. and I. Shapiro. 1994. *Pathologies of Rational Choice Theory*. New Haven, CT: Yale University Press.

Hedström, P. and R. Swedberg. 1996. "Social mechanisms." Acta Sociologica 39(3):281–308.

Hedström, P. and R. Swedberg (eds.) 1998. *Social mechanisms. An analytical approach to social theory*. Cambridge: Cambridge University Press.

Hempel, C. and P. Oppenheim. 1948. "Studies in the Logic of Explanation." *Philosophy of Science* 15: 135-175.

Hirshleifer, Jack. 1985. "The expanding domain of economics." *American Economic Review* Special Issue 75:53-68.

Jacobsen, K. 2001. "Revolt in Political Science." Post-autistic economics newsletter 6, article 6.

Jäger, A., and D. Zamora-Vargas. 2023. *Welfare for Markets. A Global History of Basic Income*. Chicago, IL: University of Chicago Press.

Jarvie, I. 2011. "Introduction: Philosophical Problems in the Social Sciences: Paradigms, Methodology and Ontology." In: I. Jarvie and J. Zamora-Bonilla (eds.) *The SAGE Handbook of the Philosophy of Social Sciences*. Thousand Oaks, CA: Sage, pp.1-36.

Kellert, S., H. Longino, and K. Waters (eds.) 2006. *Scientific Pluralism.* Minneapolis: University of Minnesota Press.

Kincaid, H. 2015. "Open Empirical and Methodological Issues in the Individualism-Holism Debate." *Philosophy of Science* 82: 1127-1138.

Kitcher, P. 2001. Science, Truth, and Democracy. New York: Oxford University Press.

Kymlicka, W. 2001. Contemporary Political Philosophy (2<sup>nd</sup> ed). New York: Oxford University Press.

Lazear, E. 2000. "Economic imperialism." Quarterly Journal of Economics 115:99-146.

Little, D. 1994. "Microfoundations of Marxism." In: M. Martin, & L. McIntyre (Eds.), *Readings in the philosophy of social science*. Cambridge, MA: MIT Press, pp. 479-496.

Little, D. 2012. "Explanatory autonomy and Coleman's boat." *THEORIA. An International Journal for Theory, History and Foundations of Science* 27(2): 137–151.

Little, D. 2013. "Microfoundationalism." In: B. Kaldis (ed.) *Encyclopedia of philosophy and the social sciences*. Thousand Oaks: Sage, pp. 605–606.

Little, D. 2014. "Actor-Centered Sociology and the New Pragmatism." In: J. Zahle and F. Collin (eds.) *Rethinking the Individualism-Holism Debate*. Springer, pp. 55-75.

Longino, H. 2002. The Fate of Knowledge. Princeton: Princeton University Press.

Lucas, R. 2003. "Macroeconomic Priorities." American Economic Review 93(1):1-14.

Machamer, P., L. Darden and C. Craver. 2000. "Thinking about mechanisms." *Philosophy of Science* 67(1): 1–25.

Mäki, U. 2002. "Explanatory ecumenism and economics imperialism." *Economics and Philosophy* 18 (2):237-59.

Mäki, U. 2009. "Economics imperialism: Concept and constraints." *Philosophy of the Social Sciences* 39 (3):351-80.

Mäki, U. 2020. "Notes on economics imperialism and norms of scientific inquiry." *Revue de Philosophie économique* 21(1):95-127.

Mandel, E. 1989. "How to Make No Sense of Marx." *Canadian Journal of Philosophy* Supplementary Volume 15:105-132.

Menger, C. [1871] 1976. Principles of Economics. New York: New York University Press.

Menger, C. [1883] 1963. *Problems of Economics and Sociology*. Champaign, IL: University of Illinois Press.

Nettle, D., W. Frankenhuis, and K. Panchanathan. 2023. "Biology, Society, or Choice: How Do Non-Experts Interpret Explanations of Behaviour?" *Open Mind: Discoveries in Cognitive Science* 7:625-651.

O'Neill, J. (ed.) 1973. Modes of Individualism and Collectivism. London: Heinemann.

Oppenheim, P. and H. Putnam. 1958. "The Unity of Science as a Working Hypothesis." In: H. Feigl, G. Maxwell, and M. Scriven (eds.) *Minnesota Studies in the Philosophy of Science* Volume 2, Minneapolis: Minnesota University Press, pp. 3-36.

Fernandez Pinto, M. 2016. "Economics Imperialism in Social Epistemology: A Critical Assessment." *Philosophy of the Social Sciences* 46(5):443–472.

Potochnik, A. and B. McGill. 2012. "The Limitations of Hierarchical Organization." *Philosophy of Science* 79(1):120-140.

Roth, G. 1976. "History and Sociology in the Work of Max Weber." *British Journal of Sociology* 27(3): 306-318.

Schram, S. 2003. "Return to Politics. Perestroika and Postparadigmatic Political Science." *Political Theory* 31(6): 835-851.

Schumpeter, J. [1908] 1998. *Das Wesen und der Hauptinhalt der theoretischen Nationalökonomie*, 3. Aufl. Berlin: Duncker & Humblot.

Shapiro, I. 2002. "Problems, Methods, and Theories in the Study of Politics, or What's Wrong with Political Science and What to Do about It." *Political Theory* 30(4): 596-619

Swedberg, R. 1990. *Economics and sociology. Redefining their boundaries: Conversations with economists and sociologists*. Princeton, NJ: Princeton University Press.

Udehn, L. 2002. "The Changing Face of Methodological Individualism." *Annual Review of Sociology* 28:479-507.

Van Bouwel, J. 2003. "When unveiling the epistemic fallacy ends with committing the ontological fallacy. On the contribution of Critical Realism to the social scientific explanatory practice." *Philosophica* 71:81-98.

Van Bouwel, J. 2004. "Imperialistische tendensen in de economiebeoefening en politieke wetenschappen. Over heterodoxie en pluralisme in de sociale wetenschappen." *Ethiek & Maatschappij* 7(1):32-45.

Van Bouwel, J. 2006. "The idea of social mechanisms in social scientific explanations." In: J. Arlsdale (ed.) *Advances in Social Psychology Research*. NY: Nova Science Publishers, pp. 83-95.

Van Bouwel, J. 2008. "Ways of dealing with scientific plurality: Inquiring Helen Longino's epistemic democracy." Paper presented at the 6<sup>th</sup> International Network for Economic Method Conference in Madrid, Spain.

Van Bouwel, J. 2014. "Explanatory Strategies beyond the Individualism/Holism Debate." In: J. Zahle and F. Collin (eds.) *Rethinking the Individualism-Holism Debate*. Springer, pp. 153-175.

Van Bouwel, J. 2019. "Do mechanism-based social explanations make a case for methodological individualism?" *Journal for General Philosophy of Science* 50(2):263-282.

Van Bouwel, J. *Forthcoming.* "Democratizing Explanatory Practice in the Social Sciences (with John Dewey)." In: R. Gronda, M. Janack and G. Marchetti (eds.) *Pragmatism and Philosophy of Science: Historical and Contemporary Perspectives.* London: Routledge.

Walt, S. 1999. "Rigor or Rigor Mortis? Rational Choice and Security Studies." *International Security* 23(4):5-48.

Watkins, J. 1952a. "Ideal types and historical explanation." *British Journal for the Philosophy of Science* 3:22–43.

Watkins, J. 1952b. "The principle of methodological individualism." *British Journal for the Philosophy of Science* 3:186-189.

Wren-Lewis, S. 2007. "Are there dangers in the microfoundations consensus?" In: P. Arestis (Ed.), *Is there a new consensus in macroeconomics?* Basingstoke: Palgrave Macmillan, pp. 43-60.

Ylikoski, P. 2012. "Micro, macro, and mechanism." In: H. Kincaid (ed.) *The Oxford Handbook of Philosophy of Social Science*. Oxford: Oxford University Press, pp. 21-45.

Zahle, J. 2023. "Methodological Holism in the Social Sciences." Stanford Encyclopedia in Philosophy.