

# Reply to Benetti and Cartelier Ghislain Deleplace

# ▶ To cite this version:

Ghislain Deleplace. Reply to Benetti and Cartelier. Ajit Sinha. A Reflection on Sraffa's Revolution in Economic Theory, Palgrave Macmillan, pp.524-536, 2021, Palgrave Studies in the History of Economic Thought, 978-3-030-47205-4. hal-04257020

# HAL Id: hal-04257020 https://hal.science/hal-04257020

Submitted on 24 Oct 2023

**HAL** is a multi-disciplinary open access archive for the deposit and dissemination of scientific research documents, whether they are published or not. The documents may come from teaching and research institutions in France or abroad, or from public or private research centers. L'archive ouverte pluridisciplinaire **HAL**, est destinée au dépôt et à la diffusion de documents scientifiques de niveau recherche, publiés ou non, émanant des établissements d'enseignement et de recherche français ou étrangers, des laboratoires publics ou privés.

### **REPLY TO BENETTI AND CARTELIER**

#### 1. The compatibility between Sraffa's system of prices and Ricardo's theory of money

The common issue under discussion in my chapter, in Benetti and Cartelier's comments on it, and in the present reply, is the compatibility between Sraffa's system of prices and Ricardo's theory of money. Is consequently left aside what is pertaining to Sraffa's own monetary views before Production of Commodities by Means of Commodities - tackled in Section 3 of the chapter – and to Ricardo's monetary views not directly linked to his theory of prices – such as the detail of his stipulations about the best monetary system. This discussion, however, cannot be freed from two other references by the same participants, which have a distinct object in their own right. One is my book Ricardo on Money. A Reappraisal: although it claims that it may contribute to the integration of money in the modern (Sraffa's) theory of Classical prices (Deleplace 2017: 384-6), it pursues another goal, which is to provide a coherent reconstruction of Ricardo's theory of money. The second reference is a recent paper by Benetti and Cartelier entitled "From Ricardo to Sraffa: Gold as Monetary Standard in a Classical Theory of Money": the authors explicitly warn that "to establish 'what Ricardo has really said' is not our topic. We have preferred to inquire into what could or should be a Classical theory of money and prices sixty years after Sraffa's Production of Commodities by Means of Commodities publication." (Benetti and Cartelier 2020: 241). One difficulty of the discussion is that some of the arguments exchanged cannot be fully understood without referring to these two other publications.

An interesting aspect of these two references is that they both offer a more or less detailed formalization. This should help locating precisely on which points there is a disagreement between studies which have in common to praise Sraffa's contribution to the Classical theory of prices and to reject the usual understanding of Ricardo's monetary theory in terms of the Quantity Theory of Money. The model of Ricardo's theory of money developed in Deleplace (2017) leads to three main results:<sup>1</sup> a) The value of money varies positively with the natural price of the standard and negatively with its market price (what I call "the Money-Standard Equation"); b) The standard (e.g. gold) is necessarily exterior to the system of production that determines the natural prices of the commodities in the economy where the standard-based currency circulates; and c) When the quantity of money is in excess of what is required by "the wants of commerce", it is endogenously adjusted through a contraction of the note issue that is forced by the unfortunate consequences for the issuing bank of the rise in the market price of the standard (what I call "the Penelope effect").

<sup>1</sup> These results support the two main conclusions of the book for the history of economic thought: the existence of an evolution in Ricardo's monetary theory from his initial views (at the time of the *Bullion Report*) to his mature views (in relation to his genuine theory of value and distribution developed in *Principles*), and the rejection of the usual understanding of this theory as an incoherent mix of a quantity-theory of money in the short run and a commodity-theory of money in the long run.

In their comments, Benetti and Cartelier target result b): "GD's requirement that gold be produced outside the economy (i) is not well-founded since there is in fact no contradiction between gold legal price (in £) and gold natural price (in a single or composite commodity) when gold is domestically produced; and (ii) is not appropriate for an integration, intended by GD, of Sraffa's natural prices in Ricardo's monetary theory." (p. 3) They also target result c): "As rightly stated by GD, our position 'contradicts' the 'Penelope effect' he qualifies as 'an important argument."" (*ibid*) Benetti and Cartelier's assumption that under convertibility the market price of gold cannot diverge from the legal price also amounts to rejecting result a) since the value of money does not vary with a market price of the standard that they assume to be fixed. This assumption of a fixed market price of gold is central in the alternative Classical model of a standard-based money in a Sraffian system of prices which they propose in Benetti and Cartelier (2020).

In the same order as they appear in Benetti and Cartelier's comments, I will discuss below their critiques of my results c) and b), before emphasising that their fixity assumption is inappropriate in Ricardo's theory of money, hence in any attempt at making it compatible with Sraffa's system of prices. But before that, a caveat may help the reader. In accordance with their commitment in their 2019 paper to leave aside "what Ricardo has really said", Benetti and Cartelier do not suggest that my reconstruction of Ricardo's theory of money might be unfaithful. Consequently, the critiques they raise at me should be considered as applying to Ricardo himself. Besides, my object has been to reconstruct Ricardo's theory of money in a way that makes it: 1) consistent with the whole of Ricardo's writings on money; 2) internally coherent; and c) compatible with Sraffa's system of prices. It has *not* been to contend that this reconstruction is the only (and even the best) way to analyse a monetary economy – an assertion which would be beyond the point.

# 2. The divergence of the market price of the standard from its legal price

Two questions may be asked about this divergence: can it exist, and if yes, what happens to it? I have shown elsewhere (see Deleplace 2020) that, even if they may disagree on the answer to the second question, the (minority) unorthodox scholars on Ricardo's theory of money all answer to the first question in the positive and consider this divergence as a central aspect of Ricardo's theory.<sup>2</sup> It should be noted that for these scholars it is so whether Ricardo dealt with a monetary system exclusively composed of inconvertible notes (as testified by the title of his famous first monetary pamphlet *The High Price of Bullion, A Proof of the Depreciation of Bank Notes*) or a system containing (partly or exclusively) convertible notes. By contrast, Benetti and Cartelier boldly assert that "the real distinctive feature of the gold standard is its legal price in terms of £, the consequence of which is that, in a closed economy, the market price of gold cannot diverge from the legal price" (p. 1), and this confirms what they claim in the opening lines of their comments: they accept to bear "the cost" of not being "faithful to Ricardo".

<sup>2</sup> Contrary to the (majority) orthodox scholars who consider that the market price of gold is only in Ricardo a proxy of the general price level, in the absence of a solution to the index-number problems. In such an interpretation, the divergence between the market price of gold and its legal price is obviously deprived of any significance.

#### 2.1. Can there be a divergence?

In response to this question, the statement that, in a closed economy (the one, according to Benetti and Cartelier, for which theoretical propositions ought to be demonstrated), the market price of gold is fixed (provided its legal price remains itself fixed) may come as a surprise since in their numerous writings they have (rightly) advocated for long that a theory of prices should not be restricted to equilibrium but account for disequilibrium situations. They maintained in these writings that in a decentralised economy the equilibrium situation cannot be known *ex ante* by the individual agents, so that a theory of price adjustment is required, which should not violate the decentralised ("market") character of the economy. In accordance to this *motto*, they now claim that, to analyse a monetary economy, the non-uniform adjustment of all prices in response to a change in the quantity of money should be made explicit. *All except one*: the price of gold, which is supposed to be unaffected by such a change.

The reason for this exception is for Benetti and Cartelier crystal-clear: being the standard of money, gold has a legal price, contrary to all other commodities. The market price of gold cannot diverge from the legal price at which gold may be brought to or obtained from the Bank: there cannot be a market for gold because it is impossible that sellers and buyers of it coexist. If the market price of gold were above the legal price, potential buyers would find more advantageous to go to the Bank and they would ignore the market, as potential sellers would do in the symmetrical case of the market price being below the legal price. No individuals face one another about gold: the Bank is the only counterpart. But its relationship with individuals (two-way convertibility) is not a market one, since the Bank is compelled to give or to accept gold at a legal price.

Leaving aside the consequences of such an assumption for the very notion of standard of money (see below Section 4), it is easy to see why it clashes with Ricardo's understanding of a monetary economy. Ricardo repeats over and over that the divergence between the market price and the legal price of gold reflects the divergence between the actual quantity of money and that which satisfies "the wants of commerce". No individual - and not more the issuing bank itself – may know *ex ante* the latter. Benetti and Cartelier are right when they say that "the wants of commerce" depend on what happens in the markets for all other commodities, and it is precisely why - according to their own motto - they cannot be known ex ante. If one assumes (something which is not denied by them) that the Bank can issue more or less liberally the notes demanded by individuals, the decentralised nature of the economy makes it impossible for the Bank to issue an aggregate quantity of notes that would spontaneously equalise with what is required by "the wants of commerce". It is thus impossible to reconstruct Ricardo's monetary theory or to use it as starting point of any Classical theory of money by presupposing, as Benetti and Cartelier do, that "in a closed economy, the market price of gold cannot diverge from the legal price", if this "closed economy" is a decentralised one.

#### 2.2. What happens in case of divergence?

Supposing that the market price of gold is above the legal price (in Ricardo's words, the currency depreciates), what happens next? Benetti and Cartelier's answer is: nothing. Nothing between individuals, and I agree. As I wrote in my chapter (on p. 5): "The bank thus provides the missing side of the market for bullion, in the absence of any demand by all other agents who may obtain gold from the bank at the legal price." But here comes their second

critique concerning the market price of gold: nothing will happen between individuals and the Bank either, because this would be assuming that the Bank implements an "odd monetary policy" (p. 2). In other words, its "economic behaviour is incoherent." (p. 3) This is a dead blow to a reconstruction that emphasises the coherence of Ricardo's theory of money.

To see exactly at which level this critique operates, let me again sum up how Ricardo describes the regulation of the issuing of convertible notes by the Bank of England in case of its excess (for details see Deleplace 2017 Chapter 7). The adjustment process is in four steps: 1) Individuals obtain gold for notes at the Bank and export it. 2) If the Bank reissues the notes which are returned to it, there comes a time when its metallic reserve will be viewed by it as too low to guarantee convertibility. It then starts to purchase gold in the market with its notes, in spite of the loss it suffers by buying gold at a higher (market) price than the (legal) price at which notes are returned to it. 3) Arbitragers stop exporting the gold since it is now more advantageous to sell it to the Bank in the market. 4) This goes on and on ("Penelope effect") until the Bank, to stop its losses, contracts its note issue. This contraction is implemented as long as notes are returned to the Bank, that is, as long as the market price of gold is above the legal price. In the end both prices equalise.

Benetti and Cartelier do not object to 1); indeed it is what they retain from Ricardo: "It seems to us that Ricardo clearly favours the regulation of the quantity of money through the export of gold by individuals. Gold is bought by foreigners and the role of the Bank would be to regulate the issuance of money and not to act in the market instead of individuals, as stated by GD." (p. 3) An ambiguity lies in the word "favours". If it means that Ricardo contended that money in excess generates an export of gold, no one will deny it; I devoted the whole Chapter 8 of my book to the analysis of how this occurs. If "favours" means that for Ricardo the export of gold should be to regulate the issuance of money", as they say? If the export of gold does the job, the sole "role" of the Bank is to give gold passively against its notes when it is required to do so under convertibility. Indeed Ricardo never considered that the Bank should buy and sell gold "instead of individuals, as stated by GD" (I nowhere stated that), but he did consider that the implementation of a specific rule (see below) by the Bank was preferable to the export of gold by individuals as means of regulating the note issue.<sup>3</sup>

Since the export of gold implies a cost (as for any commodity that must be brought to the market), Benetti and Cartelier cannot either object to 3), that is, the substitution of domestic arbitrage (at no cost, as they suppose) for the international one. Hence their critique does not concern the behaviour of the arbitragers but that of the Bank. They object to 2): "Why does the Bank provide 'the missing side of the market for bullion' ([GD] p. 5) whereas this action worsens the problem that motivated its decision to act? [...] The insufficient gold reserve cannot 'force' the Bank to apply a monetary policy that reduces it further." (pp. 2-3) They also object to 4): "Why does not the Bank adopt this measure [the contraction of the note issue] *from the beginning*? [...] The demand for gold is positive only if there is at least one agent [the Bank] whose economic behaviour is incoherent." (p. 3; BC's emphasis)

Benetti and Cartelier's critique is entirely right. It just misses its target: their "whys" do not question my reconstruction of Ricardo's argument but they are in fact addressed by Ricardo himself to the Bank of England. According to him, the Bank behaved stupidly, *from its own point of view*, as testified by the fact that it was eventually obliged to adopt the

<sup>3</sup> The long quotation from Ricardo given by Benetti and Cartelier had another object: to stress that, *if* this regulation was done through international arbitrage, freedom of gold export should be granted – a sensible stipulation since it reduced the limits between which the exchange rate might fluctuate (the gold points).

opposite behaviour (contracting the issue rather than expanding it to purchase gold).<sup>4</sup> But mistaking the real target they fail to see that, although the Bank behaves stupidly in the first place, this does not prevent the regulation of the note issue from operating (that is, the divergence between the market and the legal prices of gold will sooner or later disappear, contrary to what happens under inconvertibility), precisely because the "Penelope effect" obliges the Bank to stop behaving stupidly. In other words, the "incoherent behaviour" of the Bank is indeed "not acceptable", as Benetti and Cartelier write (p. 3). But it is so, not as a condition of my reconstruction of Ricardo's argument (which logically would condemn this reconstruction) but, according to Ricardo himself, as the explanation of the poor functioning of the monetary system (poor because the delay with which the Bank changes its behaviour has adverse effects on the economy).

Benetti and Cartelier are also right when they ask, as quoted above: "Why does not the Bank adopt this measure [the contraction of the note issue] from the beginning?" This is exactly Ricardo's point, and there is no contradiction between my reconstruction of what happens when it is not so and the contention that all would be better if it were so. On the contrary, this reconstruction justifies Ricardo's advocacy of his monetary policy rule: the varying of the note issue inversely with the sign of the spread between the market price of gold and its legal price. However, Benetti and Cartelier also fail to see that such adoption, on the one hand ruled out, not only domestic arbitrage (the "Penelope effect") but international arbitrage as well (because, in the case of excess note issue, its contraction would occur before the export of gold became profitable), and on the other hand it would dispense the Bank from bothering about the ratio between its metallic reserve and the stock of notes in circulation (because, although returning one's notes to the Bank was always possible, no one would find advantageous to do it). Ricardo was very clear on these two aspects in his Proposals for an Economical and Secure Currency: "The most perfect liberty should be given, at the same time [as the proposed note convertibility into bullion], to export or import every description of bullion. These transactions in bullion would be very few in number, if the Bank regulated their loans and issues of paper by the criterion which I have so often mentioned, namely, the price of standard bullion, without attending to the absolute quantity of paper in circulation." (Ricardo 1816: 67; reprinted in the 2<sup>nd</sup> and 3<sup>rd</sup> editions of *Principles*, Ricardo 1821: 357-8; emphasis added) Ricardo could stress that he had "so often mentioned" this issuing rule: in the 4<sup>th</sup> edition of *High Price* he had already stated: "An unfavourable exchange can ultimately be corrected only by an exportation of goods, by the transmission of bullion, - or by a reduction in the amount of the paper circulation." (Ricardo 1810-1811: 125; Ricardo's emphasis)<sup>5</sup>

At the end of the day, my disagreement with Benetti and Cartelier may be summed-up as follows: one thing is to assume that under convertibility the market price of gold is necessarily equal to its legal price (their position), another thing is to account for the adjustment process through which the market price of gold equalises with its legal price. According to me, this was the specific object of Ricardo's theory of money, which can thus be

<sup>4</sup> Benetti and Cartelier make fun of the Penelope "metaphor" (which I do not "take from Smith" as they say but borrow from Ricardo himself who takes it from Smith; see Ricardo, 1810-1811: 58) on the motive that it "implies that Penelope undid in the night *more* than what she did in the day. It is easy to guess the end of such a tale." (p. 2; BC's emphasis). Contrary to what they write ("the difficulty does not lie in the Bank's losses as such"; *ibid*), the loss experienced by the Bank and the expansion of its note issue to purchase gold in the market are one and the same thing: the latter is the exact measure of the former.

<sup>5</sup> By insisting on the export of gold as the "favoured" regulating mechanism in Ricardo and by giving to the reserve coefficient a prominent role in their model, Benetti and Cartelier land unexpectedly in the realm of the Currency principle.

called a theory of monetary disequilibrium (meaning by that a situation in which the quantity of money does not "conform" to "the wants of commerce").<sup>6</sup>

# 3. The necessary exteriority of the standard

Benetti and Cartelier also criticize my proposition that the standard (e.g. gold) is necessarily exterior to the system of production that determines the natural prices of the commodities in the economy where the standard-based currency circulates. According to them, this proposition is both unwarranted and inappropriate.

Quoting my book, they rightly observe that this exteriority of the standard is supposed to result from the contradiction between a determination of the market price of gold by its natural price (if gold belongs to the system of production) and its regulation by a legal price (when gold is the standard of money). However, referring to their own model (in Benetti and Cartelier 2020), they see no such contradiction so that my proposition is unwarranted. It does not come as a surprise that this contradiction does not show up in *their* model: as testified by their equation (\*) on p. 4, the money price of any commodity other than gold is equal to the price of this commodity in terms of gold (solution of the Sraffa system in which the numéraire chosen is gold) multiplied by the money price of gold, *which they suppose constant* since it is the reciprocal of "the quantity of gold which defines the £" (p.4).

As emphasised in the previous section, Benetti and Cartelier's assumption that the market price of gold cannot be but equal to its legal price is at odds with Ricardo's view that it may diverge from it, and that this divergence is caused by the discrepancy between the actual quantity of money and the quantity required by "the wants of commerce". Substituting the definitional equality of the market price of gold to its legal price for the regulation of the former by the latter, Benetti and Cartelier boldly eliminate one of the terms of the contradiction, hence the contradiction itself.

After having magically made my exteriority proposition disappear, they set themselves to the task of showing that it is inappropriate to make a Classical theory of money consistent with the Sraffa system of natural prices. It is so because of my "neglect of the *general* problem of gravitation of market prices around natural prices. His [GD's] focus is on the *specific* question of the gold market only." (p. 5; BC's emphasis) So doing I cannot, however, get rid of this gravitation problem, which hides itself in the quantitative determination of "the wants of commerce" and in the adjustment of the market price of gold in the foreign mines ("Why should the gold market price be equal to its natural price if no gravitation mechanism is considered?"; p. 5).

Now Benetti and Cartelier do not like gravitation as a theory of the determination of market prices, and they prefer the "Cantillon rule" according to which the market price of a commodity is determined by the ratio of the quantity of money spent on its market to the

<sup>6</sup> It is interesting to note that the link between monetary theory and disequilibrium was made by Sraffa in his preparatory notes for his 1932 article against Hayek: "The dividing line, which appears to assert itself more and more definitely, is another one [than Hayek's]. The non monetary theory studies a state of equilibrium, and the conditions which determine it: it goes as far as comparing two, or more states of equilibrium, and measuring the differences in their conditions – but goes no further. Here begins the field of monetary theory: or rather, jumping over the study of the path followed in the transition from one position to another, it sets to study states of disequilibrium." (*Sraffa Papers*, D3/9<sup>181</sup>)

quantity of the commodity present on it and entirely sold at that price. This is a position which merits respect but again its misses its target. It is true that "the wants of commerce" must be expressed at market prices, but I never claimed that my reconstruction of Ricardo's theory of money accounted for them: my purpose was to elucidate what, following Ricardo, happens when the actual quantity of money diverges from the quantity required by "the wants of commerce" (unknown by the agents and by the Bank), not to determine the latter, which is to be considered as an independent variable. In the terms used in the previous section, I contend that Ricardo's theory of money diverges from the level required by "the wants of commerce"), not with market disequilibrium (when the market prices of commodities diverge from their natural level).

As for the equalization of the foreign market price of gold with its natural price, it may be amusing to note that, in the model I propose of the adjustment in foreign mines (see Deleplace 2017 Chapter 5), the specificity of gold as a commodity demanded abroad for monetary purposes – namely that its demand expressed in money terms should be considered as given, independently of the adjustment process – explains that its market price is determined by what amounts to a "Cantillon rule" (see equations (5.3) to (5.5) in Deleplace 2017: 184). Gravitation does not play any more role in the determination of the market price of gold In the gold-producing country as than it does in the gold-importing one, and this the adjustment of the market price of gold is entirely the consequence of its role in a standardbased monetary economy.<sup>7</sup>

## 4. Sraffa's theory of prices and Classical theory of money

Benetti and Cartelier's comments – substantiated by their 2020 paper – and my reply suggest that the issue of linking Sraffa's theory of prices with a Classical theory of a standard-based money may be explored along two alternative routes.

The one I have proposed thanks to a reconstruction of Ricardo's theory of money focuses on the relationship between the issuing of money and the market price of the standard (gold), which diverges from its legal price when the quantity of money issued is not at the level required by "the wants of commerce". Sraffa's theory of (natural) prices may then apply at two necessarily distinct levels: in the country producing the commodity used abroad as standard of money (but not in this country) and in the country importing this commodity to use it as standard of money (but which does not produce it). At both levels, a general theory of market prices is unnecessary – this is not the object of the theory of money – and, although the standard of money is a commodity subject (in the gold-producing country) to the Sraffa system, it is outside this system in the country where the currency is based on it.

<sup>7</sup> The existence in the importing country (where gold is used as standard of money) of a sector specialized in the gold trade explains that there is also a natural price of gold in this country. However, it is not determined by the conditions of production of gold in this economy (since it is not produced there) but by the natural price in the gold-producing country (to which the market price there is equated), plus the cost of transportation and the profit at the general rate in the importing country (see Deleplace 2017: 187-191). The equalisation of this domestic natural price of gold with the legal price (thanks to the adjustment of the quantity of money) determines the exchange rate between the currencies of the two countries. This exchange rate is thus solely determined by the conditions prevailing in the market for gold in both countries and not by the state of the balance of payments.

The other road, suggested by Benetti and Cartelier, assumes that the market price of the standard cannot be but equal to its legal price – in that, although Classical, this road moves away from Ricardo – and focuses on the relationship between the issuing of money and the market prices of all commodities except the one chosen as standard (gold), thanks to the adoption of the "Cantillon rule". Sraffa's theory of (natural) prices may apply to all commodities produced in a supposedly closed economy, whether the commodity chosen as standard or all other commodities. The theory of money cannot be separated from the theory of (monetary) market prices.

As I see them, the critiques addressed by Benetti and Cartelier to the first road are not conclusive. By contrast, the two main points they contend – the necessary equality between the market and the legal prices of the standard of money and the assumption that gold is produced in the economy which uses it as standard – raise two serious difficulties along the road they advocate. On the one hand, stating that its market price is fixed independently of the quantity of money issued amounts to considering gold as a simple numéraire, and not as a standard regulating the monetary system. Contrary to the title of their 2020 paper, Benetti and Cartelier's object is not to build a Classical theory of money in which the quantity of money is regulated by a standard but a theory in which it is regulated through the adjustment of the money prices of all commodities except the standard (reduced to a numéraire). On the other hand, assuming that the "Cantillon rule" applies to all commodities except the standard does belong to a system of production of commodities subject to this rule.

More generally, my feeling is that Benetti and Cartelier's exercise is flawed by the fact that they are trying to pin a Classical-but-not-Ricardian theory of (market) price adjustment in response to a change in the quantity of money on a Ricardo-Sraffa theory of natural prices. As testified by many others of their writings, published jointly or separately, what they really believe in general is that a Classical theory of prices should not be built on a Ricardo-Sraffa basis but rather along Torrens's lines, in which the use of the surplus does matter to determine prices (contrary to what happens in *Production of Commodities by Means of Commodities*). The "Cantillon rule" that determines market prices is consistent with this view. But in their comments as in their 2020 paper, the exercise is based on Sraffa prices and there lies the root of their ambiguity as regards Ricardo. The question is therefore: can a non-Ricardian Classical theory of money reconcile the "Cantillon rule" of determination of market prices – which belongs to a non-Sraffian natural habitat – and Sraffa prices?

# References

Benetti, C. Cartelier, J. (2020) "From Ricardo to Sraffa: Gold as Monetary Standard in a Classical Theory of Money," in Marcuzzo, M.C., Deleplace, G., Paesani, P. (eds.) New Perspectives on Political Economy and Its History, Cham: Palgrave Macmillan: 241-57.

Deleplace, G. (2017) Ricardo on Money. A Reappraisal, Abingdon: Routledge.

- Deleplace, G. (2020) "Orthodox versus Unorthodox Views on Ricardo's Theory of Money," *The European Journal of the History of Economic Thought*, 27 (6), December: forthcoming.
- Ricardo, D. (1810-1811) *The High Price of Bullion, A Proof of the Depreciation of Bank Notes*, in Ricardo (1951-1973), vol. III, 1951: 47-127.
- Ricardo, D. (1816) Proposals for an Economical and Secure Currency, in Ricardo (1951-1973), vol. IV, 1951: 49-141.
- Ricardo, D. (1821) On the Principles of Political Economy, and Taxation, 3<sup>rd</sup> edition, in Ricardo (1951-1973), vol. I, 1951.
- Ricardo, D. (1951-1973) *The Works and Correspondence of David Ricardo*, edited by P. Sraffa with the collaboration of M.H. Dobb, Cambridge: Cambridge University Press, 11 vols.
- Sraffa, P. (1960) *Production of Commodities by Means of Commodities. Prelude to a Critique of Economic Theory*, Cambridge: Cambridge University Press.

Sraffa Papers, Cambridge: Trinity College, Wren Library.