

Uneasiness and Scarcity: An Analytic Approach Towards Ludwig von Mises's Praxeology

Michael Oliva Córdoba¹ 

Received: 26 April 2017 / Accepted: 19 July 2017 / Published online: 25 July 2017
© Springer Science+Business Media B.V. 2017

Abstract Adam Smith said that ‘the propensity to truck, barter and exchange one thing for another is common to all men, and to be found in no other race of animals.’ Smith addressed the mark of the man economical, and there is no denying that this is the peculiar way *he acts*: clearly, to truck, barter and exchange is *to act* in a certain way. Austrian economics adopts this way of looking at the realm of economics. It prides itself as a theory of human action. This claim seems ill-founded as long as so important a contribution as Ludwig von Mises’s praxeology remains insufficiently understood. In this paper, I address Barry Smith’s charge that in praxeology ‘other core notions, in addition to the concept of action, have been smuggled into and the theory is therefore not purely analytic’. I offer logical proofs of two cornerstone theorems of praxeology, the *uneasiness theorem* and the *scarcity theorem*, and thus provide vindication. Also, the findings support Mises’s controversial claim that economics is a priori founded in action theory. Thus, Carl Menger’s dream to lay foundations to economics and the other social sciences may have come true in the guise of praxeology.

Keywords Menger · Mises · Adam Smith · Barry Smith · Action theory · Praxeology · Austrian thought · Austrian economics

1 Introduction

Adam Smith is credited with pointing out that ‘the propensity to truck, barter and exchange one thing for another [...] is common to all men, and to be found in no other race of animals[.]’ (Smith 1776: I, 2) What Smith was after was the mark of

✉ Michael Oliva Córdoba
michael.oliva-cordoba@uni-hamburg.de

¹ Department of Philosophy, University of Hamburg, Von-Melle-Park 6, 20146 Hamburg, Germany

the man economical, that being darkly wise and rudely great later writers travestied and named *homo oeconomicus*. If we look back at Smith's original specimen, however, there is no denying that what marks the economic man is the peculiar way *he acts*: Clearly, to truck, barter and exchange one thing for another is to *act* in a certain and characteristic way. It is a saddening fact that the nowadays dominating strands of economic theory have departed from that basic insight and shifted their focus towards more peripheral features of exchange, i.e. the market (place) conceived of as an artificial abstract mechanism in an ideal 'equilibrium'. In contradistinction, Austrian economics distinguishes itself by truly being 'a theory of human action' (Vanberg 2008: 5). As human action is obviously also of utmost importance to philosophy, it comes as no surprise that Austrian economics is as close to philosophy as any economic theory can get. Within Austrian economics, no closer connection between philosophy and economic theory can be thought of as that present in the work of *Ludwig von Mises*. He was particularly true to *Carl Menger's* aim (Menger 1871, VI) to lay foundation 'not only to economics but also to [...] the social sciences in general [...]' (Smith 1994: 299).

In that vein, Mises worked out his *praxeology*, his fundamental, aprioristic theory of human action, upon which economics and all other social sciences are taken to rest. Unfortunately, to this day praxeology has neither been fully understood nor has it received the attention it deserves. One part of the problem is that Mises' investigation (cf. von Mises 1927, 1933, 1940) simply antedated the emergence of the well-established philosophical discipline now known as *action theory* (cf. Anscombe 1957; Davidson 1963; von Wright 1971) so that Mises coined an idiosyncratic term of his own choosing for what only later came to be seen as a worthwhile field of study. Also, since Mises developed his praxeology in an economic context, his efforts went virtually unnoticed when the first action theorists explored their field.

Another part of the problem is a still widespread dogma in favour of empiricism in the social sciences that squares with any sort of apriorism, especially the sort Mises proposed. As *Peter Boetke* puts it, economists tended to dismiss praxeology shamefully as 'the product of the prepositive Neanderthal age' (Boetke 1998: 534)—precisely out of positivist sympathies. Positivism, though, has come into doubt itself. The positivist creed is increasingly recognized as (to borrow a phrase from Quine) 'an unempirical dogma of empiricists, a metaphysical article of faith' (Quine 1953: 37). Thus the real challenge for Mises seems to come from a different, more philosophical direction.

Barry Smith (1986, 1990, 1994) has repeatedly argued that Mises's insistence that the propositions of praxeology be analytic committed him to the claim that 'the whole of praxeology can be erected on the basis of premises involving at most one single non-logical concept [...] the concept *human action*' (Smith 1990: 3). Consequently, Smith raised the suspicion that 'other core notions, in addition to the concept of action, have been smuggled into his theory on the way, and that the theory is therefore not purely analytic' (Smith 1986: 18). One of these notions, Smith argues, is the old and venerable notion of *uneasiness*.

Here, I shall address Smith's concern by inquiring into the logical and methodological status of the *uneasiness theorem*. The theorem is by no means new

and was stated as early as in John Locke's early modern *Essay concerning Human Understanding*. In Mises's *Human Action* it serves as cornerstone to his praxeology. There we read: '[T]he incentive to act is always uneasiness' (von Mises 1949: 13). I shall prove the theorem to be an analytical truth, i. e. true in virtue of meaning (hence a priori) and, moreover, show that the *scarcity theorem* can be derived from it using only logical and conceptual means. The *scarcity theorem* links the foundations of economic theory with action theory and reads very simple: '[A]ction is the manifestation of scarcity' (von Mises 1949: 70). With that second demonstration a case is made for the soundness of Mises's aprioristic programme of founding economic theory in action theory and, ultimately, for the Mengerian dream of laying ground for the social sciences in general.

Let me close these introductory remarks by pointing out an important respect in which Smith's suspicion must not be misunderstood: It does not require, nor should it, that the concept of action be a *simple* or *unanalysable* concept. This is because the concept of action is *not* a basic concept—in action theory it is typically analysed by notions like those of *doing*, *believing* and, most importantly, *wanting*. Hence the real concern we should have is whether Mises's programme is dependent upon notions *not already conceptually included* as analytical ingredients of the notion of action. Only such notions would have to be regarded as being 'smuggled in'. In the following analytical reconstruction of Mises's methodological apriorism it is shown that no 'smuggling' is required: Barry Smith's concern can be accounted for.

2 Partial Explications and Logical Proof

Since there are frequent misconceptions out there, especially among practitioners in the natural and social sciences, let me state this very clearly: There is no stronger evidence in science than a logical proof. All scientific reasoning either aims at or assimilates to logical deduction. At the same time, only little consideration is needed to see that being the conclusion of a logical proof does not imply being trivial. Unfortunately, for want of space I must leave any further discussion of this topic for another occasion. What I do want to point out, however, is that by giving logical proofs of the uneasiness theorem and the scarcity theorem two things will be achieved: First, it will be shown that praxeological reasoning, when it is being done right, is not an idiosyncratic pastime but a sober, serious, sensible and sound scientific enterprise. Secondly, it will be shown that praxeological reasoning is not a Glass Bead Game that need not matter the economist but gives you—not unlike Ricardo's theory of comparative advantage—an analytical centrepiece to all economic reasoning which no economist can afford to leave out. Establishing these two points, I hope, will thus result in understanding praxeology better and paying more attention to action theory in economics and the other social sciences. As we have seen, that would be a very Austrian thing to show.

So, according to Mises, the incentive to act is always uneasiness and action is always the manifestation of scarcity. How, then, can the first proposition be shown to be analytical and the second be derived from the first? We must first turn to the core notions involved, i.e. the concept of *uneasiness* and the concept of *action*.

Here, it is not necessary to give full analysis of these vexing notions. Rather, a *partial explication* of these notions will do. As long as only necessary conceptual ingredients are made use of and they suffice for establishing the claims made, everything is quite well. In the interest of brevity, then, this is how I shall proceed.

2.1 Uneasiness

The first notion to address is the notion of uneasiness. It will help to envisage an admittedly counter-factual situation where a subject completely *lacks* uneasiness: whatever springs to the subject's mind, not the slightest worry comes up. He is completely and in every respect free from uneasiness, perfectly *un-uneasy* or, in more convenient words, completely *satisfied*. Like Locke we may ask 'When a man is perfectly without any uneasiness—what [...] will is there left [...]' (Locke 1694: 34)? In other words: Is it really conceivable that a subject be both in a state of perfect satisfaction and that there still be something such that the subject wants it? The answer is hard to avoid: no. So let us pause to note what amounts to a necessary condition for the lack of uneasiness. For convenience of exposition I shall rephrase this in terms of the opposite, dependent notion:

(Satisfaction)

1	(I)	$(x) (x \text{ is satisfied})$	\rightarrow	$\neg(\exists p) (x \text{ wants that } p)$	$\mathbf{A} \text{ [expl.]}$
---	-----	--------------------------------	---------------	---	------------------------------

As it happens, we have already embarked in the enterprise of proving that the uneasiness theorem is analytic, and this, then, is the first line of the proof. Technically speaking, it is an assumption resting on a partial conceptual explication of the notion of uneasiness. Of course, much more could be said about that concept and, yes, theorists did say a lot more from at least Plato onwards. In our case, however, less is more: only the necessary condition laid out in (1) will do duty in the present proof.

2.2 Action

The second notion to turn to is the notion of action. As was already emphasised, the notion of action is to be taken as comprising the notions of doing, believing and wanting, but now let us pause for a quick digression into action theory and look at how it comprises them. Let us ask ourselves for example: *Why did Socrates drink the Hemlock?* Well, Socrates drank the hemlock, we might say, because he wanted to abide by the principles he held dearest and believed that drinking the hemlock was required in order to do so. Of course, we also might give a different answer; but there is a purely general point to be noted here. It is the fact that whoever subscribes to an answer of this general kind thereby portrays Socrates as an *agent*. The general feature responsible for this is describing somebody as *doing* something because he *wanted* something and *believed* something. That is precisely what acting *is*: doing x because wanting that p and believing that q (for some adequate x , p , and q).

Opinions vary on what exactly it means to do something or to want something or to believe something. Still the general format of the modern explanation of action is as described. It is characterised on the one hand by some sort of adaptation of the two-pronged model of *motivation* present in David Hume’s theory (Hume 1739), where action is triggered in some way by a pair of different mental states the agent finds himself in (the state of *believing* something and the state of *wanting* something); and on the other hand by some sort of adaptation, however critical, of a causal model of action, typically originating in Davidson’s work (Davidson 1963), where the relation between the (hybrid) motivational component and the doing is thought of as being that of *cause* and *effect*. There is no need, however, to analyse the Hemlock example in greater detail or to dig ourselves deeper into action theory since we have all we need in order to note at least some necessary conditions of acting:

(Action)

2	(2)	$(x) (x \text{ acts})$	\rightarrow	$(\exists p) (1. x \text{ does something \&}$ $2. x \text{ believes something \&}$ $3. x \text{ wants that } p)$	$\mathbf{A} [expl.]$
---	-----	------------------------	---------------	--	----------------------

This gives us the second line of the proof under way: another assumption, this time resting on a partial conceptual explication of the notion of *action*.

Again, we might have gone more into detail and might have discussed what is involved by conditions 1 and 2. For example, in condition 1 we obviously would have had to introduce another quantifier and state more precisely that, for at least one φ , $x \varphi$ -s; and in condition 2 it would have had to be spelled out roughly that x believes that his φ -ing is sufficient for bringing it about that p . What will be made use of, though, is nothing but the third condition. So, as before, we are well-advised to be only as specific as required for demonstration.

2.3 Proof

Given these conceptual ingredients all but one thing is set in order to proceed. We must state the uneasiness theorem so that it can be aligned with the premises stated above. Remember that the theorem was taken to state that there cannot be action without uneasiness. This amounts to claiming that uneasiness is a necessary condition of acting. Again, for convenience of demonstration we can render this in terms of talk about satisfaction, which gives us the following formulation of the uneasiness theorem (UT):

(UT) $(x) (x \text{ is satisfied} \rightarrow \neg x \text{ acts})$

The central question now is this: Can we derive (UT) logically from the conceptual premises (1) and (2)? This is how it can be done using standard textbook logical rules only:

First, transform the universal propositions (1) and (2) into quasi-singular propositions by applying the rule of universal quantifier elimination (UE). This gives us (3) and (4):

1	(3)	a is satisfied	\rightarrow	$\neg(\exists p)$ (a wants that p)	1, UE
2	(4)	a acts	\rightarrow	$(\exists p)$ ($I.a$ does something & 2. a believes something & 3. a wants that p)	2, UE

Second, apply conjunction–elimination (&E) to derive:

2	(5)	a acts	\rightarrow	$(\exists p)$ (a wants that p)	4, &E
---	-----	----------	---------------	--------------------------------------	-------

Next, see that the consequent of (3) is the negation of the consequent of (5). This makes it clear that once we apply the principle of transposition (TP) to (5), the principle of transitivity of implication (TI) applies. Thus we have:

2	(6)	$\neg(\exists p)$ (a wants that p)	\rightarrow	$\neg a$ acts	5, TP
1,2	(7)	a is satisfied	\rightarrow	$\neg a$ acts	3, 6, TI

One final move is needed to complete the proof. To establish full generality, the rule of universal quantifier introduction (UI) must be applied to (7):

1,2	(8)	(x) (x is satisfied	\rightarrow	$\neg x$ acts) <i>q.e.d</i>	7, UI
-----	-----	--------------------------	---------------	-----------------------------	-------

What is derived in (8) is strictly identical with the theorem stated above as (UT). Hence a proof has been given that the uneasiness theorem can be derived logically from (1) and (2).

3 Further Application

Before discussing some implications of the proof let us further things a bit more. What about scarcity? This surely is quite an important, even defining concept in the theory of economics (cf. Robbins 1932: 16). Even if they shied away from praxeological notions (like uneasiness) economists could not possibly dismiss the notion of scarcity as remote, empty or unempirical. Yet there is an important praxeological link—the scarcity theorem can be derived from the uneasiness theorem with logical and conceptual means only.

To begin with, choose any good of your liking, say, gold. Whatever amount is referred to, assuming that there is that very amount of gold does not allow for the inference that gold is scarce. What does this tell us? It illustrates is that scarcity is not ‘out there in the world’: it is brought into it by beings endowed with the capacity of conscious experience of themselves and the world. If such beings did not exist scarcity would not exist. But there is more: a world with both goods *and* conscious beings, but where the latter did not at all care for the former, would leave no room for scarcity either. **So it seems that scarcity is brought about by what such beings want.** The least that it shows, however, is that scarcity is implicitly *relational*. Just like your being married implies that there is someone to whom you are married, a

good’s being scarce implies that there is someone *for whom* it is scarce. Let us use these findings to rephrase the theorem that action is the manifestation of scarcity in a fashion similar to the reasoning employed above. What we get is the following formulation of the scarcity theorem (ST):

$$(ST) \quad (x) (\neg(\exists y) (y \text{ is scarce for } x) \rightarrow \neg x \text{ acts})$$

Next, try to conceive of a situation where the antecedent of the embedded conditional holds. Nothing at all is scarce for x . We surely cannot fail to note that this is the very same thought experiment we already alluded to before: this just *is* the situation in which to x there is nothing left to ask for—a situation in which he completely lacks uneasiness. So it allows for the following partial explication:

9	(9)	$(x) (\neg(\exists y) (y \text{ is scarce for } x) \rightarrow$	\rightarrow	$x \text{ is satisfied})$	A [expl.]
---	-----	---	---------------	---------------------------	-----------

Given this conceptual explication, can we derive (ST) logically from (9) and (8)? Yes, but in the interest of time I shall not discuss the proof in detail:

9	(10)	$\neg(\exists y) (y \text{ is scarce for } a)$	\rightarrow	$a \text{ is satisfied}$	9, UE
11	(11)	$\neg(\exists y) (y \text{ is scarce for } a)$			A
9, 11	(12)	$a \text{ is satisfied}$			11, 10 \rightarrow E
1, 2, 9, 11	(13)	$\neg a \text{ acts}$			12, 7 \rightarrow E
1, 2, 9	(14)	$\neg(\exists y) (y \text{ is scarce for } a)$	\rightarrow	$\neg a \text{ acts}$	11, 13 \rightarrow I
1, 2, 9	(15)	$(x) (\neg(\exists y) ((y \text{ is scarce for } x) \rightarrow$	\rightarrow	$\neg x \text{ acts}) \text{ q.e.d.}$	14 UI

This completes our second proof: What is derived in (15) is strictly identical with the theorem stated above as (ST). Hence the scarcity theorem can be derived from the uneasiness theorem with logical and conceptual means only.

4 Conclusion

Let us take stock. In the course of the derivation we made use of three partial conceptual explications. They concerned the notions of uneasiness, action and scarcity. The central non-logical concept involved was the concept of *wanting*. It was seen that it was not merely added to the concept of action but that it is analytically comprised in it. So, ultimately, the worry that non-logical concepts other than the notion of action might have been ‘smuggled’ into Mises’s theory was not confirmed and Mises may be acquitted of all charges.

Moreover, if, as seems plausible, what accounts for the truth of the conceptual explications in (1), (2) and (9) is nothing over and above a proper grasp of the concepts involved, the findings demonstrate that the foundations of praxeology are truly and purely *analytic*. After all, in finding our proofs we came only on general logical laws and on conceptual clarifications. So, according to *Gottlob Frege*, famous philosopher, logician, and mathematician, each of our theorems is to be counted as ‘an analytic [truth]’ (Frege 1884: 6).

By the same token, since it is conceded on all sides that being analytic is sufficient for being a priori, it was demonstrated that at least one version of Mises's methodological apriorism is correct: *Analytic praxeology*. It may well be that Mises himself, perhaps under the spell of his followers, came to subscribe to a different version of methodological apriorism (cf. von Mises 1962), but that is a matter for another occasion.

In any case, reflecting on the way the scarcity theorem was derived we are led to conclude that the claim so disturbing to Mises's fellow economists, the claim that economics is founded in action theory, is far from being unwarranted. The programme of tracing insights of economic theory back to action theory appears viable and justified, even if so far we have but made a few (yet important) steps on the road taken. So, at last, Menger's dream to lay foundations to social sciences in general seems to have a chance of coming true in the guise of Misesian praxeology.

Having got this far, however, I think I should perhaps alter my overall claim. Addressing Smith's original worry *in full* would have required not only to prove that the uneasiness theorem is analytic and the scarcity theorem follows from it, but that there are no other notions in Mises's praxeology that make a case for Smith's concern. Obviously, I did not show this. So, more work is coming up along the road taken. Still I hope the prospects of reconstructing Mises's methodological apriorism, especially in an analytic fashion, do now appear considerably higher than some theorists previously tended to think.¹ I even fancy the idea that they are rising.

References

- Anscombe E (1957/1963) *Intention*, 2nd edn. Harvard University Press, Cambridge
- Blaug M (1992) *The methodology of economics, or how economists explain*, 2nd edn. Cambridge University Press, Cambridge
- Boettke P (1998) Ludwig von Mises. In: Hands DJ, Mäki U (eds) *The handbook of economic methodology*. Edward Elgar, Cheltenham, pp 534–540
- Davidson D (ed) (1963/1980) *Actions, reasons, and causes*. In: *Essays on actions and events*. Oxford University Press, Oxford, pp 3–19
- Gottlob F (1884) *The foundations of arithmetic*. Harper & Brothers, New York
- Hume D (1739/1978) *A treatise of human nature*. In: Selby-Bigge LA, Nidditch PH (eds) 2nd edn. Clarendon Press, Oxford
- Locke J (1694/1975) *An essay concerning human understanding*. In: Nidditch PH (ed). Oxford University Press, Oxford
- Menger C (1871) *Grundsätze der Volkswirtschaftslehre*. Wilhelm Braumüller, Vienna
- Quine WVO (1953) *From a logical point of view*. Harvard University Press, Cambridge
- Robbins L (1932/1935) *An essay on the nature and significance of economic science*, 2nd edn. Macmillan & Co., London
- Smith A (1776) *An inquiry into the nature and causes of the wealth of nations*. Methuen, London
- Smith B (1986) Austrian economics and Austrian philosophy. In: Grassl W, Smith B (eds) *Austrian economics*. Croom Helm, London, pp 1–36
- Smith B (1990) The question of apriorism. *Aust Econ Newslett* (Fall 1990) 12(1):1–5
- Smith B (1994) *Austrian philosophy*. Open Court, Chicago

¹ In particular, since no support is found for claims that Mises's theory was ideologically contaminated or 'idiosyncratic and dogmatically stated' like, e.g., Blaug (1992: 81) has it.

- Vanberg VJ (2008) Schumpeter and Mises as 'Austrian economists'. *Freiburg Discuss Pap Const Econ* 8(2):1–17
- von Mises L (1927) *Liberalismus*. Gustav Fischer, Jena
- von Mises L (1933) *Grundprobleme der Nationalökonomie*. Gustav Fischer, Jena
- von Mises L (1940) *Nationalökonomie*. Editions Union Genf, Geneva
- von Mises L (1949) *Human action*, 4th edn. Fox & Wilkes, San Francisco
- von Mises L (1962) *The ultimate foundation of economic science*. Van Nostrand, Princeton
- von Wright GH (1971) *Explanation and understanding*. Routledge & Kegan Paul, London