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How *homo economicus* is reflected in fiction – A corpus linguistic analysis of 19th and 20th century capitalist societies

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ABSTRACT

The issue of power and the use of language has been widely researched (e.g.: Bernstein, 1973; Fairclough, 1989), as have the issues of power-relations and control (cf. Bourdieu, 1991; Partington et al., 2013). This corpus-based lexical investigation focuses on the frequency, collocations, and semantic associations of words likely to express the presence or absence of an economic and power structure. For this, British works of literature of the 19th and 20th century were investigated. More specifically, this article also tries to answer the question of whether key concepts of Marx's critique of political economy, as articulated through the words prominent in English translations of Marx's works, have left a noticeable impact on the language found in literature.

1. Introduction

The issue of power and the use of language has been widely researched (for example: Bernstein, 1973; Fairclough, 1989), likewise, power-relations and control (cf. Bourdieu, 1991; Partington et al., 2013). Looking at both economic and power-relations using corpus-based research, this paper asks how the frequency, collocations, and semantic associations of words might fit into this tradition of exploring how the world is linguistically represented. This study therefore follows the dictum that "[c]orpus stylistics can contribute to the exploration and development of descriptive tools that aim to characterize meanings in texts" (Mahlberg, 2007: 240).

Inspired by Karl Marx's *Capital* and Thomas Piketty's book *Capital in the Twenty-First Century* (2014) where the authors, unusual for economists, make frequent reference to works of literature[1], this paper uses material from British written fiction of the 19th and 20th century to determine how far lexical choices in British literature over the last 200 years provide a reflection of *homo economicus* in fictional writing. This will be done through an investigation of how key words express the writers' relationship to the subjects of wealth and earning an income.

Friedrich Engels (1876), Marx's key collaborator, highlights the centrality of economic production to social life. According to Stearns & Hinshaw, "industrial revolutions constitute those rare occasions in world history when the human species alters its framework of existence" (1996: vii). It can be seen that Marx and Engels had hoped that fundamental changes in the economic and political organization of society would become evident in the evolving discourse within the wider culture.

Marx, in his *Critique of Political Economy* (1859) aptly says that "Es ist nicht das Bewusstsein der Menschen, das ihr Sein, sondern umgekehrt ihr gesellschaftliches Sein, das ihr Bewusstsein bestimmt." (It is not the consciousness of man that

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[1] There are around three times as many references to the *litterateur* Honoré de Balzac in Piketty's book as there are to Karl Marx. It has to be noted, furthermore, that Marx tends to quote Goethe and Shakespeare, whereas Piketty looks at works by Balzac as well as Jane Austen.

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determines their being, but it is the other way around, namely it is their social being, which determines their consciousness). That consciousness is not just reflected but also created through literary texts is an issue highlighted by Marx himself. Echoing Marx's interpretation of consciousness, the French sociologists Bourdieu and Passeron describe a link between language and its link to the pervading culture:

> … no one acquires a language without thereby acquiring a *relation to language* [author's highlights] In cultural matters, the manner of acquiring perpetuates itself in what is acquired. (Bourdieu and Passeron, 1977: 116)

The cultural norms are, therefore, perpetuated through the repeat exposure a language user encounters. This philosophy is clearly reflected by the sociolinguist Basil Bernstein (1973) and has been discussed by the psychologists Pennebaker et al. (2003). Looking at novels written in Victorian Britain, approaches by Henderson (2000), Klaver (2003) and Fitzpatrick (2005) indicate a clear connection between literature and the political economy of its time. Indeed, as Fitzpatrick formulates it: "social problem novelists not only do not envisage significant alternatives to free market capitalism, they close down spaces (…) through which such alternatives could be imagined" (2005: 45).

This paper will conclude by briefly comparing the 19th and 20th century texts with regards to the issues that are most prominent in Marx's writings. In doing so, it is hoped that we will be able to see whether the lexical choices of writers reflect any kind of Marxian influence in their novels.

2. Methodology

To demonstrate the prominence of *work* or, alternatively, *labour* in daily life in written fiction, it is seen as necessary to investigate the larger body of literature – not just a single writer. In a lexis-based investigation, words will be looked at in their context. The selection of the target-words chosen for this investigation is based on the English translations of the works of Karl Marx written originally between 1844 and 1867 (in German) which also includes the Engels-edited volumes II and III of *Capital*. The comparator corpora to this Marx-Corpus are 500 full-text Victorian novels, representing the 19th Century (cf. Patterson, 2016) and the material in the W-Fiction-Prose subcorpus of the British National Corpus (BNC) representing the 20th century. In the following, these three corpora will be referred to as *MC* (Corpus of Marx's writings in their English translations), 19C (Corpus of 500 full-text 19th century novels) and *BNC-F*. Details can be found in Table 1.

Table 1
Size of the three corpora used.

Corpus	Tokens N	Texts N
MC	1,355,305	13
19C	47,309,180	500
BNC-F	16,658,591	432

The fiction corpora reflect a large number of works by different authors – this provides a fairly representative basis of the written imaginative work of that time (even if the BNC-F does not use full-text novels). We can see that the 19C corpus is almost 35 times the size of the Marx Corpus; the BNC-F is twelve times the size of the MC (the 19C is nearly three times the size of the BNC-F). One of the questions that might be raised is whether it is permissible to compare one corpus with two corpora that are a lot larger; another is whether there is much value to compare the works of one writer in one genre to the writings in a completely different genre. The first point is easily addressed: the data available can be normalised, so that all figures appear relative to respective size of the corpus[2]. Furthermore, when a keyword analysis is undertaken, the software does not simply take into account raw figures but checks for occurrence figures in relation to the relative sizes of the corpora. These numbers are tested statistically: in this way the programme measures to what degree it is likely that a word found in one corpus can be expected to be found in another. The discrepancy between the likelihood and the actual occurrence patterns then determines in what way a word is key in one corpus compared to another. All corpus-related calculations will be undertaken with a concordancer called *WordSmith* (Scott, 2018)[3]. The second point appears to be more philosophical. It depends on how far one can see fiction as a mirror of daily life, or, indeed, on how far writers and their readers accept daily life to be reflected in fiction. Back in 1958, this was neatly summed up by Raymond Williams:

> There is a kind of novel which in fact creates and judges the quality of a whole way of living in terms of the qualities of persons. The balance involved in this achievement is perhaps the most important thing about it. It looks at first sight so general a thing—the sort of thing most novels do. It is what *War and Peace* does; what *Middlemarch* does; what *The Rainbow* does. The distinction of this tradition is that it offers a valuing creation of a whole way of life, a society, that is larger than any of the individuals composing it, and at the same time valuing creations of individual human beings,

[2] For the headline figures, all numbers will be normalised to *words per million* in the whole corpus; for the collocations, this will be *words per thousand* occurrences of the target words. Otherwise, relative percentages will be given.

[3] Mike Scott gives a full description of how *keywords* are being calculated – please see http://lexically.net/downloads/version7/HTML/keywords2.html.

> who while belonging to and affected by and helping to define this way of life, are also, in their own terms, absolute ends in themselves. (Williams, [1958] 1972).

Thus, novels present more than just a window into the daily lives of the society in which they are set. As Williams points out, there is no one-to-one mapping (nor can there be) yet a reasonable reflection of reality can be presented in novels. Furthermore, the use of historical fiction as a gateway into understanding or teaching economics is not new. Margaret O'Donnell (1989) traces such attempts back to Jane Marcet and Harriet Martineau who both referenced fairy tales and other works of literature in order to teach economics. In a contrasting approach, this investigation of literature focusses on how far references to *homo economicus* or *homo faber* (the focal point of all of Marx's writings) can be found in those works of literature that "create the quality of a whole way of living".

To achieve a fairly comprehensive approach as to the selection of target words to focus upon in the corpora, a two-step method was developed:

1) A list containing the 2500 most frequent words in the BNC-F and 1000 most frequent words in the 19C corpora was compiled. Out of these, items relating to the word fields of *power, wealth,* and *work* were subsequently selected.
2) Based on the major works of Karl Marx, a list of the most frequent nouns and noun-phrase clusters was created to investigate the issues that are clearly prominent in these works on history and economics. This was then compared using a keyword-list with material from the 19th century and 20th century literature corpora.

As a result, a total of 50 target words have been identified. Each of these words has then been checked with a concordancer for both corpora to decide which of these words, and in which forms of use, are relevant to this study.

Within the 50 target words identified, in a final selection, this paper focuses on three areas (in bold) and their key terms (in brackets):

1) **Money** (*buy, capital, market, money, paid, pay, poor, profit, property, purchase, salary, value, wealth,* etc.)
2) **Power** (*appearance, bourgeoisie, class, control, failure, knowledge, influence, owner, power, powerful, voice,* etc.) and
3) **Work** (*employed, factory, labour, machinery, union, work, worker, working,* etc.)

Below, the reader will find the number (total and relative) of occurrences for these words. It must be noted that the in-depth discussions will be restricted to those words that display a pattern of use that is of interest within the framework of this research.

3. Findings and discussion

The use of language can be seen as a reflection of the life and well-being of a group of people within a clearly defined time-frame. As such, comparing the literary output of an early with a late capitalist society can be a way to point towards trends or changes described. Fitzpatrick (2005: 28) points out that, in Britain, all the principles of a capitalist political economy were already in place by the 1820s, meaning that "*homo economicus* is (…) an atomistic figure driven by self interest". Later in his article, Fitzpatrick claims that, for Victorian writers, "economic reform is (…) depicted either as irrelevant to society's moral order, or even as inimical to it" (Fitzpatrick, 2005: 42). Language can be used to soften harsh realities, which would produce sentiment instead. This might explain the so-called "linguistic positivity bias (LPB)" found by Illiev and colleagues (2016). Thus, people tend to use positive more often than negative words; and this has been found to be true regardless of genre and language. However, the level of positivity appears to be influenced by external factors, as their study highlights:

> …we found that years with a higher Misery Index tended to have lower levels of LPB. (…) Not only the distinction between war and peace but also the difference between economic hardships and economic prosperity seem to be relevant when predicting the rate of LPB (Illiev et al, 2016: 5).

The focus of Marx's writing is on economic inequality – as such, a high "Misery Index" during the 19th century can be expected. The question is whether the changes between 19th and 20th century works of literature should be interpreted as reflecting a change in prosperity or economic outlook, or as a reflection of a lack of interest in the issue (and, therefore, a shift in awareness of economic matters).

A general overview of the word choices made by novelists reveals that almost all target-words differ in their frequencies significantly where BNC-F and 19C entries are directly compared. In most cases, statistical testing revealed strong overuse within the 19C corpus. Notable exceptions, where no difference was registered, are the words *class, powerful, market, failure, conservative* and *salary.* By contrast, *voice* and *control* are most significantly overused in the BNC-F, while *poor, power, appearance* and *influence* are statistically the most divergent in their overuse for 19C. However, this can only partially be explained by a shift in style and may indicate a shift in the writers' attitudes, or more precisely, reflect Bourdieu's claim that "linguistic signs are also goods destined to be given a price by powers capable of providing credit" (1991, 506). In other words: writers reflect their market – the buyers of their books (cf. Biber and Conrad, 2009).

The comparison between the two fiction corpora shows not only a change in the language used but also highlights to what extent certain fixed expressions are relatively recent in their usage.

Thus the occurrence of multi-word-units like *market makers, market research* and a *free market* are low in the 19th century literature, while they often found in 20th century texts. On the other hand, there are far more references to *public* (as opposed to the private) in the 19th century – *public money, public works.* This may be seen as an indication that public entities were relatively new in 19C, while they have been widely accepted in the 20th century and are thus no longer mentioned.

3.1. The three main word fields

3.1.1. Money

This section aims to answer the question of how far the first semantic group, *money* ('Geld'), is being treated in works of literature. Marx is explicit about the power of money: "So gross die Kraft des Geldes, so gross ist meine Kraft" (the amount of my money equals my power) (Marx, 1844: 99). Thus, for Marx, a person's being is not determined by their individual qualities but by what they can buy with their funds – ugly men get pretty wives, men can be dumb or dishonest, yet money is presumed to overcome all objections. Moreover, Marx cites both Goethe and Shakespeare who, in *Mephisto* and *Timon of Athens* respectively, are said to produce supporting evidence for his argument. Consequently:

> Da das Geld als der existierende und sich betätigende Begriff des Wertes alle Dinge verwechselt, vertauscht [ist es also] die verkehrte Welt, die Verwechslung und Vertauschung aller natürlichen und menschlichen Qualitäten. (Since money, as the existing and self-sustaining conception of value, confuses all things, it is the inverted world, the confusion and the exchange of all natural and human qualities.) (Marx, 1844: 101)

In the following, *capital, market, profit, purchase* and *value* will be not discussed as these are a) far less frequent in fictional texts, and b) words like *market* or *purchase* are very clearly used in a different ways where 19C and BNC are compared. For reasons of space, these words had to be ignored here.

Table 2 shows that all the chosen target terms can be deemed prominent in Marx's work – they occur between twice (*buy*) and 86.5 times (*capital*) in every 1000 words within his writings. Presented here are merely the raw figures. The next step is to see how these target words occur in works of literature.

Table 2
Frequency of MONEY related words in the three text corpora. Occurrences per million words (p/m) in brackets.

	BUY	CAPITAL	MARKET	MONEY	PAID	PAY	POOR	PROFIT	PROPERTY	PURCHASE	VALUE
MC	278 (205.1)	11,736 (8659.3)	1,173 (865.4)	6,584 (4857.9)	574 (423.5)	357 (263.4)	210 (154.9)	2,800 (2065.9)	874 (644.8)	518 (382.2)	10,397 (7671.3)
19C	1,681 (35.5)	3,153 (66.6)	2,911 (61.5)	12,773 (269.9)	5,338 (112.8)	6,556 (138.5)	23,917 (505.5)	1,205 (25.4)	5,256 (111.2)	1,540 (32.5)	4,753 (100.4)
BNC	1,538 (92.3)	357 (21.4)	843 (50.6)	5,687 (341.3)	1.493 (89.6)	1,929 (115.7)	3,325 – (199.7)	223 (13.3)	544 (32.6)	142 (8.5)	476 (28.5)

3.1.1.1. Buy. In Anthony Trollops *Dr Thorne* (1858),[4] a reader can find Marx's sentiment echoed: "I know he is rich; and a rich man I suppose can buy anything–except a woman that is worth having." "A rich man can buy anything," said the doctor; "not that I meant to say that Mr Moffat has bought Miss Gresham"'. It can be observed amongst 19th century British literature for the word *buy* has a noticeable negative prosody[5]. Therefore, negative pre-qualifiers are often found: "will not / would not / could not buy". The phrase *money to buy* is pre-modified by a negative in half of all cases. Similarly, while 15 instances of *cannot buy* are set in contrast to 48 of *can buy*, the latter does not indicate a positive outlook. A lot of them are future promises ("you can have the best dress money can buy"); or as contrast to the hero's ability to buy "as good as other people can buy" or "Fish is as cheap as anything we can buy" which is directly followed by "but we have no money here to trade with". It can, indeed, be gruesome: "he dares not buoy her up with the hope that she can buy back her child…"

This is quite different from the BNC-F data. Here, all 49 instances of "can buy" were found to indicate positive prosody and stand in stark contrast to only 12 instances of "can't buy". Similarly, "enough to buy" tends to carry a negative sense in the 19th century novels, yet it is always positive in the 20th century novels. The only time both sets of data are in agreement, it seems, is when writers use "afford to buy" which is overwhelmingly used to show that the characters in these novels cannot afford

[4] Quotes from works of literature have been taken from the relevant concordance lines in the respective corpora. For this reason, example sentences have not been referenced and, where quoted at length, these books are not listed separately in the reference list.

[5] *Negative prosody* means that the majority of the words co-occurring are either negation markers or widely accepted as negative. A key example is "will not budge" where the word "budge" almost always follows a negation.

the things described. The use of "buy" in Marx is, in contrast to this, neutral, with "able to buy" and "in order to buy" and none of the "money cannot buy love" metaphors found in fiction.

3.1.1.2. Money. 2.5% of all instances of the word 'money' are found in the larger cluster "sum of money". These instances describe a transaction and are mostly positive in their prosody. Surprisingly high, however, is the number of references to money outside the usual framework of earning an income: over 15 in 1000 mentions of *money* are "prize money" – though this term is clearly overused by one writer[6], it is widely used in a range of novels. Nearly as often, a reader can find a reference to "ready money" which, in about half of all cases, is mentioned in connection with investments. Similarly, "large sums of money" or "great deal of money" can be found in over 18 in 1000 mentions. This stands in contrast to nearly 23 instances of "no money"; eight of "without money" and 13 of "little money" in 1000 words. One possible interpretation is that, overall, Victorian literature is more concerned with difficulties due to a lack of funds rather than the possession of wealth. It must be noted, too, that both "my money" and "their money" (each occurring 18 times in each 1000 uses of "money") come overwhelmingly with negative connotations – money gambled away or money spent in beer shops. There are very few exceptions like "our manufacturers make their money by trade".

In the BNC-F, the reference to characters "without money" is virtually unknown – it occurs once every 1000 times – five times in total. By contrast, "little money" appears in eight out of 1000 mentions of money and seems to fit the kind of description Marx would give himself: "there is little pleasure in having too little money" or "waiting for the opportunity to discuss earning a little money. None arose". Similarly, there are references to struggling to get by: "if Toby only had a little money and a proper job"; "the business made little money"; "there is little money in art/portraiture". Yet, these examples notwithstanding, a good quarter of the instances of "a little money" do not refer to a need but to additional funds (including "her dad left her a little money"). "No money" is found about as often as either "a lot of money" or "more money" – nearly 25 times in a 1000 mentions. While the former is almost always in a positive sense ("his dad has a lot of money), "more money" is almost evenly split between the positive ("dad left more money than expected") and the negative ("until more money can be found to buy things"). The same is true for "much money". However, both "some money" and "enough money" appear with very few exceptions with a positive prosody. "My money" and "their money" appear less often than in the literature of the previous century (about 15 times per 1000 mentions of "money"). Apart from a few exceptions, these two phrases come with a negative prosody: "it is foolish of you to spend my money like that"; "he had gambled all their money away". Here, we can see the references to gambling again – not much of a change to 19th century literature[7]. Overall though, life in the 20th century appears to be portrayed in a more positive light, with people having enough to live by and more or even a lot of money.[8] We can conclude that, in line with the research of Illiev et al (2016) the 20th century appears more prosperous – as the prosodies for *buy* and *money* are more positive.

Yet readers are rarely being told where the money actually comes from.

3.1.1.3. Paid. It is striking how vague the use of the term *paid* is in literature, compared to how we find it in Marx's work. There, he talks about "wages have been paid", "money paid", "paid labour" "better paid" "paid and unpaid". All of these refer to receiving (or not receiving) money in return for labour. In fiction texts, however, *paid* expresses a wider range of meanings; payment for work is expressed far more indirectly and is far less frequent.

3.1.1.4. Pay. This word, in 19th century literature, mostly refers to the act of paying, rather than a payment: nearly half (45.8%) of all references are "to pay" rather than the noun "the pay", which occurs in less than two per cent of all uses. Whilst there are references to metaphorical types of paying, such as "pay a visit" or "pay attention", the majority of uses are literal. "The pay" does refer to pay-rolls and increase of pay; there is a good quarter of its occurrences that refers to a reduction in pay, hence presenting mixed prosodic signals. In the BNC-F, there are fewer occurrences of "to pay" (just under 40 per cent) and more of "the pay" – 2.7 per cent. This is a significant shift in frequency. A further marked shift in meaning has also to be taken into account: "the pay", as in *wage* or *salary*, has mostly positive connotations. Still, these are only a fraction of the uses of "the pay" which, in the 20th century, is mostly part of a compound noun: pay phone, pay booth or pay off. Therefore, *paid labour* plays only a minute role. "To pay", in the BNC-F, appears also with a notion of conditionality. Mostly, it refers to money exchange, yet apart from "paying a visit/respects" there is also the notion of being "prepared to pay" or "willing to pay" – which seems to indicate that the author references financial ability more strongly than the lack of funds. In Marx, "the pay" is rare; the infinitive "to pay" being used in more than half of all mentions of *pay*. All three sources have "pay for" as the most common usage – in the BNC-F it is for common purchases (diesel, coffee), while the Victorian literature also uses it very much for metaphorical circumspection ("the living pay for

[6] Found in two volumes of recollections of liberation wars by Thomas, Earl of Dundonald. The "prize-money" here refers to the share of the loot to the crew after a battle, sinking of an enemy ship etc.

[7] Generally, it seems that the use of the preceding determiner changes the meaning from a *lack of money* (usually with a pronoun) to an *addition of money* (usually preceded by *the)*.

[8] Often received from 'dad' – Thomas Piketty might find this interesting.

the dead"; "customers must be prepared to pay for perfection") whereas Marx is referring to general entities (goods, lodgings, merchants).

3.1.1.5. Poor. The 19C corpus stands out as the source with the highest number of uses of this word. Klaver (2003: 81) speaks of Dickens' "sentimental philosophy" – a probable reason for these wording choices. Furthermore, Fitzpatrick (2005) highlights the "obsession" with poverty in Victorian novels. He describes how they could write about production (work) and distribution (i.e. poverty) as well as home and family, though they would fail to integrate these into an interdependent whole. Consequently, data has to be checked carefully here, as "the poor" more often than not refers not to a group of people, but a sentiment. This is shown through the use of post-positioned words such as *fellow, man, old, dear, girl, thing, creature, soul, people,* etc. For example, the most common post-modifier is "little" which is always used to express sentiment – and "poor little" accounts for 3.8 per cent of all uses of "poor".

References to financial deprivation, by contrast, are marked through the indefinite article: "a poor man / woman / widow / orphan / child / wretch" (8.2% of all uses of *poor*). Checking these against the use in concordance lines, these express sentiment only in a few cases. It can therefore be estimated that around 7 per cent of the uses of *poor* directly refer to the absence of financial means.

This is mirrored in the BNC-F, though the word usage is modernised: *creature, fellow* and *soul* are not used; instead the reader comes across *darling, sod* and *kid*. Yet the use of the phrase *poor little* has increased, now amounting to 5.3 per cent of all uses of *poor.* "A poor" is used to prefix fewer people: man / doctor / person / relation, and such a description of the financially deprived is used for 1.6 per cent of the uses of *poor.* Out of the 641 times "the poor" are used, 59 (9.2%) refer to people without money. Of these, the majority sound Marxian, e.g. "The rich are getting fatter and sleeker. The poor are getting thinner and dirtier" (Barnes, *A Midsummer Killing:* 1989). By contrast, Marx uses "the poor" as a general term for deprived people. "A poor" by contrast, is used by Marx for things as well as people: "a poor soil" or "a poor labourer". Marx also makes frequent reference to the *Poor Law*: the most frequent compound here, occurring in 10% of all his uses of *poor.* It is more than twice as frequent as "poor people", which occurs 43 times in every 1000. The Victorian period's novels record *Poor Law*, but much less often: five times in every 1000 uses of *poor.* This issue is virtually unknown in the BNC-F, where it occurs only in two books.

3.1.1.6. Property. This is mentioned, proportionally, 6 times more frequently by Marx than in the 19C; it is four times more frequent there than in the BNC-F. Table 3 demonstrates how the word is mostly used:

While *private property* is referred to twice as often in the 20th century compared to the 19th century, that is still markedly less often than what is found in Marx, who hardly ever mentions *public property* though this is found with equal frequency in both literature corpora. Marx has to be more circumspect with property owners (he does not mention names – he refers to churches or banks instead). It is notable, however, how property seems to be less attached to a named owner in the 20th century.

Table 3
Frequency of *property* bi-grams in the three corpora (N: total; p/1000: per 1000 words).

Bi-gram/corpus	19C N	19C p/1000	BNC-F N	BNC-F p/1000	MC N	MC p/1000
PRIVATE PROPERTY	83	16	17	35	144	163
PROPERTY OF (X)	460	160	25	48	101	116
LANDED PROPERTY	68	13	0	0	244	279
PUBLIC PROPERTY	63	12	6	12	2	2
HIS PROPERTY	363	131	24	48	12	14

Property is typically owned by males – as *his* property indicates. Only ten in a thousand were *her property* in 19C; 16/1000 uses of *her property* in the BNC-F.

3.1.2. Power

The question of power is clearly a relevant one to Marx who, in *Civil War in France* wrote this much quoted assessment of liberal democracy:

> Das allgemeine Stimmrecht, bisher entweder für die parlamentarische Sanktion der Heiligen Staatsmacht oder als Spielzeug der herrschenden Klassen misbraucht, vom Volk nur anwendbar um einmal in vielen Jahren die parlamentarische Klassenherrschaft zu sanktionieren… (Universal suffrage, so far either misused for the parliamentary sanction of the holy state-power or as a toy of the ruling classes, can only be used by the people once in many years to sanction the parliamentary class rule). (Marx, 1871: 544)

It would is therefore be useful to see whether references exist (to a sufficient degree) that point towards words relating to class, power and ownership in works of literature.

Table 4 shows that *bourgeoise* is almost absent in fictional discourse. Both *influence* and *knowledge* are highly frequent in 19C. These two words are mainly referring to personal affairs, however, and not to economic power relations.

Table 4
Frequency of POWER related words in the three text corpora. Occurrences per million words (p/m) in brackets.

	BOURGEOISE	CLASS	INFLUENCE	KNOWLEDGE	OWNER	POWER
MC	386 (284.8 p/m)	1,081 (797.6)	219 (154.2)	65 (56.7)	381 (281.1)	2,278 (1680.8)
19C	9 (0.1 p/m)	5,069 (107.1)	6,751 (142.6)	8,853 (187.1)	1,305 (275.0)	16,411 (346.8)
BNC-F	2 (0.1 p/m)	1.252 (75.1)	339 (20.3)	1,113 (66.6)	574 (34.4)	2,185 (131.1)

Other useful terms to describe power-relations have been considered. For instance, Henderson (2000)[9] describes how Dickens determined to "always present the poor in a favourable light" and quotes his 1854 article 'On Strike' which is based on an information-gathering trip to Preston. However, Dickens' solution is that there must be "more feelings and sentiment" – the very approach criticised by Fitzpatrick (2005) – see above. As a result, the word *strike* might be of interest.

However, it appears just under 49 times in a million words in 19C, occurs even less in the BNC-F (over 30) and appears of little concern to Marx either. *Class, owner* and *power* have been found more fruitful to research and these are discussed below.

3.1.2.1. Class. This is a word justifiably seen as typical of Marx's writings. The figures in Table 4 indicate that it is a term eight times more frequent in Marx's body of work compared to Victorian Literature. The term is, moreover, of its time, being significantly less frequent in the BNC-F corpus compared to 19C.

Where *class* refers to human beings, we find a variety of descriptive forms. So, for example, "class of persons" which can be found in nearly ten within a 1000 (55 total) uses of *class*. In the majority of its uses, it has positive connotations, referring to the "better class". By contrast "class of people" (53 occurrences) tends to have negative prosodies, apart from the odd exception.

The use of the word *class* becomes a lot more revealing still when the talk comes to political classes. While the description "class of society" appears barely six in 1000 uses of the word (29 occurrences), this is already revealing. "Class of society" mostly describes the socio-economic system and appears most in the form of "any/every class of society" but tends to favour the *dominant / first / politer / respectable / upper* type to the *numerous / lowest / unhappy* kind of class (10 occurrences vs. 3 occurrences). It must be noted, furthermore, that the connotations describing the former are a lot more positive.

Amongst the mentions of *class*, Victorian literature seems to speak of the class its readers represent, namely the *middle class*. This is accompanied by the odd phrase of a "better class of person" (in nearly eight out of 1000 occurrences of *class*). This description is applied to any group of people – be they captives, gypsies, labourers on the one hand or merchants, burghers and noblemen on the other. "Higher class" tends to refer to nobles or middle-class clients, though a "higher class workman" is mentioned once. By contrast, just over 11/1000 references to the *lower class* – "lower class voters" and "lower class of industrials" surface here. Curiously, the description *lower class* appears more commonly attached to foreigners – be they Italian, Chinese or Arab.

Table 5 indicates how society is reflect in socio-political terms in 19C:

Table 5
Frequency of socioeconomic *class* descriptors for people in 19C.

Description	LOWER CLASS	WORKING CLASS	MIDDLE CLASS	UPPER CLASS	BETTER CLASS	HIGHER CLASS	SUPERIOR CLASS
N occurrences	60	55	163	39	61	32	26
In 1000 / *class*	11.8	10.9	32.2	7.7	11.8	6.3	5.1

This is fairly revealing, with references to the *middle class* being as frequent as all references to the *lower-*, *working-* and *upper-class* together. Furthermore, the balance is firmly set against the less fortunate: they are only referred to as *lower* or *working,* while the majority of those who are perceived as better-off also have pre-modifiers.[10]

[9] J.P. Henderson appears to have a more positive view on Charles Dickens as a social reformer than Tony Fitzpatrick.

[10] There is, furthermore, the phrase "certain class". This tends to be with negative connotations and appears to be used for any group of people but does not refer to socio-economic circumstances.

The phrase "belong to (a/the) class", when referring to people, tends to display negative prosody.
There is only one clear counter-example:

> Now what am I, Miss McQuinch? A worker. I belonged and belong to the class that keeps up the world by its millions of serviceable hands and serviceable brains. All the pride of caste in me settles on that point. I admit no loafer as my equal. The man who is working at the bench is my equal, whether he can do my day's work or not, provided he is doing the best he can. But the man who does not work anyhow, and the class that does not work, is a class below mine. (Shaw, *The irrational Knot*)

Though published in 1905, this was written in 1880 with the intent to show the nobility of workers:
"life in a class-conscious society" (Glicksberg, 1951: 3). Shaw, an early member of the Fabian Society is well known for his programmatic, socialist-leaning writings. Yet this stands as the clear exception to the wider drift within Victorian literature.

With reference to *class*, the 20th century literature also provides the more political term "class system", found in eight of every 1000 mentions. In contrast to earlier books "class of people" (5 occurrences) tends to have positive prosodies, like "nicer/better class of people" whereas all references to "class of person(s)" has, like "class of society", disappeared.

Table 6 shows that there has been a clear shift between descriptions when 19th and 20th century British literature are compared. The most-used descriptors in BNC-F are a lot closer to the terms used by social sciences, whereas *lower class* and *better class* are used markedly less often. Proportionally, the *working class* appears six times more often in more recent literature, compared to *middle class*, which only occurs $2^1/_2$ times as often. Yet, curiously, references to the *upper class* have also increased four times. Also, it can be observed that the range of pre-modifiers is a lot more balanced in the 20th century material, though the bias in favour of middle and upper (better) class remains, albeit less strongly so: there are 2.6 mentions for *middle class* etc. for every occurrence of *lower/working class* in 19C – whereas the ratio for the BNC-F is 1.7 to 1. Yet, digging deeper into the uses of *working class*, it becomes apparent that this phrase, more often than not, is merely employed as descriptive short hand.

Table 6
Frequency of socioeconomic *class* descriptors for people in BNC-F.[11]

Description	LOWER CLASS	WORKING CLASS	MIDDLE CLASS	UPPER CLASS	BETTER CLASS	HIGH CLASS[1]
N occurrences	5	83	104	37	10	13
in 1,000 / *class*	4	66.3	83	29.6	8	10.4

There are only few instances of *working class* as an active agent. Instead, there exist references to: (1) places ("good working-class houses"; "a working-class street"), (2), people who pretend to be working class ("it's plump actors pretending to be working class") and, (3) social characteristics ("working class background").

However, references of what *working class* entails remains short of detail: nothing is said about what these people actually do – not a single reference to work, graft, their place of work. In fact, a reader may encounter a negative view: "…and we were all against G.P. for being so contemptuous about working class people and working-class life. Calling them animals, not human beings." (Fowles, *The Collector*: 1963).

3.1.2.2. Owner. The word occurs about as frequently in the 19th century literature as it does in Marx; it is significantly less frequent (1/8) in the BNC-F. When looking at what is being owned, the appropriate 19th century middle-class sentiment of the authors seem to be reflected in the types of ownership mentioned. There are two mentions of "owner of the plantation", 14 (nearly 11/1000) of "owner of the estate", and nine of "owner of the mansion". More frequent are, however, the references to middle-class dwellings. Thus the 49 (38/1000) occurrences of "owner of the house". By contrast, "their owner" usually refers to personal possessions[12]; yet there are exceptions like the following: "His steeplechasers win glory for Ireland at Liverpool, whether they return a profit to their owner or not." – where ownership is directly linked to profit, though horse-racing is probably not the archetypical capitalist form of exploitation. Ownership in a capitalist-imperialist form can be found, however, amongst the 14 (nearly 11/1000) mentions of a "slave-owner". This amounts to only about 1/3 of the number of mentions found in Marx (29/1000). Below is one example of how "slave-owner" appears in literature:

> Cotton, at present, from being made by the corn law the principal exchangeable article in the American trade, assumes an undue and unnatural importance in American commerce, legislation, and home industry. The slave-owner drives his slaves in its production, and purchases supplies of the northern freeman, whose interests are thus identified with those of the cotton grower, and the slave-holding interest becomes predominant in the country. (Sturge, *A visit to the United States in 1841:* 1842)

[11] "High class", when referring to entities other than people: 12. "High class", in the majority of cases, appears to refer to prostitutes or bordellos.
[12] One example is "…the pile of luggage which announced their owner as Lady Muriel Orme" (*Sylvie and Bruno*, Lewis Carroll, 1889).

This travel diary appears as the closest thing to economic analysis found. In fact, all mentions of "slave-owner" in 19C display negative feelings and outrage against the same. Yet, when it comes to talking about anything that can be called *means of production*, a reader would be disappointed: there are no factory owners. Instead, there is a single reference to an "owner of a saltpetre manufactory" and one to an "owner of a colliery". Twice, "owner of mines of coal and iron" and "owner of the saltpetre mines" are mentioned, and five "owner + shop" occur. Similarly, we find "owner of the vessel" (6) or "owner of a (splendid/handsome) yacht" (3).

In the 20th century literature, we have the possessive form *owner's* used almost exclusively for personal items (shoes, razors) or relations: "owner's son/wife". Yet the BNC-F describes ownership in strongly middle-class forms. Even more frequent than "owner of the house", which appears 10 times (over 17/1000), there is "gallery owner" which appears 14 times (24/1000) in just a single book. Curiously, in the place of the yacht owner we find the "boat owner". Still, the contemporary literature shows a significant shift towards mentioning industry owners: there are 12 mentions in a 1000 of *mine owner* or *mill owner* – proportionally, three times as many as in 19C, though this is still considerably less often than what is found in Marx (29 and 16 per 1000 respectively). One significant change is, however, the type of owner that can offer places of employment. Whilst not recorded in the Victorian literature, "restaurant owner" is mentioned ten times in the 20th century material (over 17/1000).

3.1.2.3. Power. This is the term that occurs around twice as frequently as *class* in BNC-F and MC; it is also three times as frequent in 19C. In 19C, references to *political power* occur in five of every 1000 times *power* is used (83 occurrences in total) compared to nearly eight per 1000 in Marx. While there are also 68 uses of "intellectual power", it must be noted that this is not dissimilar to the references to "divine power" (60 uses – this equals 3.6 mentions in a 1000). The most frequent way 19th century authors speak of power is when they say "(no) power over". Huxley uses it thus:

> (…) it appears to me that the only person who has a *locus standi* to enforce these trusts is Booth himself, and that he would have absolute power over the trusts and the property. (Huxley, *Evolution and Ethics*: 1894)

This though is an exception, as "power over" rarely refers to money or politics. Instead, examples like "he had no power over her" are typical.

This state of affairs is mirrored in the 20th century literature. *Divine power* is here called *higher power* with, proportionally, the same frequency of usage. *Political power* appears to have turned into a taboo phrase – it appears but twice.[13] Semantically, the substitute here seems to be "real power" which, in the sense of *political power*, occurs eight times – less than four times in every 1000 and therefore, overall, less often than in 19C.

Almost all references to *power* are purely of an emotional kind[14] – while *labour power, productive power* or *state power*, the most frequent bigrams in Marx, do not exist.

3.1.3. Work

Table 7 shows that references in literature to employment are, overall, few in number – this stands in sharp contrast to what can be found in Marx's writings. The one exception seems to be the term *work*. However, references to employment – *worker, machinery* or *employed* – are diminutive in their number. These uses will be investigated in detail below.

Table 7
Frequency of WORK related words in the three text corpora. Occurrences per million words (p/m) in brackets.[15]

	EMPLOYED	FACTORY	LABOUR	MACHINERY	UNION	WORK	WORKER	WORKING
MC	785 (579.2 p/m)	496 (346.0)	7,714 (5,691.7)	690 (475.1)	62 (45.7)	1,399 (103.2)	274 (202.1)	1,778 (131.2)
19C	4,391[2] (92.8 p/m)	430 (9.0)	3,722 (78.6)	1,081 (22.8)	2,594 (54.8)	27,096 (572.7)	206 (4.3)	3,917 (79.9)
BNC	228 (13.4 p/m)	584 (34.5)	366 (21.9)	174 (10.4)	381 (22.1)	8,749 (525.1)	195 (11.7)	2,942 (181.0)

3.1.3.1. Factory. This typical place of work is mentioned only 430 times in the 500 texts of the 19C corpus. Tellingly, the most frequent bigram denoting workers is "factory girl/s", appearing in seven of every 100 mentions of the word *factory*. This is followed by talking about "factory hands / people" (over five in 100); less frequent still is "factory work" (just over two in 100).

[13] See Partington (2014) for such absences.

[14] This type of power is different: it is not an abstract relation but a (mechanical) force, hence there are frequent mentions to "horse power", which is more than twice as frequent than "human power". None of these find any mention in the 20th century, where the reader sees "power station" over 26 times in 1000 mentions of *power* – and these include references to nuclear power.

[15] "Employed" does not necessarily refer to people in paid employment but has a less specific sense. Even the phrase "he is/was employed", more often than not, does not refer to paid work.

In 19C, *factory chimneys* and the *factory bell* are described, yet BNC-F gives prominence to the *factory whistle* and the *factory floor*. "Factory girls" are only mentioned twice in BNC-F – apparently a term less relevant today. Similarly, amongst the 584 occurrences of *factory* there are only three "factory workers" – easily outnumbered by four "factory managers" – a clear indication of where the proletariat is situated by the few writers who bother to mention *factories*. There are four instances of "factory work", yet ten (or 1.7 per 100) of "factory floor". This can be read as an indication that the *factory* has become a mere stage for action to take place, not something that is directly linked to labour and production. It must be always kept in mind, however, that the total number of occurrences is minuscule – well below 0.01 per cent.

3.1.3.2. Labour. A word that is particular to the Victorian literature sources is *labour*. While overall infrequent, there are a small number of occurrences where *labour* is closely linked to socio-economic terminology ("skilled labour", "productive labour": "labour market", "labour and capital") also found in textbooks as Table 8 demonstrates:

Table 8
Frequency of *labour* bigrams and key trigrams in 19C.

Word followed by LABOUR	N	in 1000 / *labour*	LABOUR followed by:	N	in 1000 / *labour*
HARD	111	30	MARKET	15	4
GREAT	49	13	COMPANY	14	4
MANUAL	47	12	MOVEMENT	11	3
HAND	4	1	LOST	16	4
HUMAN	21	5	REQUIRED	7	2
SLAVE	10	3	WITHOUT	8	2
FORCED	20	5	AND CAPITAL	7	2
FIELD	16	4	AGAINST CAPITAL	4	1
SKILLED	11	3			
MECHANICAL	7	2			
PRODUCTIVE	8	2			
SAVE	6	1			
FREE	10	3			
CHEAP	8	2			
WITHOUT	23	6			
PRODUCE OF THEIR	8	2			

However, total numbers are low. "Hard labour" refers to punishment in half of the cases. By contrast "great labour" tends to mean hard, physical work. "Manual labour" can cover everything – from the life of a monk to the "unskilled manual labour" of miners. The one interesting bigram here is "labour market" – which can appear in a rather didactic sounding description in the novel by Thomas Hughes:

> Here too emigration had not set in to thin the labour market; wages were falling, and prices rising; the corn law struggle was better understood and far keener than in the country; and Chartism was gaining force every day. (Hughes, *Tom Brown at Oxford*: 1861)

The usage patterns of *labour* appear noticeably different 100 years later. The first and most frequent bigram for *labour* in the BNC-F is *Labour Party* and related terms like *Labour government* / *leader* or *voted Labour*. The total numbers are, again, diminishingly small:

Hard labour mostly refers to judicial sentences, and only seven times refers to actual work.[16] As pointed out above, Table 9 gives an indication of what wording is used with *labour*. It also indicates what wording has been retained ("hard labour";

Table 9
Frequency of *labour* bigrams in BNC-F.

Word followed by LABOUR	N	in 1000 / *labour*	LABOUR followed by:	N	in 1000 / *labour*
HARD	19	52	PARTY	28	74
CORRECTIONAL	7	19	GOVERNMENT	9	24
MANUAL	4	11	LEADER	3	8
LOCAL	5	13	MOVEMENT	2	5
PHYSICAL	4	11	POWER	2	5
SLAVE	6	16	MARKET	2	5
FORCED	4	11	RELATIONS	2	5
CASUAL	2	5	EXCHANGE	2	5
SUFFICIENT	2	5	FORCE	7	19
CHEAP	2	5	SAVING	7	19
UNPAID	2	5	INTENSIVE	5	13
VOTED	3	8	CAMP/S	10	26
BACK-BREAKING	2	5			

[16] Thrice it refers to *giving birth*.

"slave labour"; "labour movement") but all of these are far too infrequent to use these figures to compare them to the 19C data. Both sets of data also make reference to "intellectual" or "literary" labour.

3.1.3.3. Work. Engels (1844) described how proletarians had created their reading rooms and libraries which contained works that no bourgeois library had and which, according to Engels, was seen as "dangerous to the bourgeoisie" who, with the establishment of *Mechanics Institutes* had already managed to bend one facility for the proletariat away from radical readings and towards the natural sciences (cf. Engels: 1844). The corpus of books investigated here seem to support such a sentiment.

Despite the high headline frequencies, *work* in literature presents something that is not directly linked to labour and production in either 19C or BNC-F. There are relatively few examples of the actual task of working for one's living. Thus, Table 10 gives clear indication of a main concern in literary fiction in 19C, namely that some of "great work" and all of "work entitled" appear to be simply self-referential.[17]

Table 10
Frequency of *work* bigrams in 19C.

Description	THE WORK	HARD WORK	DAY'S WORK	GREAT WORK	GOOD WORK	LITTLE WORK	WORK HARD	WORK ENTITLED
N occurrences	4516	316	293	282	186	121	87	98
In 1000 / *work*	161	12	11	10	7	4	3	4

Table 11
Frequency of *work* trigrams in 19C.

Description	DOING/–/WORK	SET TO WORK	WORK OF ART
N occurrences	118	293	119
In 1000 / *work*	4	11	4

Similarly, both "hard work" and "little work" frequently refer to books. Consequently, only the highlighted sections of the table refer to the act of working itself, with *the work* encompassing all the various semantic meanings of "work".

Again, the trigram "work of art" found in 19C (see Table 11) hints at middle-class sentiments and "done/-/work" can often refer to religious works. This is set against the phrases "doing/-/work" and "set to work" which are rather low in frequency and do refer to work as employment.

On the surface, Table 12 highlights how little seems to have changed between the two sets of texts. Yet a detailed investigation of concordance lines shows that there has been a shift that indicates that *work,* in the BNC-F, usually refers to employment. Thus, "the work" always refers to paid work as does "day's work"; so does the newly coined (compared to the 19C), "find work". Both "hard work" and "work hard" can also refer to mental processes. The notion of "good work" can refer to the quality of work as well as to being charitable as these two examples testify: "We earn our wages here. We work in the Factory, good work is done here" or "[h]e talked about his father's religious views, and the good work he did". Both "can work" and "dirty work", by contrast, are mostly employed in a metaphorical sense. Finally, "work together" seems to be a modern notion – it occurs only twice in every 1000 mentions in 19C, significantly less than in the BNC-F. And it is only in the latter that it mostly refers to co-operation within a work environment.

Table 12
Frequency of *work* bigrams in BNC-F.

Description	THE WORK	HARD WORK	DAY'S WORK	GOOD WORK	CAN WORK	DIRTY WORK	FIND WORK	WORK HARD	WORK TOGETHER
N occurrences	575	175	77	50	57	31	38	69	45
In 1000 / *work*	65	20	9	6	6	4	4	7	5

3.1.3.4. Working. Unlike the previous lemma, this word provides a rich seam to explore when investigating the processes and people involved in labour, as Tables 13 and 14 highlight.

Table 13
Frequency of *working* bigrams in 19C.

WORKING -	CLASSES	CLASS	PEOPLE	MEN	MAN	HARD	TOGETHER	POWER
N occurrences	137	55	105	158	127	35/109[18]	18	14
In 1000 / *working*	35	14	27	39	34	9/28	6	4

[17] *Work entitled* (followed by book title). There are also 60 instances of "literary work" – 2 per 1000 uses of *work*.
[18] *Hard work* – 35; *working hard* – 109.

Table 14
Frequency of *working* bigrams in BNC-F.

WORKING -	CLASSES	CLASS	PEOPLE	MAN	DAY	HARD[19]	TOGETHER	LIFE	WEEK/HOURS
N occurrences	13	83	16	19	28	32	41	27	13/13
In 1000 / *working*	4	30	5	6	8	9	14	8	4/4

We find the same phrases occur in both the 19th and the 20th century corpora – yet the relative frequencies are different. In 19C "the working classes" is the fourth-most frequent trigram amongst the uses of *working*, with "the working people" ranking seventh. By contrast, "the working class" ranks 13th in the BNC-C equivalent. The notion of a "working life" or "working hours" appear to have become more important in the 20th century: they are, proportionally, twice as frequent than in 19C, where these phrases are rare.

Investigating 19C data in detail, the tone towards the "working classes" can be constructed as patronising. Moreover, in almost all books, readers find that the "working classes" merely appear as passive recipients of aid. Similarly, "the working class" is not an active agent but the phrase is simply being used for descriptive purposes, like "the chief food of the working class is rice" or "working-class people rest on bare boards". Slightly different is the use of "working people", which seems to be a reference to a far larger body of the population. There is also a discernible difference in the finer prosodies expressed by saying "working man" in contrast to "working men". The latter seems general and tends to be used to describe a group of people by an outside observer: "…and left the longsuffering and industrious working men of England and Scotland to wait indefinitely for all the good things they want." Similarly, "…and I returned to meet the English working men who arrived an hour later. Splendid it was to hear the six hundred miners".

This, though it is in sympathy with these men, appears to be descriptive rather than involved. There are examples of looking down at this group of people as well: "… their peculiar way of enjoying themselves. My little friend described the action of our working men in the croquet lawn as 'spooning'…". However, overall, the reference to "working men" is linked with positive connotations: *admirable*, *clever, hardworking, honest, industrious, intelligent, shrewd, thoughtful* are pre-modifying adjectives here. They are *voters* and you can find them as *electors*; they are found in *committees, clubs* and *unions*. By contrast, the "working man", while linked to similar words, presents also a large proportion of words with negative connotations: *apathy, cheaper (tickets), coarse-handed, error, hard realities, humble, low, poor, thick-set, trampled (upon). Looking at "hard working" and "working hard", these usually refer* to actual labour and can be seen as being judged positively. Lastly, it must be pointed out that "working together", in nearly 1/3 of cases, refers to a metaphorically transposed meaning, rather than talking about people working in a pair or a team.

Table 14 shows that the core terminology is retained in the 20th century. Though *working* is proportionally more frequent, the numbers for these bigrams are significantly lower, with "working class" having become almost the exclusive descriptor and "working together" being more prominent. In the BNC-F half the uses of "working classes" carry negative references in the same sentence; with the singular form "working class", however, this is less than a quarter. Yet "working class" in 20th century literature is often not about work or even a life-style: it refers to places ("a girls school, predominantly working class, in Elephant and Castle"; "the little working-class backstreet") or a way to identify somebody by background or family ("his working-class parents"; "last year Algy lived with a working-class architect"; "he was working class by origin" "it's the young, working-class housewife who suffers"). Even the "working man" remains mostly the object of a distant description though there is one (!) reference to being a miner. "Working hard" appears, in over half of its uses, as a metaphor, which is unlike the instances of "working so/too/very hard" which are the one set of descriptions using "working" exclusively to refer to employment. Unlike the variety of uses for "working together" seen in 19C, in the BNC-F it exclusively refers to two people (never more than that though) working with one another.

4. Did Marx's ideas have any impact on the wording found when comparing 20th century novels with 19th century novels?

In this section, keeping strictly to the words used in Marx's writings, an analysis is undertaken to see if any of the concepts important to the philosopher have actually entered the lexicon of novel writers.

In order to look at how far any such differences between 19th and 20th century literature can be detected, several keyword analyses were undertaken. As literature is definitely a different genre from the historical-economic writings of Karl Marx, it is unsurprising that the main issues, visible through the choice of lexis are unmistakably different across genres.

It is more important for this section, however, to see whether any of the words that Marx has used to describe the state of the working classes also occur – and to what degree – in works of fiction in the 19th and 20th century.

[19] Working very/too/extremely/so/jolly hard: 44 occurrences (15 in every 1000).

Table 15
Frequencies of common work-related words.[20]

Key word	Marx Freq.	Marx %	19C. Freq.	BNC-F Freq.
LABOUR	7714	0.56	3722	366
PRICE	2933	0.21	3453	681
POWER	2278	0.16	16411/0.03%	2185/0.01%
WORKING	1778	0.13	3917	2942/0.02%
WAGES	1668	0.12	1249	192
INDIVIDUAL	1257	0.09	3338	323
PROPERTY	874	0.06	5256/0.01%	544
EMPLOYED	785	0.06	4391	228
WEALTH	724	0.05	2831	274
MACHINERY	690	0.05	1081	174
PURCHASE	518	0.04	1540	142
FACTORY	496	0.04	430	589

Table 15 shows that fairly common words that refer to the world of work do occur in works of fiction – yet the raw numbers are comparatively low. Apart from the word *power* Marx's keywords appear less frequent than once in a 1000 words in both fiction corpora.

The numbers do reveal a shift as well: both references to *power* and to *property* are a lot more frequent in the Victorian fiction material than in the material of 20th century fiction. This is in contrast to the idea of *working* which appears twenty times in every 1000 in BNC-F. This, however, is still significantly lower than the use in Marx (130 times in 1000). Overall, this indicates that writers make reference to these concepts – yet the use of these particular words is rather marginal.

Table 16
Nouns prominent in Marx's writing that are extremely infrequent in the literature corpora.[21]

Key word (N)	Marx Freq.	p/m	19C. Freq.	p/m	BNC-F Freq.	p/m
COMMODITIES	4129	3046.5	173	3.6	13	0.7
CAPITALIST	2824	2083.6	76	1.6	46	2.7
TURNOVER	504	371.8	2	0.05	22	1.3
BOURGEOISIE	386	248.8	17	0.3	15	0.9
SUBSISTENCE	368	271.5	375	7.9	4	0.2
PRODUCTIVITY	323	238.3	3	0.05	12	0.6
EXPLOITATION	278	205.1	6	0.1	18	1.0
PROLETARIAT	259	191.1	5	0.1	8	0.4
PRODUCER	248	182.9	29	0.6	0	0.0
PRODUCTIVENESS	228	168.2	35	0.7	23	1.3
OUTPUT	159	117.3	12	0.2	37	2.2

Table 16 reflects the kind of words that would be seen as typical for the topics Marx wrote about. Given that the BNC-C is over ten times larger and the 19C corpus nearly 40 times larger, the frequencies found for these words are minuscule – though they do reflect that *commodities* and *subsistence* were a more relevant topic in the 19th Century. By contrast, *productivity, exploitation* and *productiveness* get more frequent mentions in the 20th century literature. Yet even then the numbers are extremely low.

Table 17
The 12 most highly key nouns in Marx's books compared to 19th and 20th century fiction.

N	Marx vs. 19C					Marx vs. BNC-F		
	Key word (N)	Marx Freq.	Marx %	19C. Freq.	19C. %	Key word	BNC-F Freq.	BNC-F %
1	CAPITAL	11736	0.85	3153	0.00666	CAPITAL	357	0.00214
3	VALUE	10397	0.75	4753	0.01004	VALUE	476	0.00285
4	PRODUCTION	6921	0.50	1241	0.00300	LABOUR	366	0.00219
5	LABOUR	7714	0.56	3722	0.00786	PRODUCTION	249	0.00149
6	COMMODITIES	4129	0.30	173	0.00036	COMMODITIES	13	0.00007
7	COMMODITY	3451	0.25	137	0.00028	MONEY	5687	0.03411
8	SURPLUS	3414	0.25	186	0.00041	COMMODITY	45	0.00027
9	MONEY	6584	0.47	12773	0.02679	SURPLUS	45	0.00027
10	CAPITALIST	2824	0.20	76	0.00017	FORM	1317	0.00790
11	CIRCULATION	2999	0.22	677	0.00143	CIRCULATION	54	0.00032
12	PROFIT	2800	0.20	1205	0.00254	CAPITALIST	46	0.00027

[20] All of these words are key in Marx's writings compared to the two reference corpora. Figures have only percentages added if they occur more in more than 0.01% of the total word count.

[21] *Relative occurrence* has been calculated as the number of occurrences of each item per one million words (p/m).

When it comes to the most prominent words in Marx's writing, a keyword list identifies highly frequent words and looks at which of these are comparatively underused (and to what degree) in any comparator corpus. In other words: the concept of 'keyness' refers a form of statistical test to indicate those words that can be expected, all things being equal, to be a lot more frequent in the comparator data. These 'keywords' are shown in Table 17 below. Selecting just nouns, those words found highly key in Marx's writings compared to the 19th century as well as the 20th century British fiction are shown.

Table 17 can only give a first impression. Using a log-likelihood statistical test to find keywords, these are the nouns found far more often in Marx's texts than in the two corpora of fiction. It can be seen that all these words appear, proportionally, 100–1000 times less frequently. Table 17 also hints at the fact that very little has changed in the usage of these words between 19th and 20th century fiction. In fact, looking at the 100 most frequent key nouns, the difference found in keyness is minimal – there are fewer than 5 words where the BNC-F data diverges from the Victorian novels data.

At this point, it might be relevant to recall what Fairclough wrote in relation to language and society:

> […] language is part of society, and not somehow external to it (…) language is a socially conditioned process (…) language is part of society; linguistic phenomena *are* social phenomena of a special sort. (Fairclough, 2001: 18f.)

Admittedly, to just look at keyness for words – in particular keyness between two different genres of text – is a very blunt tool. And yet the concepts Marx wrote most frequently about seem to have not merged into the common lexicon. One could have expected that the very words Marx used for fundamental concepts of political economy and the capitalist labour process might have seeped into general language use enough to be reflected in works of fiction, thus giving the social conditioning process a tilt towards greater economic literateness. Based on the analysis presented here, however, this does not seem to be the case.

5. Conclusions

We have now reached 200 years since the Karl Marx was born. In his name, a world-view, an ideology, a whole empire rose and fell in the course of the 20th Century. Yet, when we look at British literature, there appear to be only very few texts that arguably show clear influence of his writings. This article has shown how corpus linguistic tools can be used to provide a broader picture of ideologies and how they are accurately represented in lexical choices.

While a variety of words connected to the world of work and to (economic) power relations do, indeed, appear in literary works, these tend to be found at rather low frequencies. Where they do occur in sufficient numbers, the actual usage and context reveal that these words are not necessarily used in a way that can be construed as sympathetic to the cause of the working classes. Thus, references to factories or work are minimal with *working* mainly referring to items that are functioning. The political class of workers appears marginalized – the terms *working class/s* are used not for active agents but as a more general descriptor. In the BNC-F and, even more so, the 19C corpus, the *middle classes* are given priority in their descriptions and are generally placed in a more positive light.

Poor is a special case. This investigation found material to support Fitzpatrick's (2005) thesis that Victorian novelists preferred sentimentality to concrete action to eradicate poverty.

The one area where a reader might find the daily lives of fictional characters to be rather underrepresented is the issue of *money. Wealth, capital* or *profit* are all scarcely mentioned and the ownership of property is barely addressed. This, keeping the ideas of Marx and Engels in mind, can be interpreted as a lack of insight by generations of writers. Basic tenants of capitalism seem to be taken for granted – therefore they are not deemed to be worth a mention.

References to *money*, *being paid* or *pay*, however, are often found with negative connotations and prosodies: the difficulty to pay or having financial difficulties. Still, these are hardly ever addressed as problems arising from ownership structures – books in both centuries frequently make reference to gambling, thus directing blame for being impoverished to personal failings but not (see above) the economic superstructure.

An important point that this research highlights is that the 20th century writings seem to reflect a turn to better economic well-being (see *money)*, greater co-operation and less gender-bias (see *working*). There are more mentions of *factories*, *work* (i.e. not literary works) and the *Labour Party* found here. At the same time, there appears to be less exposure to issues connected to *power* or *ownership* compared to the 19th century; moreover, attitudes to poverty look unchanged, though markedly less often mentioned.

The world of work forms a significant part of most people's lives. However, in all the literary works reviewed, references to places of work (such as to factories) or work undertaken are minimal. Likewise, the political class of workers appear marginalized – the terms working class/es are used not for active agents but as a group of people described as non-working class people. Instead, this research reveals that the writers are mostly concerned with their own class – the middle class. This is demonstrated through references to *property*, which has less to do with the ownership of the means of production (factories, mines) but with typical middle-class possessions: owning a house, books, works of art. There is little evidence that the main concerns raised in Marx' writings influenced writers in the 20th century. A possible reason for this could be that, in defiance to the predictions of Marx and Engels', the lives of those who sold their labour did not become harsher. On the contrary, BNC-F data shows that there were fewer worries and more wealth in the lives of fictional characters in the 20th century.

Overall, the works of fiction investigated indicate that there has been little influence by Marx found in the writing. The focus on middle class concerns can be seen reflective of both the writers and their reading public. It might be a point of contention whether conditions have improved due to the influence of Marx on the Labour movement and subsequent politics: yet, the literature suggests that improvements can, indeed, be seen.

Appendix A. Supplementary data

Supplementary data related to this article can be found at https://doi.org/10.1016/j.langsci.2018.07.005.

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