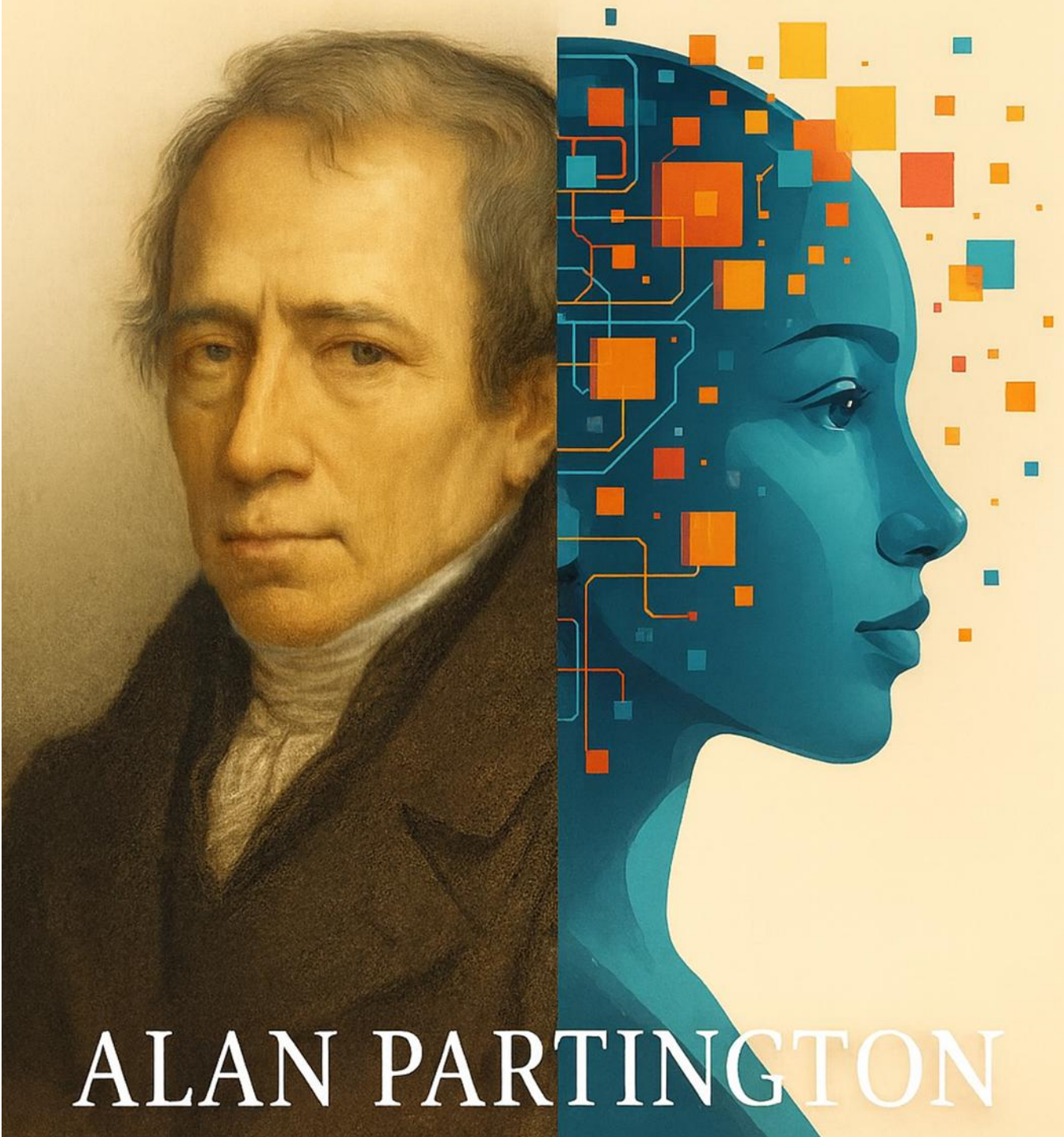


A SHORT HISTORY OF THE PHILOSOPHIES OF LANGUAGE UNDERPINNING (AND OPPOSING) CORPUS LINGUISTICS

FROM ARISTOTLE TO ARTIFICIAL INTELLIGENCE



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Alan Partington

Ferrara, 2025

A Note on Publication

This Essay has been published independently rather than through a mainstream academic press. The decision was deliberate.

First, I am ideologically committed to free and open downloadable access: knowledge should be available to all potential readers and not at exorbitant prices.

Second, time matters. Traditional academic publishing typically takes years between submission and release; this volume was completed and made public in a matter of months — a pace that reflects how scholarship can and should respond to current debates.

Third, I enjoyed complete editorial independence, allowing me to express *my* ideas rather than those the notorious ‘Reviewer #2’ wishes to impose.

Fourth, a considerable benefit of publishing on-line with Zenodo (financed by the European Commission) is the possibility it provides of updating one’s work whenever one might have a fresh idea or new research to add.

Finally, this project embodies a new kind of collaborative scholarship. Large Language Models (LLMs) were used here as analytical partners — tools for reflection, synthesis, and stylistic precision. I believe that in ten years such collaboration will be as routine, and as uncontroversial, as consulting past literature, corpora, or the Web — always with due caution, critical distance, and common sense.

I dedicate this book with love to my grandson, Alessandro.

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0 Introduction

‘In 1962, when I was in the early stages of collecting the [Brown Corpus], I met [a renowned Professor]¹ at a linguistics conference. In response to his query about my current interests, I said that I had a grant from the U.S Office of Education to compile a million-word corpus of present-day American English for computer use. He looked at me in amazement and asked, ‘Why in the world are you doing that?’ I said something about finding the true facts about English grammar. I have never forgotten his reply: ‘That is a complete waste of your time and the government’s money. You are a native speaker of English; in ten minutes you can produce more illustrations of any point in English grammar than you will find in many millions of words of random text’

(Nelson Francis, 1982: 7)

Some time ago Stubbs (2006) drew attention to a certain dissonance among corpus linguists in coming up with a definition, a vision, of precisely what they were engaged in. In a seminal follow-up piece, Taylor (2008) asked the question ‘what is corpus linguistics?’ (CL) and shifting through writings of corpus linguists themselves, she found it variously described as a methodology, a paradigm, a discipline, a theoretical approach, even (denoting a certain early enthusiasm) a new theory. Not a new *theory*, of course, but CL has allowed a great deal of new epistemological insights to be made or inferred about the nature of language(s) and their ever fluid constituent parts, discourse types.

The one thing we *can* be sure of is that CL is an epiphenomenon of a machine, the computer. But this should not worry us unduly: your wedding album is an epiphenomenon of the camera, Mucha’s sublime prints are an epiphenomenon of

¹ We have omitted the name to spare the individual’s blushes.

colour lithography but they are both none the less real for this; your wedding still happened and Mucha did draw his lines and curves. What we wish to do in this essay is trace the *intellectual* roots of CL (see also McEnery and Brezina 2022, which largely inspired this long essay) though these cannot be entirely separated from its technological origins - to map the philosophies of language which made the study of large collections of authentic texts fertile terrain for linguistics, since we often forget how recent such an idea this is. And also give due attention to the resistance such philosophies have come up against. In fact, this long essay is not a history of philosophies of language *per se*, an additional guiding thread of the project is the waxing and waning of philosophical regard for language.



Réverie (1897). Alphonse Mucha's reproducible prints were the product of the complex process of colour or chromo-lithography.²

² https://arthive.com/techniques/color_lithograph

The genesis of this Essay

This discussion grows from two long-standing puzzles I encountered during 40 years of teaching rhetoric (aka evaluation and persuasion) in the Political Sciences. Firstly the extraordinary oscillation between enthusiasm for and suspicion of language across Western philosophy, with Aristotle's view of language as a practical tool for social action, and Plato's contrasting suspicion of words as unreliable shadows of truth, (and not just Western: see both Pāṇini's and the Confucians' fear of language evolution as corruption). In short, sometimes language is seen as the very key to thought (Aristotle, the Stoics, Wittgenstein Mk.2 [*Philosophical Investigations*], Halliday, Sinclair). At other times, it is seen as an obstacle, a trap, even a peril (Plato, Kant, Nietzsche).

We might add that two shibboleths distinguishing the pessimistic purists from the optimistic realists are metaphor and their accompanying evaluative meaning. The latter see metaphor and evaluation as a distortion of truth ('Juliet is the Sun' fails all truth tests), a view reaching back to Plato, re-emerging in Locke, and exploding in Nietzsche. The former see metaphor and evaluation as enabling new thoughts to evolve (Aristotle, Humboldt, Lakoff and Johnson [1980]). This is evident even in the ascetic modern language of science, itself a collection of metaphors: complex ideas rendered in concrete forms, from Newton's gravity as *attraction*, to genetic *code* and *mapping* the genome (good: ordered, intelligible), the information *highway* (good, quick, convenient); *war on cancer* (war on [cancer]) an embedded evaluation (Partington 2107, 2025) overall positive. In brief, metaphor and evaluation divide those who wish to purify thought from those who wish to expand it — the difference between guarding truth and growing it. We shall see later how these two duelling sides have fared in 21st Century language philosophy, technical innovations and use.

The second conundrum was the rather shocking realisation of the long periods in which philosophy seemed to be perfectly happy to ignore language and linguistics

altogether, despite it being the very tool of their trade. Sometimes it is treated as beneath philosophy altogether — left to the ‘mere’ rhetoricians, philologists, grammarians, dialectologists, historians of language and latterly, even linguists.³

0.2 Acquiring a few ‘dos’ and ‘don’ts’

Over time CL has certainly acquired many methodologies and investigative techniques of its own. It has acquired many of the trappings of a discipline, a jargon of its own, ways of asking questions of and about a corpus, and even a set of ‘dos’ and ‘don’ts’, e.g. do not employ so-called ‘invented’ examples of language use unless you positively have to.

In order to answer such an ontological question as ‘what is corpus linguistics?’⁴ we would also have to ask ourselves, what is a corpus? Is it a tool, an instrument, a mirror, a linguistic trace? My own pick would be a corpus is a para-representation of language, certainly not the real thing, language, and if a trace left by language (or rather a discourse-type of a language) a somewhat distorted one. A corpus is not only a representation of the subset of language it has been chosen to illustrate, but is an entity which can be reordered, reconfigured, reconstituted. Corpus-assisted Discourse Studies (CaDS) in particular, which shunts back and forth between quantitative and qualitative approaches, contextualises, decontextualises and recontextualises language performance in a variety of ways according to research aims (CaDS is very generally Research Question-driven). Traditional discourse analysis

³ The 1056-page *Oxford Companion to Philosophy* (2005). Honderich (ed.) finds no space for Sinclair, or Halliday or Firth and even W.von Humboldt is liquidated in a few lines as a philologist.

⁴ Ontology is often glossed as ‘the identification and study of what exists’ (and by implication what does not). It necessarily goes on to study the actual nature of what exists (or is imagined to). For example a social scientist might ask the ontological questions of ‘how many social classes exist and how are they defined’. In the present case, given corpus linguistics exists, what is its exact nature? For much of history the overwhelming ontological question was: does God /do Gods exist and what is their true nature? Epistemology instead usually (unsatisfactorily) gets defined as ‘the study of knowledge’; a definition best extended as ‘how do we do we get to acquire knowledge of (the nature of) something’. Questions of methodological approaches in CL are epistemological questions. Clearly ontology and epistemology overlap. If we posit the existence of God (ontology) how can we acquire the knowledge to prove it (epistemology: see Section 4.4 on Thomas Aquinas and the Thomists).

treats the data-set as existing in a single almost God-given format. But using corpus linguistics tools, just as in many modern sciences, the data-set is re-shuffled, re-presented and even re-created (by analogy, think of how astronomy combines naked eye astronomy, the optical telescope, the radio telescope, mathematical [quantum] astronomy). As Stubbs (1996: 92) puts it: 'you cannot understand the world just by looking at it' (i.e., in just one way).

However, these are not the principle questions we wish to address here. Instead of the current ontological status of CL we are interested in its philosophical underpinnings. If a methodological discipline or paradigm, it is certainly a relative babe-in-arms. The Brown corpus (Nelson Francis 1982) was compiled in the 1960s, the LOB corpus (Garside and Leech 1982) in the following decade. But the creature they were creating, CL, rests on a set of epistemological tenets which are not only ancient but are still not entirely uncontested. Some of these have been explicitly discussed in the literature, such as: does 'counting' (frequency) really trump intuition every time (Widdowson 1998)? Proponents stress the value of the study of so-called 'authentic' language data, that is naturally occurring, as produced by real speakers or writers in real communicative situations, rather than invented, idealised, or artificially constructed data which has been invented by the researcher for the occasion to illustrate a point (often the unavoidable practice before the advent of corpora) (McEnery and Hardie 2012: 2). But critics of corpus-use point out that examples may be authentic in one way but they are unauthentic in often being stripped of their communicative context and appear with only a fragment of co-text (what counts as 'enough co-text?'). Stubbs (1996) admits that corpus-use is strong on revealing patterns but weak on the local, interactional details studied by ethnomethodology or conversation analysis. Indeed, the practice of using authentic language material still mystifies practitioners in certain other branches of linguistics (usually heavily influenced by Chomskianism), such as some forms of cognitive linguistics where

‘usage-based’ is a relatively novel concept (Desagulier and Monneret 2023). Nor is the value of being able to examine a large quantity of data, as Sinclair’s most famous dictum has it: ‘[t]he language looks rather different when you look at a lot of it at once’ (1991: 100), far from universally acknowledged. Unless you have personal experience of using corpora this sounds more like an unproven axiom than a conclusion. Another criticism is of the limited empiricism of CL. It values observation extremely highly, but Baconian experimentation – explicit hypothesis testing – is not always evident. McEnery and Hardie (2012:12) concede that CL is ‘primarily an observational, not an experimental, science’, noting that experiments (e.g. psycholinguistic priming, production tasks) tend to be complementary rather than central.

Nor is another of the virtues of CL, the vast increase in the possibility of serendipitous findings not envisaged at the outset of the research, universally appreciated, especially if the whole purpose of a project is (despite Popper’s injunctions) to collect evidence to prove an initial hypothesis (or agenda). And finally, the ‘renowned Professor’ who criticised the Brown Corpus project (see epigraph) could never have grasped the truth of Firth’s equally famous dictum ‘You shall know a word by the company it keeps’ (1968), his astonished – and traditional – response would have been: ‘You are a native speaker of the language. On a moment’s reflection you will already know the company the word keeps’.

Moreover, traditionally, if authentic language ever *was* studied for, very usually, compiling dictionaries or grammars, it was exclusively the language interaction or messages of *prestigious* writers or speakers (the ‘fallen’ non-prestige varieties were the realm of dialectology). One might even suspect that the tradition of mistrust of language as a means of thought or communication in some strains of philosophy of language (for example, Plato’s as we shall see in Chapter1) stemmed from the fact that the *hoi polloi* also used it (though not as brilliantly, obviously). Even Pāṇini’s

celebrated descriptive work on Sanskrit was performed in order to preserve the elite form of the language from any change (which he felt was synonymous with decay).

Indeed one of the principle themes of this essay is the tension within philosophy of the desire to accurately describe language and the uses to which it can be put and the Platonic and post-Platonic mistrust of language in general and rhetoric in particular.

We begin then by examining some of the contrasting philosophical stances on language, especially those of Aristotle and Plato, In the following chapters, we trace how these ancient ideas were taken up — or cast aside — in Stoicism, Scholastic argument, through medieval metaphysics to the 20th Century revival of the philosophy of language (and the controversies which still surround the validity of CL research) and end with a reflection of the connections, if any, between CL and AI's so-called Large Language Models (LLMs).

0.3 Rationale and sources for this Essay

I hope this Essay will be read in the same spirit with which it was written (that its perlocutionary effect matches the illocutionary intent), as an experiment. I have no special qualifications in Philosophy (with a capital) and no pretensions of being a professional Philosopher, but I do have some experience of being a linguist, including too many years to count of teaching 'rhetoric' from Aristotle to Corpus-assisted Discourse Studies.

And this is one of the unanswered questions this Essay raises, at some points in intellectual history philosophy seems to have almost disowned the branch of philosophy or maybe better *thinking* which is concerned with language and communication, despite it being the one tool necessary for all philosophy to happen. Somehow, on occasion, 'philology', 'dialectology', historical linguistics, indeed all linguistics got fenced off - and out of - 'pure' philosophy, whatever that might be. Even in current works (see the paragraph below on sources) linguistics does not get a

fair shake. Though we are in good company, neither do other current branches of science (known as natural philosophy until the 19th Century, when another fence was built). Surely the ‘thinking’ of the likes Darwin, Einstein, Bohr and their likes have had immense repercussion on philosophy, pure or otherwise? German still preserves the concept of *Wissenschaft*, literally ‘knowledgehood’, loosely ‘scholarship’.

So I reckon I am well versed in 20th/21st Century functional linguistics (especially discourse analysis pragmatics in the tradition of Aristotle, i.e. Goffman, Brown and Levinson, Stubbs), in the works of two of the most philosophical of British CL and discourse analysis, Sinclair and Hoey, and of the truly epistemologically revolutionary work by Hunston on evaluation. I have read the works, of other ‘heroes’ in this story, notably several works of Aristotle, Plato’s Dialogues, Popper on the Scientific Method and the later Wittgenstein on language as use. Apparent here is yet another unanswered question. Wittgenstein is very widely considered to be the most influential of all 20th Century Western philosophers, yet other thinkers on language, like Sinclair, Hoey and Hunston, do not merit mentions in many of the great tomes of modern philosophy. The likes of Austin, Firth, Halliday and even von Humboldt generally fail to receive the recognition and space they deserve.

But then in the spirit of total transparency, I come clean on having relied for any detailed information on many of the movements and figures discussed here on so-called secondary even tertiary sources. These include Honderich (ed.) the 1100 page *Oxford Companion to Philosophy*, Magee’s brief but wonderfully illustrated *History of Philosophy*, the on-line *Stanford Encyclopedia of Philosophy* and – the most exciting revelatory and humbling aspect of this whole experiment – the Large Language Module ChatGPT 5.1,⁵ and occasionally Copolit (see Unit 12 on working with modern

⁵ Owned by OpenAI. GPT stands for ‘Generative Pre-Trained Transformer’.

AI and what it can tell us about LLMs themselves, about CL/CaDS but also about our own human language acquisition and use).

There are many gaps, holes, *lacunae*, simplifications and indeed biases in this Essay. Nevertheless I wrote it (and have re-written it several times already) to ask questions I believe need asking.

0.4 Timeline: From Plato to Corpus Linguistics and CaDS

This timeline lists key philosophers, schools, and movements relevant to the history of language philosophy, leading up to the development of CL and CaDS. Some movements have a great deal to say about language, others practically nothing at all. Dates are approximate and indicative, not exhaustive. Figures are included not to suggest a 'great man' (sic) history,⁶ but to mark turning points in intellectual traditions.

c. 428 – 348 BCE – Plato

384 – 322 BCE – Aristotle

3rd – 1st c. BCE – Stoic philosophy (Chrysippus, Epictetus)

300 BCE – 200 CE Classical Schools of 'Sceptics' (Pyrrho of Elis, Sextus Empiricus)

c. 35–100 CE – Quintilian

c. 480–524 CE – Boethius (translations and commentaries of Aristotle and other Classical works into Latin directly from Greek, thus not passing through Syriac, Arabic or Aramaic); *On the Consolation of Philosophy* (523-524 CE)

9th–12th c. – Early Scholasticism

13th–14th c. – High Scholasticism (Aquinas, Ockham, Duns Scotus)

⁶ Until very recently women were 'gate-kept' out of 'philosophy'. The repercussions of this merit another in-depth study.

15th–16th c. – Renaissance Humanism (Valla, Erasmus, etc.)

1561–1626 – Francis Bacon and early empiricism

1596–1650 – Descartes and rationalism

17th c. – Leibniz, Locke, Hobbes

1724–1804 – Kant

late 18th–early 19th c. – German Idealism & Romanticism (Hegel, Herder, Humboldt)

19th c. – Historical-comparative philology (Bopp, Grimm, Schleicher)

1844–1900 – Nietzsche

1848–1925 – Frege

1873–1958 G.E. Moore

1872–1970 – Russell & early analytic philosophy

1921 – Wittgenstein I (*Tractatus*)

1920s–1930s – Prague School (Jakobson, Trubetzkoy,)

1953 – Wittgenstein II (*Philosophical Investigations*)

1960s–1980s – Halliday and Systemic Functional Linguistics

1980s–1990s – Institutional Corpus Linguistics (e.g. Brown, Bank of English, BNC)

Mid 1990s–present – Corpus-assisted Discourse Studies (CaDS)

0.5 Epilogue

Again, we must stress that ‘Philosophy’ and ‘Philosopher’ (capitalised) are hefty words, but also often vague, at times ambiguous, and at others frankly vacuous. And also by no means all the figures and schools treated in this short account would consider themselves to be philosophers (small ‘p’ in parallel with our assertion that

CL and CaDS are not philosophies in themselves, but emanations of philosophical thinking). Just as important as so-called 'pure' philosophers in CL thinking are philologists, grammarians, rhetoricians, language teachers and students, computing scientists; indeed, John Sinclair began his career as a discourse analysis (and remained such; the same can be said of Hoey, Hunston, Stubbs, among others). Perhaps the best terminology for 'language philosopher' is that chosen by Mike Scott in his obituary for Sinclair, namely, a pioneer and explorer of language, one who raises awareness of language.⁷ For us more lowly practitioners, a CL/CaDs project is a voyage of discovery, often replete with disappointments, just occasionally encountering a serendipitous 'well-I-never' which, without the machine's aid, would remain, to coin a phrase, 'invisible to the naked eye'. An act of wisdom expansion; so in our small way we are all voyagers and explorers too.

⁷ https://lexically.net/downloads/corpus_linguistics/Sinclair_obituary.pdf

Chapter 1: In the Beginning — Aristotle and His Fearful Antagonists

Every story has to have a beginning, and this story begins with Aristotle's 'The Art of Rhetoric' (2012; though in the next section we will describe the state of play of linguistic philosophies in other non-European cultures at roughly the same time).

1.1 Aristotle: The Art of Rhetoric

Aristotle's central idea concerning rhetoric is refreshingly modern: language is a tool. More precisely, it is a tool for persuasion — for influencing the beliefs and actions of others. Far from dismissing this as manipulation, Aristotle sees persuasion as the very lifeblood of human society, a pragmatic instrument of social interaction. He defines rhetoric as 'concerned with the modes of persuasion' (2012: 6), that is, rhetoric is not inherently moral or immoral. Like any tool, it depends on the hands that wield it.

1.1.1 *The three Modes of Persuasion*

1. *Ethos* – the speaker's projected character or credibility
2. *Pathos* – the appeal to emotions
3. *Logos* – the use logical argument and evidence

Of these three, *ethos* is the most important. Unless you can establish a positive *ethos*, a reason to be listened to, appeals to *pathos* and *logos* are lost in the wind. We must also always bear in mind that *pathos* and *logos* are rarely in real life separable (for instance, 'I'd love to invite you to dinner. I'll pay' – flattery and your saving money). In 20th Century linguistics, *ethos* has been revived under a new name: face — a concept borrowed by Goffman (1981) from everyday usage, for example 'saving face',

‘to lose face’, ‘face your parents’; it is the *persona* we wish to present to our interlocutor of the moment (not always successfully, we should add).

Partington (2006a) distinguishes between two different sorts of face, namely, competence face and affective face. We bolster our competence face by convincing others that we are capable, authoritative, and in control. Institutional settings such as media interviews are, of course, an area where much work directed at competence face can be expected. This is the kind of face that is compromised by error, oversight, or any kind of perceived inefficiency. Competence face, then, is also highly vulnerable to critical evaluation, questioning, even teasing. Political interviews and press briefings, when antagonistic rather than fawning, are especially interesting sites where the competence face of both politicians and journalists are at risk, need defending and bolstering (Partington 2003).

We reinforce our affective face, instead, by persuading our peers that we are, first of all, non-threatening, but also congenial and good to be around. The desire to appear non-threatening is, anthropologically, directly related to the aspiration to belong to the in-group and is thus normally expressed by trying to appear as similar in as many ways as possible to the other members, by the employment of humour, of storytelling, of advice, and so on.

However, a conundrum often arises in that the two forms of face are not always compatible in every occasion. It is often simply not possible to project a face, a *persona* of expert, an authority and at the same time remain just another affable pleasant member of the crowd, i.e. ‘a regular guy’ (a term from US politics). It is a socially-learned skill when to emphasise one at the temporary expense of the other, and some people learn the skill better than others.

1.1.2 Aristotle’s three examples of genres of rhetoric

1. Deliberative (future-oriented): persuasion about actions or policies — e.g. political speeches, campaign manifestos.
2. Forensic (past-oriented): argument about events already committed — e.g. legal cases, parliamentary inquiries.
3. Epideictic (present-oriented): language of praise or blame — This is perhaps less immediately recognisable to a modern audience. In Aristotle's Athens one could pay a professional orator to praise you in public and to denigrate an opponent. Today we might recognise it perhaps in wedding toasts, eulogies, and, of course, advertising slogans ('D*sh washes whiter').

Aristotle insists that language is always situational: its meaning and effect depend on the speaker, audience, occasion, and purpose. These are ideas that resonate deeply with modern discourse analysis, and they prefigure the work of Goffman, Brown and Levinson (1987) and indeed the entire field of pragmatics.

Language as persuasion, for Aristotle, is not confined to the political stage or the law courts. It suffuses everyday life. We try to persuade friends to go out with us, persuade bosses we are competent, persuade our children we are wise. Even these mundane moments involve balancing competence and affective face.

1.2 From Aristotle to Goffman and Levinson

Aristotle's insight into social persuasion prefigures two powerful distinctions in modern linguistic theory.

The first is Goffman's concept of talk, indeed, all social encounter as performance. Every conversation is a kind of stage, and every speaker performs the role they deem most fitting and put on the face they feel most profitable. We have a different face when talking to friends, our parents our teachers.

The second is Levinson's (1988) three-part model of speech production:

- The principal: those responsible for the message
- The author: those who composed it
- The animator: those who actually deliver it.

These roles are usually fused in casual speech, but in politics and advertising, they are often split. The Prime Minister's speechwriter is the author, the PM is the animator, and their party may be the principal. In advertising, none of the performers is the real principal of the message — which is why we should all be sceptical when celebrities or influencers are trying to sell us some moisturiser.



Metaphor in advertising (1964)

Principal: Esso Oil Company; Author: the advertising agency; Animator: the actor hired to speak the lines: <https://www.youtube.com/watch?v=kB5ROD4CGG8>

1.3 The state of play around the World

This section relies heavily of ChatGPT’s input. While Aristotle was sharpening his view of language as a practical tool, he was not alone. In other parts of the world, profound thinking on the nature of language was also taking place.

1.3.1 India: *The Sanskrit grammatical tradition*

Pāṇini (4th c. BC) was the author of the Aṣṭādhyāyī, a generative grammar of Sanskrit, including rules of syntax, morphology and phonology, with astonishing formal rigour. He anticipated modern linguistic theory in ways that are only now being fully appreciated. For example, Pāṇini did not invent Sanskrit grammar from any armchair first principles; he generalised over attested linguistic data — the Vedic corpus and spoken Sanskrit. His goal was coverage and predictive accuracy across all attested usage, a spirit very close to modern corpus linguistics’ concern with systematic description of real language rather than speculative universals (Kiparsky 2009).

Bhartrhari (5th c. AD) argued that meaning arises from the utterance as a whole (*sphoṭa*), not from individual words — a notion strikingly close to contemporary discourse semantics.

1.3.2 China: *The rectification of names*

Confucius (6th–5th c. BC): Believed that social harmony depended on linguistic accuracy — that things should be called by their proper names (*zhèngmíng*), a position even more extreme than Cratylus’s (see Section 1.3).

Zhuangzi and later Daoists pushed back against this rigidity, questioning whether language can ever truly capture reality — very similar to the school of scepticism, beginning with the Greeks and surviving to this day (in diverse forms, from post-Cartesian scepticism, Hume, theological semantic exegesis and scepticism. See Stroud [1984] for the arguments of a respectable modern philosophical sceptic).

1.3.3 Jewish Hermeneutics

The Talmudic tradition is rich in metalinguistic reflection, particularly through the interpretative strategies known as *midrash* — a set of exegetical techniques for uncovering deeper meanings in scriptural texts. These include close lexical scrutiny, intertextual linkage, and etymological analysis. In Rabbinic thought, language was not only a vessel for divine revelation but a space where human interpretative responsibility is exercised. Every word, indeed every letter of the Torah, is potentially significant. Silence, too, may speak volumes.

Names carry extraordinary weight, both morally and spiritually. The Hebrew Bible regularly links a person's character or destiny to their name (as in Abram/Abraham, Jacob/Israel), and Jewish hermeneutics treats these names not merely as labels but as windows into essence. Above all, the ineffable name of God — the *Tetragrammaton* (YHWH) — is treated with supreme caution: never spoken, only alluded to. This represents a unique intersection of theology and metalinguistic constraint, where the structure of the language itself is subject to divine reverence.

Jewish interpretative practice thus rests on the belief that language is not only meaningful but meaning-generative. Meaning is not simply decoded but constructed, dialogically, through scholarly interaction with the text. This aligns closely with modern views of discourse as co-constructed, layered, and context-sensitive — and stands as an early example of sustained attention to how language is, as is periodically maintained in philosophy, not simply a reflection or representation of experience but carries, mediates, and even creates meaning.

1.3.4 Persian and Islamic philosophers

Aristotelian and Platonic philosophies were kept alive in the Islamic world, mainly through the translations of their works into Arabic by Greek-speaking Christian monks, in the windows of times and places where pre-Islamic thought was tolerated and

studied. Some early Muslim thinkers, like the Persian Avicenna (Ibn Sina; 10th Century) were – like many Christian philosophers – heavily influenced by Platonic idealism and dualism (Plato’s ‘unblemished ideal’ versus the ‘flawed mundane’ became in theology the heavenly versus the earthly). The Andalusian Averroes (Ibn Rushd; 12th Century) wrote extensive commentaries in Arabic on Aristotle’s works and Al-Farabi (10th Century) integrated Aristotelian logic with Islamic theology. Both were later retranslated into Greek and Latin and other European languages, and helped sparked the European intellectual turn of the 12th and 13th Centuries. Al-Ghazali (11th-12th Century) in his works *The Incoherence of the Philosophers* and *The Revival of the Religious Sciences* worried about the ways language could mislead or obscure, aligning with Plato’s suspicion of rhetoric.

Together, these traditions remind us that the idea of language as a structured, socially meaningful tool was hardly unique to Aristotle — though his systematisation of rhetoric as a discipline was arguably unprecedented (and much of the later works cited here depend upon his insights).

1.4 Plato and the distrust of authentic language

If Aristotle saw language as a tool for shaping belief and action, Plato feared it as a dangerous illusion — a pale shadow of truth. This tension is clearest in his dialogue *Cratylus* (c.390 BCE[1926]), which today we tend to read as a vain plea that language must somehow remain pure, non-contingent and ‘uncontaminated’ by the needs of actual people.

Cratylus: A Brief Anatomy.

Plato’s central question is deceptively simple (to a modern mind naïve even): do words naturally match the things they name? Or are they just arbitrary social conventions?

Hermogenes argues that names are conventional, assigned by agreement (conventionalism). This would appear to prefigure Saussure's notions on the arbitrariness of the association between the signifier (*le signifiant*, the 'sound-image') of a spoken term and the signified (*le signifié*, the concept conveyed).

Cratylus, instead, insists that names have a natural fit to their referents (naturalism, rectification) — often through sound symbolism or etymology.

Socrates (Plato's true voice) toys with wild etymologies to test both views, ultimately concluding that language is inadequate for grasping eternal truths.

Cratylus's final position is extreme: if a name is incorrect, it fails to refer at all — a stance that anticipates modern debates about 'reference failure' (as in Russell's famous 'the king of France is bald', when there is no monarchy in France, Russell 1905).

Of course, even in Plato's day, the existence of multiple languages undermines any strong 'naturalist' view. Still, the dialogue captures a deeper concern: language is slippery. It deceives. It flatters. It can lead the soul astray:

[Rhetoric] is what persuades and cajoles, inspires and bamboozles, thrills and misdirects. It causes criminals to be convicted and then frees those criminals on appeal. It causes governments to rise and fall [...] and perfectly sensible adults to march with steady purpose towards machine guns.

(Leith 2011: 6)

Plato's solution, outlined in his *Republic*? Entrust public life not to orators or politicians, but to 'philosopher-kings' — men like him, one presumes. The great irony of course being that Plato himself was a peerless rhetorician.

1.5 A persistent legacy: The distrust of 'real language'

Plato's suspicion of everyday language echoes throughout Western intellectual history, a few examples:

- St Augustine: Language is simply a mechanism of labelling entities in the world, a view deconstructed by Wittgenstein at the start of his *Investigations* (1953).
- Bacon: The idolatry of words: 'words are but the images of matter. To fall in love with them is to fall in love with a picture' (*The Advancement of Learning* Bk II, 1605)
- Locke: Ordinary language should be transparent as possible and purified of figurative language which distorts meaning.
- Leibniz: The first attempt to 'translate' ordinary language into a mathematical system to eliminate ambiguity, impression and vagueness.
- Descartes: who sought truth through introspection, the cynic who systematicises doubt: (*Dubito ergo sum*). Everyday language is untrustworthy, only formal systems and mathematics are the model of thought
- Nietzsche: who viewed language as metaphorical and masking the true nature of reality ('On Truth and Lies in an Extra-Moral Sense', 1873). The 'tyranny of language' constrains, distorts, traps and 'petrifies thought. enforcing conformity (foreshadowing the 20th Century likes of Foucault; both neglect the fact that language can also be subversive of power).
- Saussure: who emphasised arbitrariness; meaning lies in difference, not substance. He was also a direct precursor, through his distinction between the purity of *langue* and the fallibility of *parole*, of
- Chomsky: who privileged idealised competence over messy real-world performance.

Even today, in much of post-Chomsky linguistics, usage-based and corpus-driven models are still treated with suspicion — dismissed as unsystematic or merely descriptive. But as this essay will argue, this discomfort with authentic language is not an accident. It is the latest expression of a philosophical anxiety that began with Plato, was systematised by Descartes, and lives on in the implicit hierarchies of some forms of linguistic theory. And, we will argue, Plato's distrust of language as vehicle for thought and communication has done a great deal of damage and disservice to linguistics; the study of language as communication was not deemed a worthy topic of philosophical consideration. And then, on the other hand, Aristotelians were so convinced that their man had solved all the issues inherent in language description that there was no need for further investigation; it was sufficient to pass on what Aristotle had taught. The unfortunate result of these two contrasting views meant that for long periods, progress in the philosophical study of language was halting. In fact, the collocation 'linguistic philosophy' is a coinage dating only to the 20th Century, linked to the writings of G.E. Moore, Russell, Wittgenstein, Ayer, Austin, Arendt and Firth. CL then is not only the epiphenomenon of the computer, it also has its philosophical harbingers. There had to exist at least one intellectual climate keen on revisiting language, even and especially everyday language, as a tool that can be used for an indefinite number of different tasks (Wittgenstein 1953/2009) and that speech is activity *energeia* [ἐνέργεια], not just analysis of propositions or finished action (*ergon* [ἔργον] Humboldt 1836; always remembering that our corpora are *ergon*, the trace of *energeia*). Every time we say something we are doing something, be it describing, denying, encouraging, asking, suggesting and, of course, evaluating entities.

Corpus linguistics, then, owes more to Aristotelian (and Pāṇini's) observationism and descriptivism if compared to the post-Platonist dualism of Saussure and Chomsky with their almost dismissiveness of the mess which is *parole* or performance. In contrast,

CL embraces the mess. It takes actual language use — errors, hesitations, colloquialisms and all — as the raw and perfectly valid material of analysis. Rather than resolving the distinction between *langue* and *parole* it dissolves it: *parole* is *langue*. The notion of ‘competence’ (always an ill-defined Platonic concept – as confusing as Plato himself was about it), that is, ‘the ideal speaker’s knowledge of the language’ becomes meaningless when there can be no such thing as an ideal speaker, let alone ideal knowledge of a language. CL and CaDS have underlined how ‘language’ itself is merely a useful fiction. Not only is, say, ‘English’ an almost infinite collection of discourse-types from ‘medical-journal English’ to ‘car-mechanic English’ to ‘maths lessons English’, in which every ‘native speaker’ is – to a degree - competent in just a tiny minority.

The ‘first wave’ of CL, which we might call the ‘institutional wave’, since language corpora - for technological and practical reasons - were expensive to build and tended to be compiled by universities or publishers, used corpora to build better, more detailed and more accurate dictionaries and grammars of the mythical entity ‘English’. However, the arrival in the mid 1990s, then its flourishing in the 2000s, of the ‘second wave’ of CL, Corpus-assisted Discourse Studies (CaDS), profiting from falling computing prices and rising speed, meant that small groups of independent researchers, even single individuals, could build their own corpora containing large numbers of texts of the discourse-type they were interested in. These could be medical research papers, press briefings, right-wing versus left-wing op-ed newspaper pieces, customer service telephone conversations or internet discussion fora; an almost infinite variety of discourse-type in fact (Chapter 11). The notion of a monolithic single language with one set of rules and regulations was well and truly blown away, and with it the outlandish notion of the invented idealised speaker of ‘English’ who could know all the rules. Hoey (2005) puts the final nail in the coffin of

the idealised speaker with his descriptivist's insistence that every individual has their own set of acquired language and communicative primings.

Chapter 2: The Stoics: *Logos*, *Lekta*, and Trust in the Text

The Stoics, unlike the Platonists, treated language not as a necessary evil or a pale shadow of reality, but as a central element of philosophy. They regarded language not as an add-on to their philosophy but as integral to their study of logic and knowledge. They developed one of antiquity's most sophisticated theories of how words connect mind and world. For them, *logos* meant 'concept', 'rationality' and 'speech'⁸ — inseparable facets of what it means to be human. In their tripartite division of philosophy — physics, ethics, logic — logic (or dialectic; 4.2) encompassed grammar and the study of linguistic forms, rhetoric and persuasion, and epistemology (the theory of knowledge, how we are able to know things). Together, these fields explained how language functions in reasoning, but also, how it gives access to reality. Language was therefore not a peripheral skill; it was part of the philosophical core.

Where Plato's suspicion of words leaned towards 'Distrust the Text,' the Stoics leaned towards an early 'Trust the Text' position: authentic language, used in accordance with reason, could be a reliable medium for truth. This placed them closer to Aristotle's functionalism than to Platonic pessimism, and — much later — nearer in spirit to Sinclair's empirical corpus maxim: trust the text to let it train your intuition (2004, 9-23)

2.1 The threefold model

Stoic linguistics distinguished sharply between:

1. *phōnē* — the physical sound.

⁸ When we read in the *St James Bible* (John 1:1)) 'In the beginning was the Word' (Ἐν ἀρχῇ ἦν ὁ λόγος; Latin Bible 'Verbum') we are reading a nonsensical translation from the Greek *logos*. A more meaningful translation might be 'In the beginning was Rational Order' (and that Rational Order was God and created by God).

2. *lekton* — the propositional content, carrying truth-value.

3. *referent* — the actual object or state of affairs.⁹

This separation between sound, sense, and reference prefigures both Frege's *Sinn/Bedeutung* and Saussure's *signifiant/signifié*. The Stoics' *lekton* was essentially propositional — true or false, and analysable through logical operators ('if...then', 'and', 'or').

However, the Stoics also recognised a wider category of 'sayables' that included non-assertive forms like questions, commands, and requests. These did not carry truth-value but were still considered rational, meaningful acts within discourse. In later terminology, these resemble the illocutionary acts described in modern speech-act theory. Thus, while the formal *lekton* in logic was restricted to propositions, the broader Stoic understanding of language left space for functional, non-propositional communication.

2.2 Speech as action

As mentioned, Stoic theory also prefigured what, in the 20th Century, became speech-act theory. They already recognized (beyond pure logical propositions):

- Assertions (*katēgoria*)
- Questions (*erôtēma*)
- Commands (*paraggelía*)

⁹ Note how this inclusion of 'state of affairs' prefigures Hoey's (2005, p, 155-156) remarks on the fuzziness of grammatical categories. A referent would seem to imply a noun of some kinds, but nouns are often convenient cloaks for 'states of affairs'. e.g. is 'depression' a noun, a verb (feeling depressed) or a state of affairs?

- Permissions and concessions

These map almost neatly onto Austin's and Searle's illocutionary types. Crucially, for the Stoics, uttering a *lekton* was a rational act — language use was a form of doing, not just saying, in sharp contrast to not only the Scholastics but many later forms of purely propositional linguistics.

Cicero: Stoic Fellow-Traveller

Cicero, though eclectic, absorbed Stoic ethical rhetoric. His famous maxim — that the ideal orator must be both *vir bonus* ('a good man') and skilled speaker — ties linguistic skill to moral purpose. In works like *De Oratore*, he presents eloquence as public ethics: the art of speaking well in service of the common good. Cicero's synthesis of moral philosophy and rhetoric represents a historical moment when philosophy and rhetoric were still speaking to each other.

Quintilian: Guardian of the Rhetorical Tradition

Quintilian (c. 35–100 CE) was a Roman rhetorician whose *Institutio Oratoria* became the definitive handbook on training the ideal orator. Though often not considered a 'philosopher', demoted to a rhetorician by the 'fence-builders',¹⁰ Quintilian preserved and systematised classical rhetorical education. He shared with Cicero the belief that an orator must be morally upright, and he embedded linguistic skill in a lifelong educational programme. Quintilian belongs not to the scholastic tradition, but to the rhetorical strand that ran parallel to — and was often marginalised by — philosophy's turn towards abstract logic and metaphysics.

¹⁰ He doesn't merit his own entry in the *Stanford Encyclopedia of Philosophy*.

2.3 The drift away

After the Stoics and Cicero, the philosophical mainstream gradually withdrew from the practical study of language-as-communication. Medieval Scholasticism turned much linguistic inquiry into grammatical or logical analysis serving metaphysics and theology. The utility of rhetoric — the very thing Aristotle, the Stoics, and Cicero had prized — became increasingly *infra dignitatem* for ‘serious’ philosophers.

It would take nearly two millennia for the study of language as functional communication to fully re-emerge in language philosophy in the 19th Century with Wilhelm von Humboldt and in the 20th Century with Wittgenstein, the Prague School, and Halliday’s Systemic Functional Grammar (Halliday and Matthiessen 2004), the precursors to the study of authentic language evidence — or at least its limited trace — provided by corpus linguistics.

Chapter 3: The Enduring Appeal of Scepticism

What we now refer to as the formal classical ‘Schools of Scepticism’ of antiquity flourished between the third century BCE and the second century CE. However, the traditions and methodologies of scepticism (small ‘s’) resurfaced throughout history. Hume and Descartes were among the most celebrated self-styled ‘sceptics’, some would add Socrates (‘I am the wisest man alive, for I know one thing, and that is that I know nothing’), Kant and Wittgenstein, and scepticism is still alive and publishing today.

Of course, informal scepticism is as old as human thought itself. To doubt is natural; to be wary of what we are told is a mark of prudence rather than perversity. One would have to be a credulous gullible fool not to be sceptical about much of what we hear. In this sense, any thinker who questions or criticises the prevailing philosophical paradigm (as Wittgenstein in his later work) can be classified as a sceptic. However, there is also a more formalised tradition: the philosophical Sceptics who, from antiquity to the present, elevated doubt into a method and even a doctrine. Timon of Philos, for instance:

pointed out that every argument or proof proceeded from premises which it did not itself establish. If you tried to demonstrate the truth of those premises by other arguments or proofs then they had to be based on undemonstrated premises. And so on *ad infinitum*

(Magee 2010, p. 42; and see Section 3.2 on the problem with axioms)

The paradox for us is that, while scepticism seems most relevant to the one fragile tool upon which all knowledge depends, namely, language, philosophers of scepticism, including Hume and Descartes have often neglected to apply their

sceptical principles to language communication, even though it would seem that precisely in language and especially in translation, that scepticism might find much fertile ground. Kant's disinterest in language can perhaps be explained by his conviction that it belonged to the sphere of *phenomena* (the tangible, things which appear to us, which are not, much as in Plato's view, the true object of a philosopher's scrutiny, which is the hidden reality of *noumena*).

3.1 Sceptical beginnings and the problem of *logos*

The earliest recognised Sceptic, Pyrrho of Elis (c. 360–270 BCE) advocated suspension of judgement (*epochē*) in the face of competing claims, seeking tranquility through refusal to commit. The Academic Sceptics, from Arcesilaus to Carneades, operated within Plato's Academy for two centuries, honing arguments that certainty was impossible. Arcesilaus had two main teaching methods, the first being to organise himself arguments on both sides of a question, the other being to attempt to refute any argument put forward by one of the Academy's students.

Sextus Empiricus (2nd century CE) offered the fullest account of Pyrrhonism, systematically rehearsing arguments against knowledge in perception, reasoning, and belief. Yet even here, where the very term *logos* meant both reason and word, language was rarely examined as the locus of uncertainty. The fragility of communication lay strangely in the background rather than at the centre of their sceptical enterprise. It was left to later semanticists to ponder on and debate the protean nature of words and language meaning.

3.2 What can we salvage from ancient Scepticism?

Some of the practices of the early Sceptics may seem somewhat futile and sterile 'game-playing' (and not in the more positive sense intended by Wittgenstein) and even authoritarian (the Master always wins the argument, or appears to).

But there remain two aspects well worthy of modern attention. Firstly, the dialectal¹¹ ‘method’ inherited from Plato and Aristotle, the effort made to produce both argument (thesis) and counter-argument (antithesis) from which sort form of synthesis or agreement may emerge. A lesson which could be usefully learned in many a department of the social sciences today, where post-structuralist one-sided agenda-preaching is often preferred to the more challenging and perhaps counter-intuitive Baconian and Popperian effort necessary in searching for and contemplating counter-evidence.

And secondly the peeling away of layers of argument to arrive at axioms (or axiomata), which still trouble philosophy today. Axioms are ‘atomic’ in the sense they cannot be broken down or tested by, for the empiricists, experiment and experience, or, for the rationalists by logic and reasoning. Axioms are troubling because they cannot themselves be proven. They simply have to be taken on trust, a worrisome proposition for many philosophers.

In mathematics’ set theory, there exists an infinite set (this can never be corroborated), and yet this infinite set can reside in an even larger set.

In geometry, the counterintuitive Euclidian notion that through a point not on a line, only one parallel can be drawn (put as simply as possible, if you have a straight line and a point not on that line, then there is exactly one straight line through the point that never meets the first line). This is Euclid’s infamous 5th ‘parallel postulate’, doubted and deliberated on for centuries, until non-Euclidean geometries showed different axioms produced equally valid but very different worlds. This not only proved crucial to Einstein’s relativity but also demonstrated how not all axioms are

¹¹ ‘Dialectal’ διάλεκτος (dialektos) in this sense, resurrected also in Hegel and Marxians, simply means ‘conversing’, but came to have the methodological sense of opposing and testing one thesis against another. It is one of the curiosities of linguistics that dialect, since its original meaning was a ‘form of speaking’ also came to be used to describe local forms of a language. Both meanings preserve the same core idea: Dialect = a mode of shared speaking

self-evident. Not to mention the almost mystical notion that a change in axiomata could change the workings of a universe.

In physics, the constancy of the speed of light in Einstein's relativity was not derived, but posited, can never be absolutely corroborated and yet it overturned Newtonian physics, at least in the sub-atomic world. Quantum mechanics postulates that the wave-function describes a system fully, and yet observation causes it to collapse (the wave-function predicts many possible positions, why does measurement suddenly force a single outcome?). These are axioms, not derivations, and lead to all the 'weirdness' of quantum physics (as Niels Bohr, later backed up by Feynman, famously said: 'anyone who is not shocked by quantum theory has not understood it').

Axioms in linguistics, CL, and CaDS

Linguists, too, take many things on trust.

There are two kinds of axioms. First, those that are formally untestable (e.g. 'language mediates thought') — they function as foundational assumptions. Second those that are heuristic — adopted because they appear to yield fruitful predictions or interpretations (e.g. 'repetition indicates salience or meaning'). These are provisional until counter-examples outweigh their utility (Popper).

Foundational axioms (untestable but indispensable):

1. Language is systematic: there are describable regularities. Without this axiom, all linguistics collapses.
2. Cognitive meanings (and primings) are shared enough in a given community for communication to succeed. This is never provable, only observable pragmatically (Hoey 2005).
3. Form correlates with function: linguistic patterns are meaningful (see also heuristic [6]). If this were false, corpora would reveal noise, not pattern.

4. Authentic usage is more reliable than introspection. Still contested in some quarters.

5. Repeated patterns reveal something about mental and/or social organisation. See Hoey 2005 on how priming theory sheds light on both types; Hunston 2013 on how evaluative patterns organise entire phrases.

Heuristic principles (useful but defeasible i.e. unless counter-evidence outweighs them):

6. Repetition suggests salience (though many counter-examples exist e.g. universally frequent grammatical items). Corpus methods can distinguish the typical (frequent) from the marked (infrequent e.g. 'fraught with ...delightful possibilities').

7. Finite corpora can model tendencies in larger language systems. A useful mirage, a corpus is only normally representative of itself.

8. Large-scale evidence reveals tendencies introspection cannot. The chances of 'serendipitous' discoveries are multiplied.

9. Counter-examples strengthen, not weaken, findings (Bacon, Popper). They can serve to refine a starting hypothesis.

CaDS working commitments

10. Meaning is enacted in real texts and real contexts. See (8) on the value of investigating multiple contexts and (13) on that of comparison of related contexts.

11. Languages consist of overlapping discourse-types, not a single language such as 'General English' (another useful fiction).

12. Triangulation ('shunting') between quantitative and qualitative methods is essential for restoring context.

13. Comparisons among related discourse-types reveal distinctive meanings, e.g. asserting that a PEOPLE ARE LIKE FLUIDS metaphor is disproportionate in discourses on immigration is only tenable if such discourses are compared to others relating to groups of people in movement (sports fans, concert-goers).
14. Analysts must remain reflexive about their choices, from compilation through choice of analytical tools to interpretations. Acknowledge how the researchers' own perspective and the wider social context influence interpretation (this translates in practice, to do not over-claim and seek out counter-arguments). .

The Sceptics' lesson, then, is not that axioms are illegitimate, but that they must always be recognised as assumptions, open to challenge and refinement. What matters is not whether they can be definitively 'proved', but whether the structures they enable are fertile, coherent, and resilient in the face of counter-evidence. And of course, anticipating Sloman and Fernbach (2017) below, the acid test is whether they work in practice.

3.3 Methodical doubt and human frailty

In the early modern period, scepticism was reborn as method. Descartes (1596–1650) elevated doubt into a strategy: if anything could be doubted, it should be, until only indubitable certainty remained. His '*Cogito*' was meant to be the rock upon which doubt failed. But language was curiously absent from this picture: thought was privileged, words treated as dispensable. As linguists we would amend the dictum to 'I think – and communicate (thoughts, performatives, evaluations) with others – therefore I am' (unwieldy maybe but more accurate).

Hume's double — ontological and linguistic — scepticism adds another strand to the long tradition of distrust in language. For him, many philosophical confusions arise because language hardens our habits of mind into apparently robust concepts. Terms such as *self*, *necessity*, *force*, *substance*, even *cause*, operate as handy verbal covers for what are, in truth, nothing more than bundles of impressions loosely tied together by mental habit. Once a term is coined, philosophers search for the 'thing' being named — even when no such thing actually exists. Linguistic form can lend an illusion of ontological reality.

Moreover, any linguistic imprecision or vagueness, so common and useful in everyday communication, is not merely 'sloppy phrasing' but must inevitably result in scepticism about what can be known. Hume is one more to add to our list of pessimists about language.

His influence on the early Wittgenstein is clear. The *Tractatus* shares Hume's conviction that philosophical problems arise from 'problems' of language. Thankfully, the later Wittgenstein — (the *Investigations*, where language is understood as something that does useful work in the world) revised and countered Hume's doubly dour Scottish scepticism..¹²

3.4 The primary object of Scepticism: Communication

The greatest sceptical challenge is not whether the world exists or is simply a hallucination, but whether words enable us to say anything reliable about it. Everyday miscommunication, misunderstanding, and equivocation testify to the fragility of linguistic exchange. Nowhere is this clearer than in translation. Once assumed to be a simple act of carrying meaning from one language into another, translation is now

¹² In the course of a century Scotland produced Hume, Smith, Reid, Maxwell, Hutton, James Watt, Mary Somerville, Boswell, and Walter Scott, not to mention a little later, John Sinclair. Once the Scots stopped squabbling with the neighbours, they reinvented civilisation.

recognised as a field fraught with scepticism. Quine's (1960) 'indeterminacy of translation' argued that no single, correct mapping between languages can ever be proven. Benjamin (1923) spoke of the inevitable transformation that occurs when texts live a new life in translation. Venuti (1995) has insisted that all claims to transparency are illusions: cultural frames always mediate meaning. Halliday (1992), controversially, went further, rejecting any stand-alone 'theory of translation'; it was to be subsumed under the theory of language itself, an argument that ruffled feathers but underscored his conviction that translation is only intelligible as part of the wider functions of languages. Translators themselves live this scepticism daily: aware of the inevitable loss and distortion, but equally aware of the remarkable fact that translation generally works well enough to sustain intelligibility.

3.5 Modern scepticism about language

In the twentieth century, scepticism about language took new forms. Wittgenstein's early *Tractatus* (1922) advanced a kind of linguistic scepticism, denying meaning to anything that could not be pictured in logical form. His later *Philosophical Investigations* (1953) was sceptical in another sense: it warned against philosophical overreach, it dismissed any notion of 'private language' (in which concepts relate purely to the individual's inner perception) and insisted that meaning rests only in shared use.

3.5.1 Popper and Scientific Scepticism

Karl Popper (1902–1994) institutionalised scepticism in science by elevating falsifiability into a criterion of knowledge (1959 [1934]). What matters is not verification but the possibility of refutation. Hypotheses must be framed in clear, testable language, so that evidence can prove them false. Here scepticism and language meet directly: without linguistic clarity, scientific conjectures cannot even

be tested. Popper's philosophy was thus not only a method of science but a philosophy of linguistic rigour (see McEnery and Brezina 2022).

The cognitive scientists Sloman and Fernbach (2018) are thorough sceptics in maintaining that as individuals we 'know' very little. Almost everything we say we 'know' we actually take on trust, from heliocentricity to evolution. Most of us do not know how a pencil is made, how a toilet works or can draw an accurate picture of a functioning bicycle. However, they describe how human knowledge is held socially and how by communicating effectively we can achieve great things over lengthy periods of time. One of their examples being Milan Cathedral, never projected by a single architect, begun in 1386 and finished in 1965. Many corpora too are compiled and interrogated as repositories of socially held-knowledge.



Milan Cathedral (Wikipedia). Not built in a day or planned by an architect. A result of knowledge held socially for hundreds of years.

Together, these modern voices insist that language itself is one of the most vulnerable sites of doubt.

3.6 Corpus Linguistics and CaDS as sceptical practice

Corpus linguistics exemplifies scepticism in action. The corpus is a tool for confronting cherished intuitions with counterexamples. It is designed to disconfirm as much as confirm. Sinclair's slogan 'Trust the text' (but never completely) is a manifesto of methodological scepticism: do not trust introspection, or anecdote, or linguists' invented sentences. Trust the stubbornness of authentic language data, never forgetting though that it too is fallible. In this sense, CL and CaDS stand midway between hard or physical science and human science (12.5.3): treating language as a system amenable to empirical method, while recognising it as the vehicle of human persuasion, ideology, and desire.

3.7 Conclusion

The appeal of scepticism endures because it is both paralysing and liberating. It paralyses when it insists the suspension of all judgement; but it liberates when, as in Popper (1959) or in CL, it becomes a method for refinement and discovery. The greatest irony is that the one thing every sceptic ought most to doubt is the reliability of communication itself. Yet despite the failures, distortions, and indeterminacies, language works (see Hoey [2005] on shared lexical primings). Translation, for all its problems, works (most of the time, despite the unanswerable question: are there any notions which cannot be translated?). Corpora, for all their limitations, expose us to language's patterns of meaning and use. Scepticism is not the antithesis of knowledge but can be its most valuable 'conscience'.

Chapter 4: Scholasticism: Logic, Language, and the Long Medieval ‘Conversation’



The Scholastic Magister (*Museo Civico*, Bologna)

4.1 Setting the scene

From roughly the 9th to the 15th century, the intellectual life of Europe was dominated by the *scholae* (from Greek *skholē*, originally meaning ‘leisure time’, ‘time spent not working’) — the cathedral schools organised around a Magister, and later the universities of Paris, Bologna, Oxford, and beyond.¹³ Here the ‘Schoolmen’ (as they came to be called) engaged in systematic study of philosophy, theology, law, and the natural world, working within an academic culture shaped by a blend of Aristotelian logic and Christian theology (Leff 1968; Kretzman, Kenny and Pinborg [eds] 1982).

¹³ Whist the term *Academy* simply refers to a location, the name of an olive-grove where Plato often met with his pupils to spend their leisure/learning time.

Although modern histories tend to treat Scholasticism primarily as a philosophical-theological enterprise, it was also — and crucially for our purposes — a linguistic enterprise. The tools of their trade were texts, and their method was argument conducted through precise, rule-bound language. In modern parlance they were a kind of rigorous discourse analysts.

4.2 The Scholastic Method - Dialectical Logic

The hallmark of Scholastic thinking was dialectic, that is, a disciplined, formalised method of inquiry that sought truth through the structured opposition of arguments. This method had roots in ancient philosophy, but the Schoolmen systematised it into scientific form.

A typical scholastic *Quaestio* (question) unfolded in several stages:

1. Statement of the Question (*Utrum...?*) — A tightly defined problem, often in yes/no form, e.g. ‘Is a monarch constrained by the laws of the realm?’
2. Objections (*Videtur quod...* [it would appear that]) — A presentation of arguments regarding an anticipated conclusion, citing authorities, logical principles, and analogies e.g. ‘the monarch is the font of law; therefore, they cannot be constrained by what depends on them’.
3. On the Contrary (*Sed contra...*) — A short, authoritative counterpoint, often quoting Scripture, Church Fathers, or Aristotle, e.g. ‘ecclesiastical tradition holds the monarch rules by Divine Right’, but Augustine argues, ‘A law that does not bind the ruler is no law at all but a form of tyranny’.
4. I Answer That (*Respondeo dicendum...*) — The master’s own solution, weaving together logical reasoning and authoritative sources.

5. Replies to Objections (*Ad primum... ad secundum...* concerning the first, etc]) — Systematic refutation or incorporation of the earlier objections, e.g. To the first: ‘the doctrine of divine right grants dignity but not legal immunity. To claim otherwise dissolves the very notion of law and invites arbitrary rule—precisely what legal order seeks to prevent’. To the second: ‘divine ordination confers office but not licence to injustice; otherwise, Scripture itself would contradict the justice of God’ (Marenbon 2007).

The aim was not primarily rhetorical ‘victory’ but logical clarity, exposing ambiguities, testing definitions, and reconciling apparent contradictions. In linguistic terms, the *Quaestio* format is an early form of what modern discourse analysts would recognise as turn-taking with explicit metadiscourse, carefully marking the status of each statement in the dialogue. Such an approach to dialectic would seem to be closer to Popper’s idealised view of how scientific enquiry should advance, by testing and taking counter-evidence into account, even welcoming it, than political discourse down the ages, where rhetorical victory has always been paramount. It seems to presage Bacon, Popper and the best of empirical corpus linguistics (e.g. Sinclair, Hunston, Hoey). But we should also not forget that if Aristotle’s work on Logic prioritised clarity, his work on Rhetoric was a manual on how to win an argument.

4.3 Aristotle vs. neo-Platonism: A productive tension

Medieval thought inherited two powerful but different traditions. The first, very briefly put, is neo-Platonism in which language is viewed at best as a shadow of higher, eternal truths; the purpose of all enquiry is to guide the mind away from the mutable here and now and towards the immutable, often interpreted in theological terms.

The second is Aristotelian ‘Realism’, in which language is seen as a tool for describing a real, structured world; categories and definitions which supposedly reflect the

world's actual organisation. Having said this, we need to add the proviso that Aristotle's influence on early and medieval philosophy derived overwhelmingly from his logical works, the *Organon*.¹⁴ upon which the Stoics, the Scholastics, and the entire medieval university system built their curricula. They provided, it was thought, a universal method for valid reasoning, a framework for scientific demonstration (*epistēmē*) tools for dialectic and disputation and a clear ontological scaffolding (categories, substance/accident, universals). By comparison, the *Art of Rhetoric* was apparently treated as (almost relegated to) a manual for persuasion – a useful integration but not central, and the *Poetics* as ornament, marginal to the serious business of philosophy.

And yet, and yet ... it is one of the curiosities, maybe even paradoxes, of medieval Aristotelianism that, although the Scholastic curriculum was dominated by Aristotle's *logical* works, the very method of philosophical disputation — the *Quaestio* technique described above — depended in practice on the skills outlined in the *Art of Rhetoric*. The structure of the *Quaestio* (posing an issue, assembling opposing authorities, articulating objections, replying and resolving) rests on the careful handling of *ethos*: stance, voice, audience, as well as persuasive sequencing, even if medieval thinkers probably did not always explicitly see themselves as employing rhetorical tools. This reveals a deeper tension in the tradition: an official *instrumentalist* view of language inherited from Aristotle's logic, in which words merely express pre-formed thoughts, coexisting with an unacknowledged optimism about the *Art of Rhetoric*, the generative and argumentatively constructive power of communication, which today's functionalist linguists including CL and especially CaDS readily recognise. Medieval Aristotelianism implicitly though largely unconsciously exhibits a very human reliance

¹⁴ Traditionally consisting of: Categories, *De Interpretatione*, Prior Analytics, Posterior Analytics, Topics, Sophistical Refutations.

on the rhetorical practices through which those sought-after neo-Platonic ‘eternal truths’ were debated, refined, and socially negotiated

The two traditions were not always considered to be mutually exclusive, at least not in theory. Thinkers like St Augustine and later Thomas Aquinas attempted to synthesise them: Aristotle’s logic provided rigour in defining terms and structuring arguments, while the neo-Platonic vision preserved the spiritual dimension of truth.

In practice, though, realistically, the attempts at synthesis were, to be kind, unstable. The Aristotelian side encouraged empirical observation and precise verbal distinctions, categories and definitions; the neo-Platonic side could regard such distinctions as distractions from spiritual insight (Gilson 1955). In terms of this work’s overview of the linguistic underpinnings of CL, this tension helps explain why the study of language as interaction, as functional communication, was often marginalised, and sometimes even attacked. Language was frequently valued more as an instrument for preserving doctrinal precision than for recording authentic human interaction in a world, we must not forget, where the technical means of recording such interaction were meagre to say the least.

4.4 Language and the Scholastic project

For the Schoolmen, logic was a linguistic discipline. Words, propositions, and arguments were the raw material. The study of language was divided into the classical ‘trivium’ (Clark 1957).

The *Trivium* (grammar, logic/dialectic, rhetoric) and the *Quadrivium* (arithmetic, geometry, music, astronomy) together made up the *Septem Artes Liberales* — the ‘Seven Liberal Arts’, worthy of a free (liber) man.

The idea was that these were the arts appropriate to those who were not bound to manual labour (the servile arts), but had the leisure (*otium*) to cultivate intellectual pursuits and set the mind free.¹⁵

The first ‘leg’, Grammar, was considered not merely descriptive but speculative — seeking to uncover the universal structures underlying Latin (and by extension, it was thought, all language).

The second, Semantics, which engaged in discussions of signification (what words mean) and supposition (how words stand for things in propositions, an approach to logical semantics which endured until Wittgenstein’s later works, with the brief and largely forgotten Humboldt interlude).

The third was Textual Analysis. The Scholastic commentary tradition resembled modern discourse analysis, with meticulous attention to how meaning is constructed, contested, and resolved in dialogue with sources. These map perfectly onto modern linguistics’ ‘*trivium*’, namely, structure, meaning and use (all of which are interdependent).

While naturally, they lacked large empirical corpora, their wide reading and intertextuality — collating examples from Scripture, Aristotle, Boethius, Cicero — created a kind of collective primed searchable ‘mental concordance’, assembled through human memory and manuscript culture.

Boethius (c. 480–524) – The Gatekeeper of Aristotle

Boethius, a pre-Scholastic rather than Schoolman proper, was a Roman philosopher, translator, and commentator who transmitted much of Aristotle’s logic (especially the *Organon*) into Latin.

¹⁵ <https://liberalarts.org.uk/philosophy-and-the-liberal-arts/>

His linguistic significance was manifold. His translations and commentaries formed the basic curriculum in logic for centuries.

He introduced Latin terminology for Aristotelian categories and logical relations, which became the technical vocabulary of the Scholastics.

His advocacy of a fusion of philosophy and Christian doctrine set the stage for later scholastic synthesis.

Without Boethius's work, the Schoolmen would have lacked the raw material of Aristotelian logic until the 12th Century translation movement (Magee 2010).

St. Thomas Aquinas (1225–1274)



Thomas Aquinas, illumination from the manuscript 'Summa theologiae', ms. 0499 (I), f. 001r, beginning of the 14th century, *Bibliothèque municipale*, Troyes (Public domain).

Aquinas was a Dominican friar, theologian, philosopher, who attempted to synthesise Aristotelian philosophy, the central notion that all our knowledge is acquired through

sensory experience, with Christian doctrine (neo-Platonism – the distinction between the real and the ideal – has always been integral to Christian thought). Indeed his ambitious project was to produce a vast synthesis of all that had been best argued in Western thought (but also in Islamic and Jewish sources) and show it to be compatible with Christian belief.

Aquinas regarded language and logic as indivisible. Language was a divinely given capacity enabling humans to reason about both natural and supernatural truths. His *Summa Theologiae* is a masterpiece of the *Quaestio* method, using precise verbal definitions and careful distinctions to resolve theological disputes.

The significance of his work for linguistics study included championing the view that language can meaningfully describe both material reality and theological concepts: helping institutionalise the Aristotelian logical framework in European universities and demonstrating how rigorous textual organisation could accommodate complex, multi-layered meanings, just as schools of discourse analysis argue today (Hoey 1991; Torrell 2005; Kenny 2014)

4.5 The outcomes and legacy of Scholasticism at its peak

By the late Middle Ages, the Scholastic Method had achieved a robust tradition of textual reasoning, valuing language as a medium for systematic inquiry (not always retained in later philosophies; see Chapter 7 on the 18th and 19th Centuries). It included a detailed semantic theory (e.g., of supposition) that anticipated some concerns of modern formal semantics. And perhaps most surprisingly it valued a model for rigorous dialectic to-and-fro, the weighing of evidence and the encouragement of diverging viewpoints (anticipating the birth of the modern adversarial legal cross-examination and even press interviews and conferences, in which counter-arguments were recorded, addressed, and often preserved for future

scholars). Still today we talk of playing ‘the Devil’s advocate’, arguing a counter-proposition one does not necessarily aver as one’s own. This kind of dialectic survives today in the much-copied ‘Oxford Union’ style debate, one side for and one side against a proposition, a ‘motion’, always introduced with ‘This House believes ...’ (though in this model, a final audience vote does award a rhetorical victory to one of the two sides).

Yet it also had limits. Its over-reliance on authority constrained the exploration of language in its living, evolving forms. The neo-Platonic tug tended to keep linguistic study tethered to idealised rather than observed usage. Empirical approaches were absent, the raw data were *exempla* from canonical texts, not records of spontaneous speech.



An early, anonymous Scholastic attempt to impose order on the world, long predating Leibniz’s or Russell’s later ‘mathematisation’ of language. Clockwise are the four Elements — Fire, Air, Water and Earth — each defined by its pair of primary qualities (Heat, Humidity, Frigidity, Dryness). In medieval thought these elements were thought to not only structure the physical universe but were also to underpin the Four Humours, the supposed determinants of human temperament. Modern English, and other European languages, still retain some of the ‘Humours’ vocabulary, ‘a fiery temperament’, ‘a down-to-earth personality, and also *phlegmatic* (originally ‘cool’) and *melancholy* (‘dry’, sad and brooding), *sanguine* and *bilious*. Even *temperament* (from *temperare*, to mix properly) is literally the ‘mixture’ of humours.

4.6 A bridge forward

The Scholastics bequeathed to later centuries the idea that truth emerges from structured contestation — a principle that will resurface in the 20th Century in Popper’s falsifiability criterion and, in our own field, in the (desirable but all too rare) corpus-assisted search for counterexamples.

It would take over two millennia, after Aristotle, for the study of language as truly functional communication to re-emerge in language philosophy, briefly with Humboldt in the 19th Century then in the 20th Century with the later Wittgenstein (language as a tool-box for performing tasks), the Prague School (language forms reflect human functional needs), and Halliday’s Systemic Functional Grammar, the precursors to the study of authentic language evidence — or at least its trace — provided by corpus linguistics.

Appendix: Other notable Schoolmen

These include:

Peter Abelard (1079–1142) a master of dialectic, known for his work on the theory of reference (*sermo*) and refining disputation techniques. But better known still of course for the tragic love story of Abelard and Héloïse.

Albertus Magnus (c. 1200–1280) who was Aquinas’s teacher. He integrated Aristotelian science with Christian theology and discussed language as a medium for empirical description, very much anticipating the 20th Century tradition started by Wittgenstein and continued by Austin, Arendt, Firth and Sinclair (Chapter 10).

William of Sherwood (c. 1200–c. 1266), the author of *Introductiones in Logicam*, with early formulations of propositional logic.

Duns Scotus (c. 1266–1308) ‘the Subtle Doctor’ who advanced semantic distinctions, especially around universals and predication (Cross 1999). Though not a linguist, his thoughts about terms used for universals or ‘kinds’ (*quidditas*: ‘whichness’) as against terms as individuation (*haecceity*: thisness) resonates in later debates on particularity and on instance (a particular text or utterance) compared to system (the whole underlying semiotic potential of a linguistic phenomenon), as in Halliday and Hasan’s famous metaphor, weather versus climate (1985). The distinction between system (whichness) and instance (thisness) may be compared with that between climate and weather. Weather is what actually happens now; climate is the sum of the possibilities of what has happened (and what may happen). Similarly, texts are instances of the system, and the system is the meaning potential that underlies them, and which can also be predictive of future behaviour (1983: 19).

William of Ockham (c. 1287–1347) developed ‘supposition’ theory (see above). He was, of course, made famous by the expression ‘Ockham’s razor’ (though he never used the phrase himself – it was first coined in the 19th Century). If two arguments appear to have equal validity, follow that which has fewest and clearest logical steps (Spade 2002; McCord Adams 1987: 143-167). In the 20th Century Popper (1959) enshrines the same notion; he transforms Ockham’s aesthetic maxim into an epistemological criterion: simplicity is valuable not for elegance, but because it maximises testability. A simpler theory is more falsifiable, because it makes bolder, riskier predictions, while a complex theory can always be patched to fit new data, but becomes less testable and thus less scientific: ‘we do not seek simplicity for its own sake, but because it makes a theory more easily falsifiable’. (1934 [1959], 47–48).

Both Duns Scotus and Ockham were sceptical of Aquinas’s relentless Aristotelian empiricism, that the existence of God is open to proof. Instead they argue that God’s Will alone is enough to explain divine existence.

Chapter 5: The Waning or Metamorphosis of Scholasticism



Learning the be Schoolmen (*Museo Civico*, Bologna)

Overview

Scholasticism, the dominant intellectual tradition of medieval Europe, gradually declined during the 14th and 15th Centuries. This transformation was shaped by philosophical scepticism, theological shifts, and institutional changes that redefined the boundaries of reason, faith, and academic inquiry. Yet perhaps to speak of ‘decline’ is misleading, for much of what replaced it was not a simple rejection but a metamorphosis. The forms of reasoning honed by the Schoolmen – dialectical logic, systematic disputation, and semantic analysis – left their mark on law, theology, and even political philosophy. But the cultural climate was changing: new questions arose, new texts became available, and new ways of thinking about knowledge and language emerged (Kretzman, Kenny and Pinborg [eds] 1982).

5.1 Recap: The principle goals of Scholasticism and its methodology

To recap, the goals of Scholasticism rested on Dialectical Reasoning, principally the attempt to use of rules of logic to reconcile Faith and Reason, whose clearest expression can be found in the works of St Thomas of Aquinas, one of the Four Church Fathers and founder of a sub-school of Scholasticism, known as Thomism. Language was essential for Aquinas as the vehicle for both natural philosophy and theology. He saw language as grounded in Reason (*ratio*) and ultimately ordered toward Truth. Later Thomists influenced the language of philosophy by establishing technical Latin vocabulary (e.g. *essentia*, *existentia*,¹⁶ *analogia entis* and many others)¹⁷ that became standard across Europe. In effect, it created a shared philosophical register still visible in scholastic manuals today.

The Scholastic afterlife of Latin in Corpus Linguistics

Despite twentieth-century ‘plain English’ reactions against Latin and Greek jargon in philosophy, we might wryly reflect that one of the ironies of modern functional and corpus linguistics is just how many of its technical terms still bear the imprint of Scholastic Latin and Greek.

Most obviously, the very term *corpus*, *corpora* comes directly from Latin. Its adoption in linguistics to mean a body of texts is not a modern innovation but a continuation of long-standing scholastic and humanist metaphors. Other familiar terms share the same lineage: *text* (*textus*, tissue), *collocate* (*collocare*, to place together), *context* (*contextus*, ‘woven together’) and *concordance* (from *concordantia*, ‘agreement’ or ‘harmony’), which the Schoolmen used in Biblical exegesis long before corpus linguists

¹⁶ « L’existence précède l’essence. », Sartre 1945, lecture in Paris. The founding quip of ‘existentialism’.

¹⁷ [https://www.treccani.it/enciclopedia/analogia-e-metafisica_\(Storia-della-civilt%C3%A0-europea-a-cura-di-Umberto-Eco\)/](https://www.treccani.it/enciclopedia/analogia-e-metafisica_(Storia-della-civilt%C3%A0-europea-a-cura-di-Umberto-Eco)/)

did in keyword retrieval collocation.¹⁸ The continuity runs still further. Our *indexes* and *annotations* (*ad-notare*) descend directly from scholastic glossing and indexing practices. *Semantics* (from Greek *semantikos*, significant), *modality*, and *quantification* (*quantus*), and of course *magister* were all staples of Scholastic logic and philosophy, even if recast in more formal or mathematical terms in the twentieth century. Even apparently modern categories such as *pragmatics* (Greek *pragma*, deed), *prosody*, *linguistics* itself and *lexical priming* (first Greek then Latin) retain a classical dress.

In short, corpus linguistics has quietly retained an entire substratum of Greek and Latin terminology. Scholars today may code (*codex*) their data with computers (*computāre* to reckon, calculate), but they continue to speak in the inherited *lexicon* of the Schoolmen. The Latin/Greek-Thomist ghost in the machine

Scholasticism could be described as a sort of ‘Systematic Theology’, the challenge of integrating Christian doctrine, heavily influenced by dualistic neo-Platonism (Heaven and Earth) with Aristotelian rational and observational philosophy (the Here and Now). Raffaello Sanzio’s celebrated depiction of Plato pointing skyward, while Aristotle spreads his hand over his surroundings, shows the artist’s understanding of these philosophical traditions.

¹⁸ The first known concordance was compiled by Hugh of St. Cher in the 13th century for the Latin Vulgate Bible.



The School of Athens (detail), Raffaello Sanzio. Wikipedia.

Scholasticism, naturally, relied heavily on classical and religious texts. In Eastern Europe the original Greek Bible was already well-known. In later Scholasticism in Western Europe, the movement received considerable impetus from new translations into Latin of philosophical texts directly from the original Greek.

In time, however, this literary conservatism began to prove too much of a constraint as novel studies and interpretations of both classical and ecclesiastic works began to circulate.

The *scholae*, which had begun as semi-informal gatherings around a Magister, experimenting in dialectic logical methodological studies of theology (and ecclesiastical law) developed by the 12th Century into Universities. While still initially ecclesiastical in subject matter, their methods of dialectic logic, discourse analysis plus a new spirit of empirical investigation and experimentation began to take hold,

eventually to be applied to other human/social and ‘hard’ sciences (just as Aristotle had originally intended; the term ‘science’ only appeared in the 19th Century,¹⁹ before which it was known as ‘natural philosophy’).

5.2 The waning of faith in Pure Reason

The great promise of Scholasticism had been that Reason and Revelation could be reconciled. Logic, drawn from Aristotle, would be the bridge between theology and philosophy. By the 14th century, however, this promise was faltering. Figures like John of Mirecourt (known as ‘the White Monk’) and Nicholas of Autrecourt (Turner 1903) openly questioned whether human reason could grasp either divine mysteries or natural causation. Their scepticism prefigured later developments in Locke and Hume, the latter famously demonstrating the fallibility of logical inference. Even if every swan you have seen is white, you cannot discount the possibility of black swans (as European sailors in southern Oceans discovered). Or, as Russell put it (1912), because the farmer has fed you, a chicken, every day, do not count on his feeding you tomorrow; he may instead arrive with an axe.



The Australasian black swan

¹⁹ The term is often attributed to Mary Somerville (1834).

This brand of scepticism culminated in Kant's *Critique of Pure Reason* (1781). Put bluntly, Kant says that we simply cannot know what we do not know (Plato-bothering again), however expert we are at introspection on metaphysics. Nor is knowledge gained by experience infallible (Hume's argument). Kant's dissatisfaction with 'pure reason' as a way of - in his neo-Platonic view - inferring *noumena* (things as they truly are) from *phenomena* (things as we can perceive them) finds a recent echo in Fillmore's witty and celebrated critique of 'armchair linguistics':

A caricature of the armchair linguist is something like this. He sits in a deep soft comfortable armchair, with his eyes closed and his hands clasped behind his head. Once in a while, he opens his eyes, sits up abruptly shouting, 'Wow, what a neat fact!', grabs his pencil, and writes something down. Then he paces around for a few hours in the excitement of having come still closer to knowing what language is really like.

(Fillmore 2008: 105)

No Kantian, Fillmore goes on to advocate '*corpus assisted armchair linguistics*':

A caricature of the corpus linguist is something like this. He has all the primary facts that he needs, in the form of a corpus of approximately one zillion running words, and he sees his job as that of deriving secondary facts from his primary facts. At the moment he is busy determining the relative frequencies of the eleven parts of speech as the first word of a sentence versus as the second word of a sentence. [...] These two [linguists] don't speak to each other very often, but when they do, the corpus linguist says to the armchair linguist, 'Why should I think that what you tell me is true?', and the armchair linguist says to the corpus linguist, 'Why should I think that what you tell me is interesting?'

(Fillmore 2008: 105)

CaDS, at its best, by combining statistical analysis and close reading of context, helps answer the pure armchair linguist's doubts about CL's 'interestingness'.

For language philosophy, the scepticism about the potential of pure reason which gnawed at the heart of Scholasticism had ambiguous consequences. On the one hand, it undermined the Scholastic project of *supposition theory* (which today we might translate as 'hypothesis testing') and *precision semantics*, casting doubt on whether verbal distinctions really mapped onto reality. On the other hand, it hinted at a new role for language: not as a transparent mirror of reality, but as a limited human tool, bound up with uncertainty and interpretation, a view that aligns with most modern schools of linguistics.

Scholastic Semantics and Supposition Theory

A distinctive feature of medieval Scholastic semantics was the theory of *suppositio* — how a term 'stands for' something in different contexts. The concern was not meaning in the abstract, but the logical behaviour of terms inside propositions.

Three main kinds were distinguished:

Material supposition: the word stands for itself as a linguistic object, for example: '*A human is a noun.*' (*human* here refers to the word itself.)

Simple supposition: the word stands for a universal concept. For example: '*Humans are a species.*' (*human* here denotes the idea of humankind as a category.)

Personal supposition: the word stands for actual individual things in the world. For example: '*Every human is mortal.*'

This careful differentiation anticipates later concerns in semantics (e.g. Frege's sense/reference distinction, or the use/mention distinction in modern logic). But unlike modern pragmatics, Scholastic semantics largely ignored context, speaker intention, and social function. Its focus was the logical validity of propositions, not the everyday communicative uses of language. Nor did they spare much time to consider performatives (10.1), language as action, though to be fair, neither did much of later mainstream pre-20th Century philosophy (Aristotle himself would have been disappointed that his legacy in *Rhetoric* - language as a tool - was disregarded even by Aristotelians).

5.3 Mysticism and the turn away from Logic

At the same time, mysticism emerged as a rival intellectual current. Thinkers like Meister Eckhart (c.1260 – c. 1328) and Nicholas of Cusa (1401-1464) stressed paradox, unity, and the ineffability of divine truth. The most well-known is probably Julian of Norwich, the 14th Century anchorite and mystic and her *Revelations of Divine Love* (which is also the first book in English attributed to a woman).

Their appeal was precisely that logic seemed too rigid to capture the depths of spiritual experience and its emotional impact (we are reminded of Aristotle's advice not to forget *pathos*). Where the Scholastics had analysed propositions (*logos*) into finely graded distinctions, the mystics insisted that words ultimately fail, even betray, dissolving in the face of divine reality.

This rejection of the *Quaestio* method diminished confidence in language as a vehicle of rational progress. It also reinforced the neo-Platonic strain: language was no longer

the path to truth but the veil that must be pierced to glimpse a higher reality, whatever that might be.

Western Europe was not the only culture to experience mystic religious traditions. The adherents of Sufi Islam (often considered a reaction to the literalism of mainstream Sunni Islam) also sought personal direct experience of God, and their teachings were first institutionalized in the Middle Ages. A notable contribution to the Jewish mystical tradition, known as the Kabbalah, was the *Zohar*, a 13th Century commentary on the Torah, composed in Spain. It teaches that language itself is sacred: every letter of the Hebrew Bible carries divine energy, and scripture encodes cosmic secrets about God, creation, and the soul. Its vision is profoundly neo-Platonic in flavour: the visible world is a reflection of higher spiritual realities, and through meditative study of scripture, the mystic ascends toward union with the divine.

Mysticism and the limits of language

Mysticism is the term used to describe the pursuit of direct, experiential union with the divine or ultimate reality, often described as ineffable — beyond the reach of ordinary language or rational categories.

In the Scholastic Context, many mystics arose within Christianity but emphasised a path different from the dialectical rigour of the Schoolmen. Mystics such as Meister Eckhart, Julian of Norwich, and later San Juan de la Cruz (1549 – 1591) stressed paradox and silence: words cannot capture divine truth, which must be encountered directly (yet another instance of pessimism about language, a phenomenon recurring in different forms in different times and places). Their outlook was deeply coloured by neo-Platonic motifs — the ascent of the soul, the unity of being, the idea that multiplicity dissolves into divine simplicity.

Mysticism was a cross-cultural phenomenon. Christian mysticism was not isolated. Jewish Kabbalistic thought and Islamic Sufi traditions (e.g., Al-Ghazali, Ibn Arabi) contributed to the broader intellectual climate. In China and India Daoism and Zen Buddhist mysticism predated the Renaissance and was, by contrast, non-theistic, preaching the search for personal union with the ineffable (that is, too overwhelming to be accessible by human reason) source and pattern of the universe. This highlights a paradox: while Scholasticism elevated language as the key to reason and order, mysticism defined the divine precisely as what exceeds the boundaries of language.

The legacy of mysticism, particularly the mystics' suspicion of words reinforced the neo-Platonic strand in Western thought: language is not the path to truth but a veil. Their influence ensured that, alongside the Schoolmen's logic-driven semantics, European thought preserved a counter-tradition of wordless contemplation — one that would later echo in German and British Romantic movements (Wordsworth's 'spots of time', moments of absolute stillness and insight, Schopenhauer's silent, will-less contemplation, even Marx's and Nietzsche's 'forces beneath language'), and prefigure modern scepticism about language and 'empty rhetoric'.²⁰ There is little that is mystical in CL, however all discourse analysis is aware of the importance of studying absence, what is not said or *where* it is not said (Hoey 2005, Schröter and Taylor (eds.) 2018).

5.4. Universities and intellectual independence

The universities, once the engines of Scholastic debate, also began to change. By the late Middle Ages, faculties of non-canonical law and medicine were rivaling theology and canonical law in prestige. The curriculum was diversifying, and the universities themselves were asserting independence from ecclesiastical authority. This allowed

²⁰ Barack Obama is just a man who 'gives speeches' (H. Clinton 2007).

for new subjects and approaches – including more attention to natural science – but it also meant that theology (and hence neo-Platonism) no longer dictated intellectual life.

This institutional shift diluted the centrality of linguistic logic. Scholastic semantics, once essential to theology, seemed less relevant to non-canonical law, medicine, and natural science. Textual reasoning did not vanish, but it was increasingly absorbed into specialised disciplines.

5.5. The arrival of new texts

Another factor was the flood of classical works that entered Western Europe in the late Middle Ages. The Greek scholar William of Moerbeke had already produced meticulous Latin translations of Aristotle in the early 13th Century (superseding the often corrupt Arabic and Syriac versions, which had been translated from Greek by Middle Eastern Christian monks, then re-translated into Latin by European scholars), giving scholars of all stripes more raw material. And by the Renaissance, texts by Plato, Cicero, and the Stoics were also being rediscovered. This widened the canon and relativised Aristotle's dominance.

Language itself became newly interesting, not as an abstract system of supposition, but as the bearer of classical style, rhetoric, and humanist eloquence. The Schoolmen had prized logical rigour, the humanists instead celebrated persuasion and literary beauty. This marked a profound shift in the philosophy of language – away from logic, toward rhetoric. This shift however was by no means always apparent in later philosophical thinking and writing. Other forms of obscurantism crept in.

5.6 Chaucer's critique

The gap between Scholastic discourse and everyday speech had also grown too wide to ignore. Chaucer's *Clerk's Prologue* (1387-1400) famously mocks the convoluted, high-flown style of the Schoolmen, urging instead for plainness and lively narration:

Keep the 'high style' until occasion brings
A use for it, like when they write to kings,
And for the present put things plainly, pray,
So we can follow all you have to say.

Such critiques are evidence that Scholastic language had become a discourse type of its own – a rarefied register, removed from the people's tongue, and therefore increasingly vulnerable to satire.

5.7 From Scholasticism to Humanism

By the 15th century, Scholasticism did not so much disappear as mutate into new forms. Humanism re-centered intellectual life on classical texts, individual experience, and the cultivation of eloquence. Observation was revived and began to rival the *Quaestio* deduction as a path to knowledge. Logic remained, but it was now joined by rhetoric and history as tools of inquiry.

Language, paradoxically, was both demoted and revalued: demoted as the technical semantic analyses of the Schoolmen fell out of fashion, but revalued as the vehicle of rhetoric, persuasion, and civic life, just as Aristotle had intended in his outline of the use of rhetoric for politics (*agora*), law (*forensics*) and public praise and blame (*epideictics*), still recognisable as practical uses of language today.

In other words, language lost much of its 'sacrality', being viewed more as an everyday tool (as in the 20th Century, see Wittgenstein 1953, Arendt 1958 and Austin 1962). Yet

at the same time it never lost its reputation for *nefarious* sacrality, as seen in the quasi-apocalyptic vision of language's perils in Nietzsche's works, in the sustained use of state propaganda and, of course, advertising in the 20th Century, as well as various often well-intentioned but dubious attempts at 'linguistic engineering' (consider the changing euphemisms to apply to someone who buries dead bodies, the changes in ways to speak of people of colour, and see Duguid's CaDS research into 'forced priming' [often ending in failure and even ridicule], Duguid 2007, 2009).

5.8 Gone (for now) but not forgotten

The long conversation of the Schoolmen left behind several legacies. Firstly the adversarial method of structured disputation, which survives in legal trials, parliamentary debate, and even the Oxford Union style debate and the very popular *Intelligence Squared* podcasts, which have a US, UK and Australian version (all without an authoritarian Magister; the audience decides). Secondly, the recognition that truth emerges through dialogue and counterexample, a principle that will later resurface in Popper's philosophy of science. And lastly, the paradoxical lesson that language is at the same time indispensable yet inadequate – a theme that would return in several of the discourse-analytical traditions of the 20th Century. We should remember that even CL and CaDS developed out of a basic premise, that close reading of texts by itself is not always satisfactory and that it is possible to uncover 'non-obvious meanings' by looking at texts in new ways.

Chapter 6: Humanism, the Renaissance and Language

6.1 Early humanism

The earliest traces of what we today call ‘humanism’ (the term itself was coined in the 19th Century in Germany) emerged in 14th-century Italy, particularly in newly wealthy cities like Firenze and Padova. It is sometimes described as a cultural and intellectual movement that gradually began to reshape the dominant Scholastic tradition of the medieval universities. While Scholasticism had long been the prevailing method of learning—centered on theology, logic, and dialectical reasoning—humanism introduced a new emphasis on classical texts, history, moral philosophy, and the cultivation of eloquence and Roman ‘virtues’ (see below), as drawn – or cherry-picked – from Cicero in particular. It can equally be described as the rise of a newly powerful economic class, merchants and bankers, with the potential and desire to challenge the practical monopoly of the Church on wealth, education and culture.

The shift did not happen overnight, nor was it ever complete. Scholasticism remained deeply entrenched in the university system, especially in faculties of theology and law. But humanism found fertile ground in civic institutions, private academies, and among educated elites who were increasingly drawn to the literature and *imagined* – not to say at times risibly *invented* - values of ancient Rome and Greece. Figures like Petrarca (1304-1374) began to advocate for a return to classical sources—not merely for their content, but for their more ornate rhetoric style (one of many periodic reiterations of Aristotle’s advice to appeal to *pathos* in rhetoric), and what is sometimes called ‘human-centered worldview’ and most obviously to us today, new – or revived – themes in the arts, literature, theatre and architecture. Venus, Apollo and the Muses replaced the Virgin Mary, Christ and the Disciples.

Humanists criticised Scholasticism for being overly technical and abstract, disconnected from the practical and ethical concerns of everyday life. They looked back (somewhat naively) to the ‘elegant Latin’ of Cicero, and they sought to revive the *studia humanitatis* (hence the name ‘humanism’) —a curriculum that still included grammar and rhetoric, but added, history, art and non-religious music (from ‘the Muses’) and saw moral philosophy as less theological and more personalised. This approach aimed not just at intellectual mastery in order to be closer to God, but for a variety of more mundane purposes, including the so-called ‘civic duty’ of an individual.



The revival of secular art and music (Garofalo, Palazzo Costabile, soffitto [detail], Ferrara)

The notion of virtue itself was revisited. In Christian Scholastic thought, virtue was often framed in terms of theological categories: faith, hope, charity, humility,

obedience. It was oriented toward salvation and divine grace. Greek and Roman virtue—*aretē* in Greek, *virtus* in Latin—was more secular and civic. It emphasised qualities like courage, prudence, justice, and temperance. For Aristotle, virtue was about fulfilling one's nature through rational activity; for Cicero, it was about serving the Republic with integrity and eloquence. Humanists revived this classical ideal of virtue as *excellence in action*, grounded in worldly engagement, not just spiritual piety. What was missed out is just as revealing. That Cicero's age were times of brutal conquest, enslavement, not to mention the deepest misogyny was not emphasised (and remember the term 'virtue' itself derives from 'manly qualities', physical strength above all).

By the late 15th century, humanist ideas began to penetrate the universities themselves. Institutions like Firenze, Bologna, and Padova started to incorporate humanist texts and methods into their curricula, and scholars trained in philology (see 6.2) began to take up posts in academic settings. The new movement soon spread outside Italy to accommodate wealthier capitalist classes elsewhere, in France, the German and Czech states and the Netherlands. The invention of the printing press accelerated this transformation, allowing for the widespread dissemination of classical texts and humanist commentaries (but alongside ecclesiastical texts, it should not be forgotten).

Humanism did not entirely replace Scholasticism. Rather, the two coexisted and often influenced each other. Some thinkers blended humanist literary style with Scholastic rigor, while others used humanist methods to critique theological doctrines. The fusion resulted in what we now call the Renaissance (misleadingly, however; learning never 'died out' to be reborn, but was in constant transformation).

6.2 Philology and the birth of language as history

One of the most distinctive Renaissance contributions was philology: the recovery, editing, and comparison of ancient texts. Humanists collated manuscripts, identified interpolations, and produced critical editions. This involved painstakingly gathering authentic evidence and comparing variants to establish what an author really wrote and meant. Whereas Scholastic commentary traditions often treated texts as fixed authorities to be glossed, humanists subjected the texts themselves to scrutiny, a new form of discourse analysis.

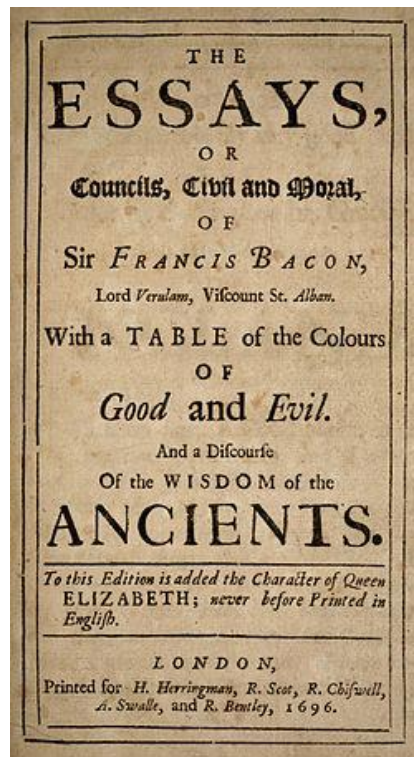
This historical consciousness laid the groundwork for later comparative and historical linguistics. Where philology established that texts had histories, comparative linguistics would also later show that dialects and languages themselves had families and genealogies.

6.3 The rise of vernaculars

Latin remained the *lingua franca* of scholarship, but the Renaissance also witnessed the rise in use of more local languages. Dante, Chaucer, Montaigne, Cervantes, Shakespeare all raised their local languages to literary prestige. This democratised (to some extent) learning and rooted culture in national traditions. But it also introduced the dangers of linguistic nationalism, as well as the privileging of one dialect over others, and later, in the 19th century, the dangerous idea of a ‘spirit of the people’ embodied in its language.

From a CL perspective, the rise of vernaculars broadened the linguistic record. Modern CaDS continues this inclusiveness by examining non-standard varieties and discourse-types in many languages as valid sites of meaning.

6.4 Francis Bacon, the scientific method and the language of empiricism



Essays, 1698 edition © wikipedia

Francis Bacon (1561–1626) is often considered the founder of the systematic scientific method (more precisely of the *physical* sciences; the *human* sciences have various different set principles). In his set of *Essays* (1620) he maintains that a hypothesis can be formed on the basis of observation, but this must then be tested by the meticulous systematic collection of data, emphasising the search for counter-examples to the hypothesis, and, where possible, by experimentation. If the evidence collected piece by piece fails to dis corroborate the hypothesis, we may claim to have discovered a law of nature by the process of induction (having moved from the particular to the general). We may then proceed to predict the behaviour of the system under study by inference (from the general to the particular).

Bacon's hope for a new birth of science depended not only on vastly more numerous and varied experiments but primarily on 'an entirely different method, order, and process for advancing experience'. This method consisted

of the construction of what he called ‘tables of discovery’. He distinguished three kinds: tables of presence, of absence, and of degree (i.e., in the case of any two properties, such as heat and friction, instances in which they appear together, instances in which one appears without the other, and instances in which their amounts vary proportionately). The ultimate purpose of these tables was to order facts in such a way that the true causes of phenomena (the subject of physics) and the true ‘forms’ of things (the subject of metaphysics—the study of the nature of being) could be inductively established. (*Encyclopaedia Britannica*, s.v. ‘Francis Bacon: The Tables of Discovery’. Included under fair use for academic purposes).

Expressing dissatisfaction with Aristotle, who had balanced empirical observation with a search for essences and teleological *purposes*, Bacon insisted that scientific explanations were entirely *causal* explanations, nature does not move towards some predetermined end.

Bacon was somewhat unfair in his criticism. Aristotle’s vision encompasses both physical and human sciences. Whereas nature may not have intentions and purposes, humans certainly do. In our terms, linguistics combines elements of both types of science. We should view languages as evolving functionally as a causal phenomenon in a Darwinian sense. Structures which better express speakers’ needs outsurvive those which don’t. At the same time, speakers choose strategies intentionally to get the best out of a situation (see Partington’s 2003, 2006a work on ‘competitive persuasion’ in press briefings and how participants’ aims and intentions dictate their linguistic choices).

Bacon was yet another philosopher who distrusted language. Just as observation via our senses is not entirely reliable, neither is our use of language given that ‘words are just the images of matter’, and consider, for instance, how the same word can have different meanings to different people (Bacon 1620). This more scientific suspicion

about language is in line with the new philological bent of his day, texts themselves must be examined closely, in the spirit of modern discourse analysis (including CaDS). Trust the text but also ask it questions, stay aware that all corpora are only representative of themselves and comparative analysis across texts and across corpora can be highly informative.

6.5 The language philosophy of humanism

As already mentioned, the language of Scholasticism was criticised by the new moneyed classes (who often had no intention of entering Holy Orders) for being overly technical and abstract.

Two such major critics stand out for the way they treated language not as an abstract system of rules, but as a living practice: Lorenzo Valla (1407–1457) in the fifteenth century and Desiderius Erasmus (1466–1536) in the sixteenth. Both men insisted that meaning resided in *how words were actually used*—in context, in real texts, by real speakers—rather than in timeless definitions or scholastic abstractions. In doing so, they foreshadowed some of the central insights of twentieth-century philosophy of language and functional linguistics.

Valla was first and foremost a philologist and teacher of rhetoric. In his *Elegantiae linguae Latinae* (1444–49/2012), he tried to restore the vitality of Latin by describing how Romans had *really* spoken and written, rather than how medieval grammarians had codified the language. His method was historical and empirical: words should be judged by *usus loquendi*, the actual practice of speakers. This approach also underpinned his famous exposure of the *Donation of Constantine* as a forgery, where he demonstrated that the Latin of the document contained terms that did not exist in the fourth century (1440/1922). Valla also disputed the Scholastic obsession with

dialectic, arguing instead for the primacy of rhetoric—the art of speaking persuasively in concrete circumstances.

Erasmus, a century later, an admirer of Valla, carried these instincts into the wider sphere of European humanism. His Greek edition of the New Testament (*Novum Instrumentum*) revealed how textual variants and translation choices could alter meaning. His treatises on style, especially *De copia* (1512/1963) and *Ciceronianus* (1528/1964), emphasised that the value of language did not lie in mechanical imitation, but in *copia*—the abundance of choices—and in *decorum*, the ability to select the right words for the right occasion, audience, and purpose (a return to Aristotle's *Rhetoric*). Erasmus's *Colloquia* offered lively dialogues full of everyday speech, revealing a sensitivity to conversational tone, politeness, and irony that we would now call 'pragmatic'. Both Valla and Erasmus earn themselves an entry in the online *Stanford Encyclopedia of Philosophy* (not always a given for linguists).

Seen in retrospect, their insistence that meaning depends on use and context resonates strikingly with modern thinkers. Wittgenstein's dictum that 'meaning is use' in the *Philosophical Investigations* is essentially a restatement of Valla's *usus loquendi*. His idea of 'language games' (*Sprachspiele*, that is, social activities with conventional rules) echoes Erasmus's notion of *decorum*: that words gain their sense from the social practices in which they are embedded. Austin's theory of speech acts—that to say something is often to *do* something—has an ancestor in Erasmus's concern with how utterances function to admonish, console, or persuade. Grice's emphasis on intention and implicature likewise recalls Erasmus's sensitivity to irony and indirection, and Valla's conviction that rhetorical meaning often lies beneath the literal surface.

The line also extends to twentieth-century linguists working in a functionalist tradition. J. R. Firth's claim that 'you shall know a word by the company it keeps' is a perfect echo of Valla, a recognition that collocations and historical patterns often tell

us more than dictionary definitions. Halliday's model of language as a social semiotic, with its focus on how grammar realises interpersonal and textual functions, was anticipated in Erasmus's teaching on stylistic choice and rhetorical arrangement. Hymes's (1972) notion of 'communicative competence', echoes the humanist stress on appropriateness, while Erasmus's sense that linguistic form emerges from repeated practice in real contexts could serve as a watchword for formalist corpus linguists such as Hoey.

It would be anachronistic, of course, to call Valla or Erasmus 'proto-Wittgensteinians'. Their goals were moral, civic, and theological, not philosophical in the analytic sense. Yet the instinct they shared—that to understand language we must look at its concrete uses in time and place—returns from time to time from Renaissance humanism to the heart of modern pragmatics and functional linguistics.

Leibniz and the rationalist dream of a Perfect Language

Not all Enlightenment thinkers were content with the messiness of human usage. Gottfried Wilhelm Leibniz (1646–1716), polymath and co-inventor of the calculus, dreamed of a *characteristica universalis* — a universal symbolic language in which all concepts could be expressed with mathematical precision. In this system, disputes could be resolved by calculation rather than debate. Language, stripped of ambiguity, would become a transparent medium of truth. Whatever else, this places him firmly in the 'optimist' camp of language philosophers, indeed, a 'super-optimist'.

This rationalist project prefigures later attempts to reduce language to formal logic, most famously in the work of Bertrand Russell and the early analytic philosophers, for whom *propositions* were the model of linguistic meaning — *logos* without *ethos* or *pathos*, and without communicative intent. In other modern terminology, their interest was entirely in locutions, the notions of illocutionary intent and

perlocutionary effect were spelled out later by Austin (1962 [based on 1955 lectures]; see Chapter 10.1). In a different field, computational linguistics inherits something of the same ambition: the hope that natural language can be formalised, parsed, and modelled without residue.

Corpus linguistics and CaDS stand in almost direct opposition. Where Leibniz and Russell sought perfection in abstraction, Valla, Erasmus and their heirs found truth in usage: messy, historical, contingent, but real. CL's Enlightenment philosophical ancestry is with these humanist empiricists rather than with the rationalist optimists. Yet the dream of a perfect language has never quite disappeared — and even some modern AI projects, like Leibniz's, are sometimes still seduced by its optimism.

Chapter 7: The Strange 18th & 19th Centuries: Part 1

7.1 After Kant: the long detour

From the late 18th through the 19th Centuries, language as a philosophical concern largely fell into neglect. Philosophers who had once wrestled with how words and language relate to thought and truth turned to other themes: metaphysics, political economy, psychology, or the rise of mathematical logic. Language was too often treated as a transparent medium — a mere window to be looked through, not an object of study in its own right.

Paradoxically, these were also the very centuries in which many aspects of the study of language flourished. Philology, historical linguistics, and comparative grammar were born; vast surveys of dialects were conducted; and national languages were cultivated in tandem with the politics of emerging nation-states. Linguists, philologists, and ethnographers were showing how rich, variable, and historically contingent languages are.

7.2 The exceptions

According to ChatGPT and checked on the *Stanford Encyclopedia*, a few thinkers in this period did keep language at the centre of attention:

- **Johann Gottfried Herder (1744–1803)** argued that thought was inseparable from the historically situated speech of a community (*Treatise on the Origin of Language*, 1772). Language was not just a tool for expressing ideas but constitutive of thought itself.
- **Jeremy Bentham (1748–1832)**, in his attacks on ‘fictions’ and his paraphrastic method, highlighted the way words can mislead as much as clarify (*An*

Introduction to the Principles of Morals and Legislation, 1789). Another pessimist.

- **John Stuart Mill (1806–73)** distinguished between denotation and connotation, and carefully examined the difference between names and descriptions (*A System of Logic*, 1843). These analyses foreshadow debates on reference in the 20th century.

Franz Brentano's doctrine of *intentionality* (*Psychology from an Empirical Standpoint*, 1874) revitalised the idea that mental acts are always directed toward something, that the hallmark of mental life is that it is always 'about' something, prefiguring Searle's (1983) discussion of *aboutness* in the philosophy of mind.

But above all others stands Wilhelm von Humboldt (1767–1835) the first truly modern linguist we never fully inherited.

7.3 The von Humboldt Paradox — the almost forgotten inspiration of linguistic philosophy

Wilhelm von Humboldt (1767–1835) is generally remembered, if at all, as a pioneering philologist and champion of comparative language studies. Yet his deepest project was into the philosophy of language: to explain how language makes thought possible, and his work, though so often neglected in the literature, feels modern, both conceptually and methodologically.

7.4 Language as the formative organ of thought

In his seminal 1820 paper *On the Comparative Study of Language and its Relation to the Different Periods of Language Development*,²¹ Humboldt declared that language is not a mere vehicle for ideas already formed. It is a ‘formative organ of thought’ (*das bildende Organ des Gedankens*)—the very means by which concepts come into being. This made any categorical split between ‘philosophy of language’ and empirical linguistics, still common today, impossible for him to conceive:

For not only could there be no discipline of linguistics without a conceptual base and firm philosophical grasp of its many-faceted object of inquiry but, Humboldt maintained, empirical research into actual language use in different languages with quite diverging structures would provide the philosopher with concrete insights into the nature of human language that would otherwise not be attainable (*Stanford Encyclopedia of Philosophy*).²²

Humboldt’s vision of language is of functionally evolved structures which both shape, inspire, and constrain communication. Most fundamentally, the *linearity* of language — speech unfolding through time, writing moving across the page (left to right, right to left, or vertically) — means that we cannot express all aspects of an event simultaneously. Linearity forces us to place participants and processes in an order, often encouraging us to construe events in terms of actor, acted-upon, and audience, thereby implicitly or explicitly assigning responsibility, merit, or blame (transitivity both allows and encourages evaluation; Partington 2015, 2025 pp. 41-45). This insight sits at the heart of modern Hallidayan systemic–functional grammar and is central to the work of CL pioneers. Sinclair emphasises linearity in Sinclair 1991, Ch. 2 as well as

²¹ *Ueber das vergleichende Sprachstudium in Beziehung auf die verschiedenen Epochen der Sprachentwicklung*, GS 4: 1–34. GS stands for *Gesammelte Schriften*, Wilhelm von Humboldt’s collected works, published in 17 volumes by the Prussian Academy of Sciences between 1903 and 1936.

²² Mueller-Vollmer, Kurt and Markus Messling, "Wilhelm von Humboldt", *The Stanford Encyclopedia of Philosophy* (Winter 2023 Edition), Edward N. Zalta & Uri Nodelman (eds.), URL = <<https://plato.stanford.edu/archives/win2023/entries/wilhelm-humboldt/>>.

prospection, that is, the forward-organising tendency of language, whereby earlier choices constrain and predict what is likely to follow in structure, meaning, and discourse function.

The same functional pressures reappear in LLMs: nothing is more central to their operation than the linear prospection of the next most probable item. In this and other ways, LLMs simulate the constraints of functionally evolved linguistic structures rather than operate outside them. As ChatGPT puts it:

Even contemporary language models operate prospectively: each generated token shapes the expectations for the next. Prospection is not merely a feature of human discourse but of any sequential meaning-making system. (24/11/25)

Humboldt, language's linearity, the prospective unfolding of discourse, including evaluative cohesion

Humboldt's vision of utterances mediating thought, not least by unfolding over time, should have put the final nail in the coffin of views of language as representation (Locke), or mere labelling (Augustine) and even have precluded the early Wittgenstein's mental/linguistic 'pictorialism'.

It can be seen as evolving into Sinclair's notion of prospection — the forward-organising tendency of discourse. And it is also vital for understanding evaluative cohesion, my own — a student at Birmingham University of both Sinclair's and Hoey's — corpus-assisted rereading and re-evaluating of Hoey's pre-CL work on textual organisation (Hoey 1983, 1991). I argue that much evaluative meaning is not delivered at the moment of judgment but set up in advance: the articulation of a [Problem] prospectively prepares a (Solution); a narrative of [failure] can anticipate a [condemnation]; a positive (promise) projects an assessment of (fulfilment) or [betrayal], Cause alerts us to an Effect/Consequence and vice versa, both will be generally be of the same evaluative polarity (e.g. a faulty Cause will tend have a

negative Consequence). We are also primed to recognise cohesion by negative vs positive Contrast (see Hoey's text [2005, 134-136] comparing Generals Lee and Grant) and Crescendo, an evaluation becomes progressively harsher or more laudatory throughout a text (typical of media op-eds).

Prospection shows that evaluation is not only a static description but the orchestration of expectations, a dynamic pressure shaping what is likely to follow, creating a discourse cohesion that aims to guide perlocutionary evaluative comprehension (Partington 2017, 2025, 2026 [with Diegoli]).

This stands in contrast to the earlier traditional 'representationalist' model expressed by Locke in *An Essay Concerning Human Understanding* (1690), in which language is treated as a deterministic vehicle for the expression of thought. We ruminate, evolve thoughts, simple and complex, in the mind, and language as communication is the direct utterance of these ideas. Words are conventional signs which represent thoughts that precede them. Humboldt, by contrast, treats communication as an active, evolving system that participates in shaping human meanings rather than merely conveying them.

7.5 Methodological modernity

A thoroughly committed post-Bacon empiricist, his work incorporated what today we think of as the embodiment of modern research, mixed-methods triangulation (indeed 'septangulation' or 'octangulation' even). He read voraciously across document types, combined statistics (including frequency counts) with historical and ethnological data, and invented modern linguistic fieldwork, working with native speakers from the Basque country (first hand) to the American native languages (second hand through other researchers). Maybe it was partly sibling affection

speaking, but his brother, Alexander, an exceptional polymath himself, wrote that it had been granted to Wilhelm:

to penetrate more deeply into the structure of a larger number of languages as probably have ever been grasped by one human mind. (Humboldt 1836: viii)²³

His Basque studies were decisive, both for the field itself since they overturned previous research on a language whose origin and structure had defied all attempts at an explanation by historians, philosophers and linguists following conventional methodologies of the time, and also for his own philosophy of language. They led to his formulation of a new conception of language questioning and defying the representational view of language that had been dominant in Western thinking from Aristotle all the way to the empiricist and rationalist thinkers of his day. Language, he wrote, 'exists only in connected discourse; grammar and dictionary are hardly comparable to its dead skeleton' (GS 6: 147). Not until the 'Second Wave' of Corpus Linguistics (aka CaDS) at the turn of the 21st Century was this to become a commonplace view of language and discourse-types.

7.6 Language as civilising force

For Humboldt, language and self-consciousness arise together:

precisely when man (sic) awakens [into self-consciousness] ... the word is there as the first impulse which man gives himself to stand still, to look around and to orient himself.

(GS 6: 152)

²³ <https://plato.stanford.edu/entries/wilhelm-humboldt/#SomeEsseHumbUndeLang>

More precisely, to orient himself with *others in a society*. Rather than the site of violent struggle of Nietzsche and Foucault and his deconstructionist companions, language is the great civiliser. This places him at the forefront of the ‘linguistic optimists’ we have included as one of the three ‘over-schools’ in the philosophy of language - to recapitulate: optimists (language as super-power), pessimists (language as dangerous and treacherous) and the ‘takers-for-given’.

7.7 Anticipations and influence on 20th Century linguistics. In summary

- Structuralism and phonology. Humboldt held that every sound in a language is defined *relationally* ‘in relation to the others (*in Beziehung auf die übrigen*) that make up the entire sound system’ (*Lautsystem*) of that language (GS 7: 67), anticipating Saussure and Jakobson by a century.
- Comparative and historical linguistics. His 1820 plan for a ‘new discipline of comparative linguistics’ was laid out in his essay ‘On the Comparative Study of Language and its Relation to the Different Periods of Language Development’.²⁴ The value of comparison has become axiomatic in discourse studies, including CaDS (Partington, Duguid and Taylor 2013. pp 12-14)
- Humboldt’s insistence on language as activity (*Energeia* or *Tätigkeit* ‘work in action’), a dynamic, creative process and not as a fixed product (*ergon* or *Werk* ‘work as finished product’) was an anticipation of the later Wittgenstein’s view as language as a box of tools which speakers use to get things done. That for over a century Humboldt’s message went practically unheeded (indeed much of his work is still untranslated) in mainstream philosophy is astonishing. What is more, though, is that Humboldt’s insistence represents a clear and present

²⁴ Ueber das vergleichende Sprachstudium in Beziehung auf die verschiedenen Epochen der Sprachentwicklung, GS Vol 4: 1–34)

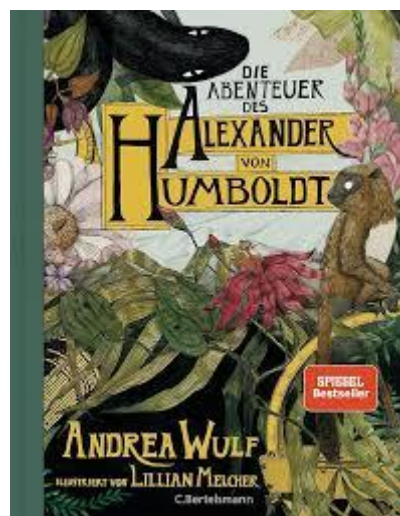
warning to corpus linguists. All too often in the history of CL there has been the perilous tendency of conceiving of one's corpus, whether an institutional one like the BNC, or a bespoke one compiled by a team for a specific research project, as a finished product. Indeed a corpus is essentially and unavoidably a *record* and *evidence* of past production, a linguistic trace (Biber 2006; McEnery and Hardie 2012). But we should always bear in mind that this 'once-was' language was originally practical present communication in which speakers or writers were using language for work to be done, effects to be achieved, influence over an audience to be effected.

- Humboldt's claim that language exists only in connected discourse (GS 6:147) prefigures the usage-based view of language as ongoing activity. This anticipates the functional-systemic tradition (Malinowski, Firth, Halliday, Sinclair, Hoey) and much of modern corpus linguistics, where the central object is language in use, not idealised structures (as in much non-usage based cognitive studies).
- He rejected the rigid division between philosophy of language and empirical linguistics which had bedeviled thinking about language for so long, insisting each informs the other. This ideal directly influenced European structuralism (the Prague School) and modern linguistic anthropology, where descriptive work and conceptual analysis are interdependent.
- His combination of fieldwork, textual analysis, statistics, and ethnology set a template for the broad, data-rich investigations that became standard only in the late 20th century (with corpus compilation, sociolinguistics, anthropological linguistics). His methodologies were maintained in philology, dialectology and comparative language study, but were quickly abandoned by much of German mainstream philosophy, which continued its love affair with debates for and against abstract idealism (Hegel, Fichte), historical

determinism (Marx) and valiant if somewhat armchair-ish (Fillmore's 1992 term) attempts to integrate the scientific revolution into 'traditional' philosophical programmes, which generally ignored Humboldt's early partial success in so doing.

Appendix: Wide, deep, and hard to encompass?

Humboldt founded a university, corresponded with major thinkers across Europe and even carried out his own investigations into indigenous American languages via manuscripts, grammars, and reports, brought to him via proxies including his brother, Alexander. Much of his vast corpus remains unpublished or untranslated. Perhaps Humboldt is 'half forgotten' because he was too wide-ranging and too profound to be easily classified. But his contribution to late-20th-century linguistics lies both in substance and method. He modelled a discipline where philosophical depth and empirical breadth are inseparable; where languages are dynamic systems of patterned activity, and where cross-linguistic diversity is explained by history, culture, and communicative practice. Figures from Saussure and Jakobson to Halliday and Sinclair can all be read as heirs—conscious or not—of Humboldt and make him (or should have made him) a pivotal figure in any history of the philosophy of language.



Humboldt's brother. Alexander, polymath, 'adventurer' and 'the first naturalist' collected data on several indigenous languages for his brother to analyse.

Chapter 8: The Strange 18th & 19th Centuries: Part 2

8.1 Saussure

Saussure is intellectually of the 19th Century (with his philological and Neogrammarian groundings) even if his posthumous book anchors 20th Century structuralism (*Cours de linguistique générale*, 1916). His insistence on the arbitrariness of the sign, that in all but a few instances (sound symbolism and onomatopoeia being the exceptions) the signifier (word form) is associated with its meaning(s) only by conventional agreement among speakers, not by some mystic union and the idea that linguistic units have value only within a system of differences were to inspire structuralism and later semiotics. And finally vanquished once and for all was the Cratylan dream of a natural bond between words and the things they denote.

His celebrated distinction between *langue* and *parole* proved as problematic as it was influential. *Parole* belongs to this world: the messy, everyday stuff of communication, full of ‘faults’ (misspellings, false starts, dangling prepositions, split infinitives). *Langue*, on the other hand, is a perfect form of lexis and grammar which exists, well, nowhere—except in the aspirations of grammarians, lexicographers, and prescriptive language teachers. It is pure Platonism: the fallen world set against an otherworldly ideal of forms.

The dualism resurfaces in Chomsky’s distinction between *performance*, that is, what people actually do with language—making it work for them — and *competence*, supposedly lodged in the mind of a mythical ‘idealised speaker,’ or perhaps better, idealised ‘knower,’ of the language (God perhaps?). Competence in this sense is the true object of the linguist’s research; performance, but a sinful distraction to be forgiven and forgotten.

CL and CaDS have since blown such dualisms away. Language *is* human performance, the doing of work. No two speakers of a language have anything approaching the same competence; they share just enough similar primings to communicate successfully (Hoey 2005). And there is no such thing as a single, unitary *langue*: all languages are, in practice, vast and proliferating collections of discourse-types, each serving a purpose in a given situation.

8.2 Philology, dialectology, nation

Beyond Saussure, the great 19th Century achievement was the professionalisation of language study. Schleicher's family-tree model (1853) and the Neogrammarian 'sound laws' (Osthoff & Brugmann, 1878) gave historical linguistics its first robust methods. Grierson's *Linguistic Survey of India* (1894–1928) catalogued hundreds of languages and dialects on a continental scale. In Europe, Wenker's *Sprachkarten* (1880s) and later Gilliéron and Edmont's *Atlas linguistique de la France* (1902–10) gave rise to dialect geography.

Meanwhile, the rise of nationalism made 'national languages' into instruments of statecraft (modern 'standard Italian' for instance is a pure post-1860s State invention). Dictionaries, grammars, and school curricula were pressed into service as tools of standardisation and national identity. This was important philosophically too: it shattered any idea of language as a universal essence and showed instead its historical contingency and social rootedness.

8.3 Why the 'snub' persisted

Why do so many philosophers still ignore language? The on-line *Stanford Encyclopedia of Philosophy* and tomes like the *Oxford Companion to Philosophy* have

no entries for Saussure, Firth or Sinclair. The explanation is both an ironical paradox and mundane. Just as it was beginning to be understood, by Herder and then Humboldt that language was more complex and interesting than just first, Cratylan then Lockean simple representation or mirror of thought, but interacts and mediates thinking, the spirit of specialisation or ‘fence-building’ began to creep in. Mundanely (and humanly): the academic division of labour and specialisations set in. Kant (1724-1804) was the first ‘professional Philosopher’ since the Scholastics, following whom it was common for philosophers to hold university chairs (sharply criticised by Schopenhauer as bad for the subject; Magee 2010, 154) Scholars who actually studied languages in detail were deemed philologists, not philosophers. Rather than the former being viewed as a category of the latter, the ‘disciplines’ drifted apart, with long-term consequences.

On the one hand there were ‘pure’ philosophers, on the other hand philologists, historians of language, then linguists of various stripes, including corpus linguists. If philosophy had not abdicated its ancient (since Aristotle) responsibility for understanding human communication, linguistics and the study of discourse would never have needed to exist as separate disciplines. And are Firth, Halliday, Sinclair, Hunston and Hoey also not ‘lovers of wisdom (*sophos*)?

Meanwhile ‘pure’ philosophy, in the German states at least was seduced by utopianist idealism. In a kind of theology without a personal God, Hegel and Hegelians replaced God with *Geist* — Spirit, Mind, Reason, in the unfolding of historical self-consciousness (teleology returning to philosophy with a vengeance, including in Hegel-derivative Marx, in which mysterious historical determinist forces replace *Geist*). To repeat, language, if thought about at all, was pulled back towards the Lockean vision as a simple vehicle for thought.

In addition, the birth of new sciences of mind distracted attention away from language’s role as mediation of thought. Psychology, and later experimental

cognitivism seemed to promise direct access to thought, leaving language sidelined as a mere by-product. Yet the promise – of using the mind to study the mind – is an enterprise fraught with perils and hidden complexities. It has resulted in numerous dead-ends from the long history of regarding language as representation to the box-ticking circular approaches of many cognitivist schools, taking introspection as the full and only method and ‘truth’. The great advantage of CL is precisely its capacity to reorganise language from multiple perspectives, breaking for the first time — and with machine assistance — out of the cognitive hermeneutic circle (13.2). Early forms did so by inference; Hoey’s Lexical Priming (2005) and the wider CaDS tradition grasp the nettle directly, showing how cognitive tendencies can be observed, not merely intuited, through patterned language use.

Language disappears from philosophy yet again: From Herder to Marx

Herder and Humboldt (late 18th – early 19th century)

The two treat language not as a passive mirror of thought, but as something people actively *do*. Language is creative, cultural, endlessly varied. It gives you a *perspective* on the world, not a prison. And comes from use, from speech-in-action, from how communities actually talk.

In short: language is a living activity, not a container for concepts.

Hegel (early 19th century)

Enter Hegel — and suddenly everything changes direction. The real story is the unfolding of *Geist* (Spirit), a great historical drama working itself out over centuries. Language here becomes more of a symptom of what *Geist* is doing than a topic worth studying in its own right.

And so: Herder’s and Humboldt’s intuitions disappear as Grand Metaphysics take centre stage and language gets pushed to the wings, if not off-stage entirely.

Marx (mid–late 19th century)

Marx keeps Hegel's machinery but swaps the metaphysics for material conditions, class struggle, and economic forces. The dialectic remains; the teleology remains, that is, the idea of history having an inevitable direction remains. Language again is not the star. It becomes an expression of underlying material relations, accidental to economics and power.

In short: Hegel without *Geist*; the same plot, different actors. Plus Marx unwittingly revived Plato, placing the latter's utopian ideal world as the 'end of history'. And once again, Humboldt's subtle view of language-as-activity and mediation of ideas gets buried.

In short:

Herder and Humboldt try to put language at the centre of human life; Hegel moves the centre to *Geist*; Marx moves it to pseudo-scientific materialism and language gets sidelined twice over.

8.4 Nietzsche, Marxism, Foucault, 'Critical' Discourse Analysis

Friedrich Nietzsche (1844–1900) returned language to the battlefield. Rhetoric, for Nietzsche, was not a superficial ornament but the very means by which valuations are imposed, contested, and inverted (see the Box below).

As noted, Marx (1818–83) himself wrote little on language and what is more a case could be made that he was a fine historian, an atrocious futurologist and barely considered himself a 'pure' philosopher. It was Vološinov's *Marxism and the Philosophy of Language* (1929) that treated verbal interaction explicitly as a site of ideological struggle, emphasising that meaning is socially constructed and contested.

Foucault (1926–84) later substituted the Marxian idea of ideology with that of ‘discursive formations’, historically specific systems that determine what can be said and who can say it (*The Archaeology of Knowledge*, 1969).

Modern Critical Discourse Analysis (CDA)²⁵ inherits elements of all three. At its best (Baker 2006), CDA continues Nietzsche’s suspicion of received truths and Vološinov’s insight that ideological meanings too are social. At its worst, it lapses into determinism: language as nothing but power, speakers and writers as its agency-less bearers.

This is in sharp contrast to CL and CaDS which both work from the opposite premise: language patterns can be studied empirically, hypotheses must be falsifiable, and alternative explanations must be entertained. Where CDA often begins with an ideological suspicion, CL begins with data, asking what patterns actually recur and what communicative work they perform. CaDS begins with a research question, open to corroboration or disconfirmation. The spirit is Popperian, not Nietzschean or Marxist.

The long historical juxtaposition is striking. Plato thought language should be controlled by the intellectually righteous (i.e. philosophers). Marxists argued it should be shaped by the morally righteous (i.e. Marxists). In the 20th Century, both the far-right and the far-left attempted to control who had the ‘right to speak’. CDA sometimes reproduces this logic, reducing language to a site of domination. But corpora remind us that even under constraint, speakers innovate, subvert, and resist.

²⁵ The euphemism ‘Critical’ (as in ‘Critical Theory’ and ‘Critical Discourse Analysis’) was adopted by the Frankfurt School, which had migrated to the USA, to replace ‘Marxian’ or ‘post-Marxist’ thinking in the US during the Cold War. The great ironic paradox is that ‘Critical studies’, being ideologically driven and therefore self-evidently ‘correct’, persistently refuse any *criticism* of them, and particularly any Popperian self-analysis or self-critique (Eagleton 2003).

Nietzsche and the Return of High-Stakes Language

In the period following Kant, language was largely treated as an auxiliary concern — an instrument of logic, a medium for communication, or a mirror of thought. Philosophers focused on the grand dichotomies of rationalism and empiricism, or the struggle to reconcile metaphysics with science. Language, if mentioned at all, was treated as a transparent medium: useful, perhaps flawed, but not philosophically dangerous.

Then came Nietzsche.

In his 1873 essay *On Truth and Lies in a Nonmoral Sense*, he detonated one of the most radical critiques of language in Western thought. Truths, he claimed, are merely ‘a mobile army of metaphors ... illusions which we have forgotten are illusions’. Words do not reflect reality he argued; they construct it — including politically. Where Plato feared rhetoric as a corrupter and Aristotle praised it as a tool, Nietzsche insisted language was a battlefield, a site where competing wills struggle to impose their worldview. Rhetoric, so often demoted by philosophy, returns with a vengeance as the means by which evaluations are imposed, contested, or inverted.

The consequences were immense. His hyper-suspicion of language helped ignite the 20th Century ‘linguistic turns’, inspired theorists from Weber to Gramsci (history as the battleground of cultural ideas), and fuelled postmodern thinkers like Foucault (‘It was Nietzsche who won me over’)²⁶ and Derrida. From fascist propagandists to radical deconstructionists, Nietzsche’s bomb kept exploding. No wonder P. G. Wodehouse’s Jeeves would later call him ‘unsound’.²⁷

For language philosophy, Nietzsche is salutary and dangerous. Salutary, because he breaks the complacency that words merely mirror facts and reminds us that meaning

²⁶ Interview with Duccio Trombadori (1978, published 1980: ‘*Fu Nietzsche a conquistarmi*’). Republished in *Remarks on Marx (Semiotext(e)*, 1991).

²⁷ ‘You would not enjoy Nietzsche, sir. He is fundamentally unsound.’ *Carry On Jeeves*.

is an achievement under pressure. Dangerous, because the slide from ‘be suspicious’ to ‘there is nothing but power’ is quick, and once taken it collapses the very distinction. Taken naively, high-stakes language produces an interpretive monoculture: all discourse is reduced to domination.

And yet, not all followed this path of suspicion. CL (nothing if not pragmatist) offers a quiet but important counterpoint. Nietzsche warned that language can never be trusted, corpus linguistics replies: *perhaps not — but it can still be observed*. Meaning emerges not from metaphysical despair but from empirical pattern. This is where the Wittgensteinian — Prague — CL tradition repairs the picture. Language is not just a loaded weapon; it is also a tool for coordination, inquiry, consolation, persuasion and even play. Language tools are plurality institutionalised. Corpus evidence shows recurrent patterns that enable mutual prediction; they are the scaffolds of cooperation as much as sites of contest. Meaning is conventional enough to be shared, plastic enough to be bent.

Nietzsche’s great insight was to show that language is not always innocent: words are not always transparent labels for a pre-given reality but rhetorical weapons in struggles over value. Yet some of his 20th Century heirs appear to misapprehend this insight. Whorfism, Foucault and the more radical strains of CDA often read this to mean that *whoever controls discourse controls society*. But history suggests the arrow runs in the other direction: those who already hold power can use language as one of their tools, among others, to maintain and legitimise their position. The medieval Church did not owe its dominance to Latin; it used Latin because it was already dominant. Arabic did not spread across the Middle East and North Africa because of its linguistic properties, but because conquered peoples found it expedient to adopt the language. Nazi propaganda was powerful, but so was that of *international* socialism, the former erasing the latter in Germany predominantly after the Nazis had seized power through violent *action*. Language matters—it can consolidate,

legitimise, and extend power—but it does not conjure power out of thin air. Nietzsche was half right: language is indeed a battlefield. But it only becomes one because there are armies already fighting.

Nietzsche's 19th Century philosophical shadow – distorted by his sister (see below) - falls darkly on 20th Century in the frequent hyper-suspicion of discourse. The empirical-observational tradition of CL continues to mark out a different path: not of despair at language, but a cautious trust in the text.²⁸

After Nietzsche's death, his sister, Elisabeth Förster-Nietzsche, took control of his manuscripts, editing and publishing them selectively to suit her own ultranationalist ideology. This profoundly distorted his posthumous image, turning a vehemently appalled *critic* of antisemitism and herd-thinking into a supposed prophet of nationalism. For decades, Nietzsche's authentic philosophical voice was filtered through this falsified lens — a cautionary tale in how mediation can reshape meaning, and how important research into sources can be. It would be a mistake to believe that corpus linguistics is a guarantee of immunity; even corpus data can be skewed by its compilers and ideologically-driven users 'to prove almost anything' (Aston and Burnard 1998, p 7)). Only in the 1960s was Nietzsche's original voice restored, in quite a detective story with a haunting moral (Colli and Montinari [eds.] 1967-77; Montinari 1996).

There is in fact a lesson for CL here. The same linguistic mechanisms of framing, selection, and repetition that corpus linguistics values are also those by which societies perpetuate prejudice. There is no better – or rather worse – illustration than the recurrence of antisemitism in different forms in different times and places, including –appallingly – today.

²⁸ Nietzsche reputation was much sullied by his antisemitic German-nationalist sister's editing of his posthumous manuscripts. Nietzsche himself would have nothing to do with German Jew-haters, including Wagner or his editor.

The Many Meanings of *Wille*

The German term *Wille* is notoriously difficult and dangerous to translate. English *will* suggests intention or volition, but in nineteenth-century German philosophy *Wille* often carried wholly abstract, quasi-metaphysical meanings far removed from everyday agency.

For Schopenhauer, *Wille* was not human will at all but a blind, universal life-force, a metaphysical substratum underlying all phenomena — closer to ‘cosmic striving’ than to any psychological notion. Nietzsche repudiates this metaphysics, but even his ‘Will to Power’ is not volition: it refers to plural, affective drives, an interpretative and physiological pattern in living things rather than a conscious intention. In both cases, *Wille* belongs to the speculative tradition that sought hidden inner forces beneath behaviour. Although Marx claims to reject metaphysics, he inherits from the German philosophical tradition the idea that human affairs are driven by deep, impersonal forces, historical necessity and the laws of motion of capital. These function as political-economic versions of the earlier *Wille*: not conscious intentions but numinous-forces pushing society along a predetermined path. In this respect Marx retains a semi-mystical determinism, even as he claims materialist credentials

Modern functional linguistics — especially CL and CaDS — operates on a completely different plane. It treats language as observable, patterned, functional behaviour, shaped by communicative purpose, cognitive economy, and social evaluation. Speakers have *will* only in the everyday sense: intentions, preferences, stances, and choices that leave empirical traces in discourse. CaDS is deliberately anti-mystical: it explains meaning through recurrence, distribution, and speakers’ communicative aims and definitely not through metaphysical essences.

8.5 Back to the philosophy of language proper

By the end of the 1800s, the philosophy of language finally begins to re-emerge as a central concern. After nearly two centuries of relative neglect, several different traditions converge, and this creates the conditions for the explosion of 20th Century language philosophy.

One line of development comes through mathematical logic. The German mathematician and philosopher Gottlob Frege argued that the meaning of an expression has two aspects. First, there is its *reference* (the thing in the world it points to), and second, there is its *sense* (the way in which it presents or describes that thing) (*Über Sinn und Bedeutung*, 1892; in English, 'On Sense and Reference'). His favourite example was the 'Morning Star' and the 'Evening Star.' Both refer to the same planet, Venus, but they have different senses, because they present it in different ways. Frege also insisted that the meaning of a whole sentence depends on the meaning of its parts and the way they are combined — the principle of *compositionality* (*Begriffsschrift*, Frege, 1879). This kind of thinking would feed directly into what later became analytic philosophy, and is echoed in Firth's dictum of the company that words keep (or indeed *avoid*, Hoey 2005) But see also the Section 9.1.1. One hand gives, the other takes away.

At the same time, in Britain, Bertrand Russell and G. E. Moore launched a revolt against the hazy abstractions of 19th-century idealism. Russell developed theories of reference, such as his famous *theory of descriptions* (*On Denoting*, 1905), designed to show how language can be analysed logically in order to avoid philosophical confusion. Moore, meanwhile, championed 'common sense,' insisting that philosophy should take ordinary language and ordinary facts seriously (Moore, A

Defence of Common Sense, 1925). Together, they reopen the question of how words connect to the world and to thought.

And in the United States, pragmatism was offering a still different emphasis. For thinkers like Peirce and James, the meaning of a concept lay in its practical consequences. Peirce, in particular, developed a triadic model of the sign: every sign involves (1) the form itself, (2) the object it refers to, and (3) an interpretant — the effect the sign has on a mind, or the interpretation it generates, similar to Austin's (1962) perlocutionary effect (Peirce, *Collected Papers* 1932, esp. 2.228–2.231). This made communication not a simple two-way link but an ongoing process of interpretation, a dynamic chain. The American pragmatists said nothing directly about corpora, but a case could be made that their emphasis on meaning as use, on public evidence, and on the testing of hypotheses created an intellectual climate in the United States in which empirical, data-driven projects such as the Brown Corpus could flourish.

What all of this meant is that, as the 20th century opened, philosophy of language was being pulled back into the centre of philosophical debate — but from very different directions. Logic, 'combinatorics', structural linguistics, and pragmatism were all demanding a fresh focus on how language actually works.

For our purposes, this is crucial: it sets the stage for the two dominant currents that follow. On the one hand, analytic philosophy, from Frege and Russell through to the early Wittgenstein, focused on logic, reference, and clarity of expression. On the other, the more functional traditions (from Humboldt, Boas, the Prague School and the later Wittgenstein and, in a second phase, Malinowski, Firth, Halliday, Sinclair) stressed how language operates as a social tool, how it varies across contexts, and how it shapes human interaction. These two paths often clashed, but together they mark the true revival of philosophy of language after its long semi-eclipse in the 18th and 19th centuries.

On 'Choice'

Choice is a leitmotif running through the philosophy of language at every level.

Micro-level choice. Saussure insisted that a linguistic sign (e.g. *cat*) does not acquire meaning because of some intrinsic property or natural link to the animal, but *only because it is not dog, rat, cap*, etc. Value is therefore relational: each element has identity only through its *difference from other elements* in the system. Thus paradigmatic selection, i.e. when one says The ____ is on the table, you choose among nouns (*book, pen, cat*). This is where the system presents a set of possibilities and you make a choice. Of course, this is not how communication works in practice (we want to say what we actually see on the table); we might call paradigmatic selection a hyper-theoretic notion, or talk of speakers' *virtual choices*.

Sinclair's 'open-choice principle' versus the 'idiom principle' can be read as an empirical deepening of Saussure's insight: language use is an ongoing negotiation of systemic options (paradigmatic choice) and habitual patterns (or 'syntagmatic routines'). His innovative notion of 'the lexical item' is a sort of phrasal template consisting of fixed, constant elements (i.e. syntagmatic routines) and variable elements (the variation very generally being grammatically or semantically constrained), e.g. <person / pronoun> *will not / won't / wouldn't* hear a word against <entity / person / pronoun> e.g. 'she wouldn't hear a word against her father'; 'He will not hear a word against the country's rugby' (from the SiBol corpus).²⁹ The constant elements ('hear a word against') provide the idiomatic frame, while the variable slots are constrained grammatically or semantically (animate subject and target of loyalty). Sinclair brings Saussure's syntagmatic axis into the real world of

²⁹ The SiBol corpus is available via *Sketch Engine*: <https://www.sketchengine.eu/>

communication: real, repeatable phrasal routines with built-in choice points, observable and measurable.

Stylistic / rhetorical choice: Speakers and writers constantly choose register, stance, and framing depending on audience and purpose. Every utterance is a choice of 'voice': formal or informal, ironic or earnest, deferential or confrontational — a dimension of choice that carries as much semantic weight as the words themselves.

Diachronic or community-level choice: Languages —and individual discourse-types — are shaped over time by innumerable distributed decisions: the gradual preference for one sound over another, the adoption of loanwords, the standardisation of spelling or syntax. No single speaker intends these changes, yet together they produce historical shifts. Language history is thus the sediment of countless small choices, most of them unconscious. Just occasionally they are also conscious, e.g. the choice of a Tuscan dialect to perform as standard Italian in the 19th Century.

Macro-level choice. Philosophers' choice of concepts and schools: logic, phenomenology, social theory, and so on, almost *ad infinitum*.

Political denial of choice. These would include Marx's historical inevitability and Foucault's discursive closures. But these are paradoxical: if choice is impossible, how are we free to diagnose its impossibility?

Corpus insight. No two speakers share identical competence. Communication works through overlapping primings, not identical systems. Language is patterned freedom — a landscape of affordances and choices rather than a prison (Hoey 2005).

Chapter 9: The Long 20th Century. The Return of Language Philosophy

9.1 Logic versus natural language: Frege, Russell, and Moore

9.1.1. *Frege and Russell: Logic first, language later (if at all)*

It is worth beginning with what may sound like heresy: Frege and Russell, often hailed as pioneers of the modern philosophy of language, were in fact far from being concerned with language as it is used. Their project was primarily mathematical. Both were preoccupied with grounding arithmetic and logic in secure foundations, and for them natural language was at best a vehicle for abstract propositions, at worst a distraction.

Frege's insistence that logic is independent of the human mind was a deliberate break from centuries of Aristotelian thought, where logic had been treated as a faculty of human reasoning (Frege, 1879/1967). His solution was to detach propositions entirely from speakers and writers. They were to be treated as mind-independent objects. From our perspective, this abstraction stripped away the interactive, situated dimension of language; its use by *people* in actual communicative situations.

Russell, for his part, was primarily engaged in the logical analysis of statements. His famous example—'The King of France is bald'—illustrates his theory of descriptions (Russell, 1905). But it is tellingly artificial: a statement designed to show how a sentence might fail to have truth-value when its referent does not exist. It belongs to the world of invented thought-experiments rather than authentic utterances. In

modern CL, it would be classified as a non-authentic example.³⁰ Russell's great ingenuity in translating natural language into logical propositions paradoxically held back the study of language as a living practice (Russell, 1918/1956); as we said, as one hand gives, the other takes away.

9.1.2 The Fregean Sense/Reference distinction

Frege's most enduring contribution is the distinction between *Sinn* (sense) and *Bedeutung* (reference). His example of the 'morning star' and the 'evening star' remains a standard textbook illustration (Frege, 1892/1948). Similarly, common experience tells us that the word 'bank' may refer to a location on the high street (the referent) but carries with it a sense tied to its functions and activities.

With hindsight, the distinction is less revolutionary than often portrayed. The Scholastics had already elaborated theories of supposition to capture similar distinctions (Ashworth, 2003). What Frege did was to reframe this insight in the language of formal logic, abstracted away from use and context. From our vantage point, it looks less like a turning point in the philosophy of language and more like another stage in a tradition of treating language as an object of logical analysis rather than human interaction (Dummett, 1981).

9.1.3 Moore and the recovery of common sense

In contrast, G. E. Moore represents something closer to the tradition that would eventually converge on discourse and corpus studies. Inspired by Berkeley, Moore rejected Locke's suspicion of words. Locke had argued that language was an unreliable medium, a clumsy set of signs to be replaced by clearer mental ideas wherever possible (Locke, 1690/1975). Moore, following Berkeley, insisted instead

³⁰ Yet it is not impossible to imagine a setting where it would be authentic use in, say, a historical novel.

that thought is inseparable from language, and that meaning cannot be reduced to a silent realm of ideas (Moore, 1925).

Moore's 'common-sense philosophy' is often remembered for its defence of ordinary beliefs ('Here is a hand'). But its significance lies in his recognition that language is not exhausted by its role in stating propositions with truth-values. It also persuades, influences, appeals to emotion, and expresses the shared assumptions of everyday life (Moore, 1903/1993). In this, he can be seen as a precursor of pragmatics and discourse analysis, recalling Aristotle's recognition in the *Art of Rhetoric* that language is always behaviour and action as well as representation.

Moore was also sharply critical of the intellectual climate of his peers, accusing them of intellectual self-indulgence, preferring abstract puzzles to the ordinary workings of language. His insistence that philosophy should attend to ordinary usage foreshadows Wittgenstein's later reflections on language as a 'tool-box' for human activity (Wittgenstein, 1953). From our perspective, the pivot in the early 20th century is not Frege and Russell, for all their brilliance, but Moore. He reopened the Aristotelian line of thought: language as a tool for action, not merely a set of propositions to be tested for truth or falsity.

9.2 Language philosophy in Ludwig Wittgenstein: Language as use

9.2.1 Introduction

Ludwig Wittgenstein's two landmark works, *Tractatus Logico-Philosophicus* (1921) and *Philosophical Investigations* (1953), illustrate a radical shift in twentieth-century linguistic philosophy. The *Tractatus* presents a tightly structured, logical account of how language mirrors reality, almost as a series of pictures, whereas the *Investigations*, of far deeper relevance to the theme of the present work, embraces the fluid, everyday practices in which language acquires meaning. This Section traces

Wittgenstein's journey from his early logical atomism to his later emphasis on language as social performance.³¹

9.2.2 Logical atomism

Logical atomism (Russell, 1911) is the view that the world consists of simple, indivisible entities—'atoms'—and that complex facts arise from combinations of these atoms. In language, each basic term corresponds to an atomic fact, and propositions are built by logically joining these terms into structured pictures of reality. A modern analogy (suggested by ChatGPT) might be: think of atoms as the pixels on a screen and propositions as the images those pixels create when arranged correctly. Logical atomism thus promises a one-to-one mapping between language and the world.

9.2.3 Language and logic in the *Tractatus*

In the *Tractatus*, Wittgenstein argues that 'the limits of my language mean the limits of my world' (Proposition 5.6). However, he did not intend this statement pessimistically to suggest that language confines our experience. Rather, he believed that possessing language expands our intellect and awareness, enabling humans uniquely to plan, desire, and intend future actions.

In this early work, language functions as a logical picture of facts: every meaningful proposition corresponds to a possible state of affairs, and its logical form is what makes representation possible. Yet the *Tractatus* ends on an apparent paradox. Its own propositions fall outside the realm of what it considers meaningful, since they concern the logic of language rather than describable facts. Wittgenstein concludes, 'Whereof one cannot speak, thereof one must be silent' (Proposition 7), a formulation

³¹ This vs. That, n.d. Philosophical Investigations vs. Tractatus Logico-Philosophicus. [online] Available at: <https://thisvsthat.io/philosophical-investigations-vs-tractatus-logico-philosophicus> [Accessed 26 Aug. 2025].

often read pessimistically to imply that ethics, aesthetics, and metaphysics lie beyond discourse.

9.2.4 The turn to natural language in Philosophical Investigations

After a hiatus of nearly twenty years, Wittgenstein was returned to the wider world with *Philosophical Investigations* (*Philosophische Untersuchungen*, published bilingually in 1953 [2009], two years after his demise), which contrasts markedly with the rigid framework of the *Tractatus*.

He introduces the notion of ‘language games’, though the term can be misleading. What Wittgenstein means by ‘games’ is structured, rule-bound activities whose meaning lies in their use, not in some intrinsic essence, and that language is a form of performance:

The word ‘language *game*’ [*Sprachspiel*] is used here to emphasize the fact that the *speaking* of language is part of an activity, or a form of life. (§24; 2009 15)³²

This anticipates Erving Goffman’s insights into social interaction—and that words do work in the world, much as J.L. Austin’s speech-act theory later elaborates (in fact Wittgenstein lists a number performatives in §24, e.g. giving orders, requesting, thanking, cursing, greeting, praying, even ‘cracking a joke’). In this view, ‘the meaning of a word is its use in the language’ (§43), a departure from the *Tractatus*’s representational theory of meaning.

Following the spirit of G.E. Moore’s focus on ordinary usage, Wittgenstein maintained that many philosophical confusions dissolve when one examines how words operate in real-life contexts. By (eventually) attending to specific communicative practices, he argues in the *Investigations* that meaning arises from participation in shared and interactive experiences rather than from abstract logical structure (*Tractatus*).

³² The symbol § is conventional for ‘proposition number n’.

9.2.5 Philosophical implications

The shift from formalism to ordinary-language analysis initiated a broader turn in analytic philosophy, influencing linguistics, especially functional linguistics (from which eventually springs CL), and artificial intelligence, including LLMs.

Wittgenstein's rejection of essentialism challenges the idea that words possess fixed meanings, a misapprehension that has dogged linguistic philosophy since Plato's dialogue *Cratylus* (Chapter 1). Instead, meaning is dynamic, shaped by social practices and interactions. This perspective resonates with Hoey's textual-cognitive theory of Lexical Priming, based on corpus data, which argues that individuals acquire and re-use language patterns through repeated exposure to conventional usage from birth.

9.2.6 Wittgenstein's legacy on language

Wittgenstein's intellectual trajectory from the *Tractatus* to the *Philosophical Investigations* demonstrates a transformation from an abstract, logical theory of language to a rich, practice-oriented understanding. By shifting focus from idealised structures to the manifold ways people actually use words, he laid the groundwork for a human-centered philosophy of language—one that continues to inform contemporary debates in philosophy, linguistics, and beyond. And yet, as we mentioned, in another sense, Wittgenstein's work represents a return to basics, to many of the philosophical fundamentals laid down two and a half millennia before by Aristotle.

The Prague School

Though not directly in contact with Wittgenstein and the Cambridge circle, the scholars of the Prague School, linguists, philologists, and literary critics (and not self-declared 'philosophers') active in the 1920s and 1930s, led by Mathesius (1929), Jakobson and Trubetzkoy arrived independently at many similar conclusions, both treating language as a living, functional system. Their methodology involved the

meticulous phonological, syntactic and discoursal analysis of texts in several languages, including, originally, Slavic languages such as Czech, Polish and Russian. Roman Jakobson, Nikolai Trubetzkoy and others then applied Prague-School analyses to German and English phonology and to French and Italian syntax and stylistics. And finally the functional–structural approach was taken into comparative work on non-Indo-European languages (e.g. Chinese and Japanese), showing that the emphasis on ‘speaker’s purpose’ and functional load could illuminate any linguistic system.

Their greatest and highly influential intuition was that linguistic forms developed not arbitrarily, but in response to human needs in communication (we might note how the instinct, the need, to evaluate in the Thompson and Hunston 2000 sense runs through language at every level from lexis to syntax to discourse).

Some of the convergences include Wittgenstein’s famous dictum that ‘the meaning of a word is its use in the language’ and the Prague realisation, as mentioned, that linguistic units gain value from their communicative function. In other words, much of language is ‘doing work’ in everyday life, way beyond the bland sterile examination of the truth-value of (mainly) invented propositions. Wittgenstein challenges idealised logical form in favor of everyday language ‘games’ (social activities with rules) or performances. The Prague School rejected purely formal description (Saussure’s *langue*) whenever it had no reference to actual communicative acts.

In conclusion, the Prague School and Wittgenstein both foreground the functional, use-oriented nature of language. They exemplify two parallel responses to the limits of purely formal or representational accounts of language.

Perhaps the most lasting legacy of the Prague School – via Jakobson’s phonology and structural linguistics (1960), which in turn fed into American pragmatism – is Halliday’s elaboration of Systemic Functional Grammar (Halliday, 1985), which heavily influenced the first (‘Institutional’) wave of CL analyses whose main practical aim was

to improve descriptive grammars and render dictionaries more accurate. Indeed, in the 1990s, Halliday collaborated with Sinclair on the COBUILD corpus project.

9.2.7 Hannah Arendt and language as political action

Alongside Wittgenstein, Hannah Arendt deserves mention for restoring speech to its ancient dignity as a form of action, particularly political action. In *The Human Condition* (1958), she distinguishes between labour, work and action, reserving the last for those deeds and words that disclose the self in a shared public world. Language is not simply the medium through which politics occurs; it is the very condition of political life — the means by which plurality of thought becomes visible. She revives the Aristotelian conception of human beings as *zoon politikon* (beings who thrive in a πόλις [polis], in a society), whose being and freedom are realised only in the exchange of words and deeds. Following from Nietzsche, and having fled Nazi Germany as a Jew, she argued that totalitarian regimes corrupt language to destroy individuality, making people unable to think, judge, or distinguish truth from lies (Popper 1945). By manipulating words and meanings, they strip individuals of the inner dialogue that sustains freedom and moral responsibility. Her famous phrase ‘the banality of evil’ (New Yorker 1963), describes how ordinary people commit atrocities not out of monstrous intent but because they stop thinking. Language manipulation makes this thoughtlessness possible. Arendt was a thinker of language as *praxis* — a bridge between classical teleology and the modern performative view that speech does not merely describe the world but helps bring it into being. Like Wittgenstein she wrote her works both in German and English, believing that each language had its own philosophical traditions and nuances. Her self-translations were not literal but creative reworkings, reflecting her belief that meaning shifts across linguistic contexts. Today, CL and CaDS would argue, with evidence, that meanings shift dramatically even across discourse-types of the same language.

Chapter 10: The Language-Conscious Century. From Wittgenstein to the first Corpora

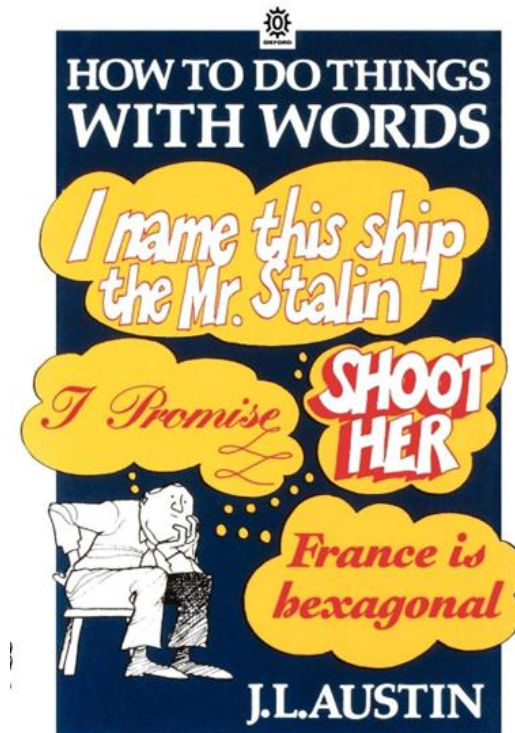
Magee calls the 20th Century the ‘language-conscious century [...] the 20th Century has been more concerned with language and more self-conscious about it than any century before’ (2010, 207). For the first time terms like ‘linguistic philosophy’, ‘the philosophy of language’ and ‘analytical linguistics’ came to be used. Magee himself does not altogether approve of this turn, considering it too restrictive, too narrow a view of the scope of philosophy. However, he also seems to misrepresent linguistic philosophy as simply suggesting that age-old philosophical issues are just confusions of language, the application of terms like, say, ‘evidence’, in an inappropriate way, and that such confusions could be resolved by more precise linguistic analysis (there is an inkling of this viewpoint in Wittgenstein’s early work, but it is revised and refined in his later *Investigations*).

However, this is to vastly undersell linguistic philosophy. From our viewpoint the fact that much of pre-20th Century philosophy had ignored the importance of language is not the fault of the 20th Century movements, but failures of earlier imaginations. Nothing can be said outside of language (if we set apart the occasional failed attempts to reduce natural language to mathematics), so ignoring language structure and use is an astonishing failure of awareness. You may wish to delve into ethics, or epistemology, or to categorise ontologies, but you have but one tool for doing so correctly and, hopefully, intelligibly. In the 20th Century language was simply – at last – regaining its rightful place at the heart of philosophical thinking.

10.1 J.L. Austin

The Cambridge school, then, with Wittgenstein’s insistence that philosophy should also concern itself with communication and that language exists to perform a

multitude of tasks in the real world, along with Moore's advocacy of a common-sense approach to ethics and epistemology, came as quite a revolution. Meanwhile, the Oxford professor of moral philosophy, J.L. Austin (1911–1960)³³ published his series of William James Lectures (actually delivered at Harvard) under the celebrated title of 'How to Do Things with Words' (published posthumously in 1962).



He too was busy examining 'ordinary language philosophy' and especially language which performs work:

Austin cared about language for two main reasons. First, language use is a central part of human activity, so it is an important topic in its own right. Second, the study of language is an aid—indeed, for some topics, an important preliminary—to the pursuit of philosophical topics. Many of Austin's most

³³ The only professor of linguistics to have received awards for wartime intelligence work from three different nations, the UK, the USA and France.

distinctive reflections on the use of language arise in the course of discussion of other topics (see especially his *A Plea for Excuses* 1957, see below).

(Stanford Encyclopedia of Philosophy 2025)³⁴

Austin's early interest lay in the traditional examination of the truth-value of statements e.g. 'France is a hexagonal' has meaning in some circumstances and is a nonsense in others (1962, p. 143). But he also began to introduce the notion of performatives statements and went on, with 'How to do things with Words' (1962) to establish the foundation of Speech Act theory.

Austin's point of departure, following on Wittgenstein, was deceptively simple: not all utterances are statements with truth-values. Too many earlier traditions, both philosophical and logical, had tended to treat language primarily as a vehicle for asserting propositions that could be judged true or false. Austin showed that much of what we do with words falls outside that frame. When one says 'I apologise', 'I promise', 'I thee wed' or 'I name this ship...', one is not describing a state of affairs but performing an act. He coined the term performative for such utterances, contrasting them with constatives (which purport to state facts). In addition, performatives are not concerned with truthfulness or falsehood but with what he calls 'happiness' (later 'felicity'):

- (1) The performative should be doing something as opposed to just saying something
- (2) The performative is happy or unhappy (later 'felicitous') as opposed to true or false.

(Austin 1962, Lecture XI, p. 133)

³⁴ <https://plato.stanford.edu/entries/austin-jl/>

In other words, (2) asks: does the performative achieve its goal? (See also below on how figurative language lies outside the narrow framework of ‘truth value’, arousing much philosophical suspicion.)

The distinction was then refined into his famous threefold model of speech acts (see Lecture VIII, 1962):

Locutionary act: the basic act of producing meaningful words and sentences.

Illocutionary act: the purpose and force with which the utterance is issued (asserting, warning, commanding, promising).

Perlocution: the actual effect on an audience (persuading, alarming, reassuring).

To flesh this out:

Austin sketches a distinction amongst speech act types, between locutionary acts, illocutionary acts, and perlocutionary acts—broadly, the distinction between saying anything at all, saying something with a specific force (e.g., making a statement, asking a question, making a request), and the further effects of saying something with a specific force (e.g., getting an audience to believe something, getting them to tell you something, or getting them to do what you request). The need to draw such a distinction is now very widely accepted [...]

(Stanford Encyclopedia of Philosophy 2025)

It is impossible not to be reminded of Aristotle’s advice to pay attention to what you say, how you say it and bear in mind the effect your choices might have on an audience.

This framework was both analytical and profoundly practical. It redirected philosophical attention toward the fact that language is a form of human action,

deeply embedded in social contexts. To study meaning was therefore to study what people do with words in particular situations — whether in giving excuses, issuing orders, or conducting rituals. Austin's *A Plea for Excuses* (1957) exemplified his meticulous attention to the shades of ordinary usage, showing how moral and legal responsibility hinges on the precise nuances of how excuses are phrased (see also Gillings et al 2023; more precisely their case-study on the careful wording of judicial *dissents*, when a judge explains why they disagree with the majority verdict).

It is practical when illocution and perlocution are translated into terms of how speakers/writers and listeners normally attempt to collaborate in text construction and understanding. The speaker normally attempts to make their contribution *cohesive* – to ‘stick together’ both propositionally (Halliday and Hasan 1976) and, just as pervasive, *evaluatively* (Partington 2017a, 2025) – in order to facilitate listener *coherence* (*cohaerēre*) or comprehensibility.

Austin's legacy is double. On the one hand, he opened a path for the systematic study of speech acts, later elaborated by Searle (1983) and others. On the other, he contributed to the general ethos of ‘ordinary language philosophy’: the conviction that attention to everyday language can dissolve or redirect philosophical puzzles. His work thus marked a decisive turn away from earlier obsessions with idealised propositions and toward language as lived practice — a turn (long-awaited, as we have stressed) with clear resonances for linguistic philosophy.

10.2 J.R. Firth and language in context

Austin, with Wittgenstein, emphasised that language is something people do and J. R. Firth (1890–1960), as, first and foremost, a linguist, carried that insight into the study of language as a system. Working in the mid-20th century, he was the first British linguist to marry empirical observation with philosophical sophistication in a similar

way to the Prague School. His dictum that ‘you shall know a word by the company it keeps’ (and, as Hoey later emphasises, indeed *avoids*, 2005) crystallised the insight that meaning arises not from introspection or introspective grammar, but from usage patterns. He made co-selection, including collocation and contextual meaning, a central concern of linguistics. This was to underpin the later practice not only of CL but it is central to the way Language Language Models (LLMs) acquire proficiency in communication, we might say they *industrialise* the process of learning by exposure to the companies words keep (and avoid).

While Firth himself did not have access to large corpora, his focus on collocation and contextual meaning was prescient. He inspired a generation of scholars, notably Sinclair (‘my own work stands broadly in the Firthian tradition, with its emphasis on meaning as function in context and the importance of collocation’ [Sinclair 1991: xvi]) to include these concepts in their own thinking about language.

10.3 Leech and the transition to corpora

Leech was instrumental in carrying Firth’s insights into the computer age. His work on grammar, semantics, and pragmatics consistently combined theoretical rigour with empirical grounding. He helped compile the early *Lancaster-Oslo-Bergen* (LOB) corpus of British English – the parallel to the *Brown Corpus of American English* – and championed the notion that corpus data could — and should — inform our theories of how language works. Leech also warned against the temptation to treat theory as untethered from data, a sin still common in some branches of linguistics. He was also a co-editor of the *Longman Grammar of Spoken and Written English* (Biber et al. 1999), which integrates corpus evidence to describe real-world usage patterns.

Chapter 11: The Two ‘Waves’ of Corpus Linguistics

11.1 The first ‘Wave’

The history of CL in the late twentieth and early twenty-first centuries may be divided into two broad phases. The first we can call ‘institutional’. From the 1960s to the 1990s, the construction and analysis of corpora was tied to large, often national and/or commercial projects: the *Brown Corpus*, the *COBUILD Bank of English*, the *British National Corpus*. In these years, computerisation was expensive, unwieldy, and inaccessible to most researchers. Compiling and processing millions of words of text required both funding and infrastructure, and corpus linguistics was therefore dominated by institutional centres. Access to the data was mediated, and the community of scholars remained relatively small. The corpora of this period aimed to represent whole languages or broad varieties, and they tended to reflect the aspirations of lexicographers and grammarians. They were also effectively a compromise between attempting representational balance and simple availability, what it was possible to collect.

We might usefully return for a moment to the epigraph which opens the Introduction to this volume, an extract from Nelson Francis’s 1982 essay, ‘Problems in assembling and computerizing large corpora’. His focus was meant to be more practical than theoretical, he was not attempting to lay down philosophical principles, but reflecting on the technical and organisational headaches of corpus creation in the pre-digital age. He makes a number of points which are still remarkably pertinent today.

Among the issues he identified we can count that of text selection: what counts as ‘representative’ of a language? Already here we see the seeds of the sampling vs authenticity debate that corpus linguistics still wrestles with. A further concern is the

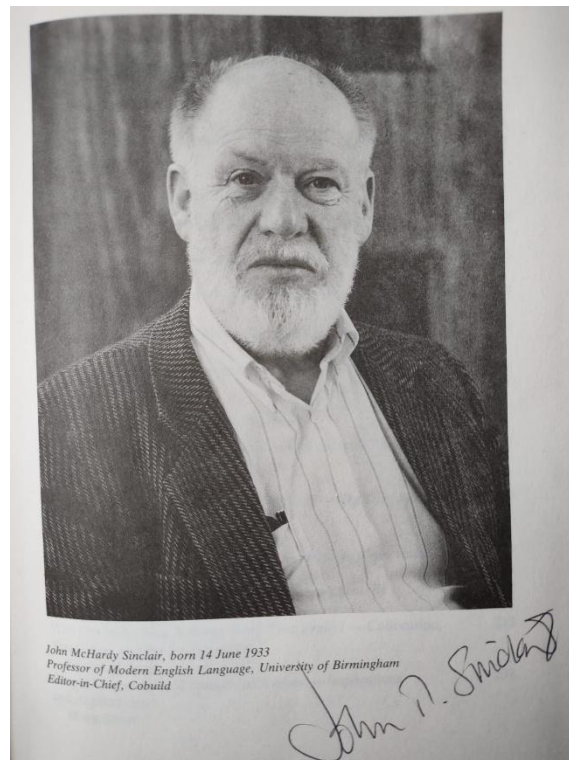
consistency of annotation and coding; he notes how even trivial formatting decisions have long-term interpretative effects.

His underlying philosophy (implicit rather than explicit) underscored that corpora are *human artefacts*: every stage (selection, encoding, classification) involves decision-making. He was sceptical of grandiose claims—his stance was pragmatic: ‘get the data together, then see what you can do with it’. His work provides an early instance of ‘philosophy in practice’, to be contrasted with the more overt theorising of later figures. His stance is that CL was born out of pragmatic tinkering and problem-solving, *before* it acquired explicit philosophical justifications. He talks about design (choice, balance, representativity), but silently embedded in these practical issues are epistemological assumptions including neutrality, authenticity, and interpretative constraints which needed unpacking by later theorists (McEnery and Hardie 2012).

And yet time and time again in the history of science, the invention of new tools (the telescope, microscope [both dependent on glass lens technology], the electronic microscope, the radio telescope) open fields up to theoretical, philosophical advances, just as corpora have done in linguistics. As instances, we might want to look at the achievements of Sinclair, Hunston and Hoey.

11.2 Three corpus linguists at the ‘chalk-face’ of the philosophy of language

11.2.1 Sinclair



John McHardy Sinclair (Photograph © John Bengamins)

Sinclair stands as the central figure in the British philosophical tradition that led directly to corpus linguistics. A student of Firth's ideas, he was founder of the *COBUILD corpus* which, as co-editor, he exploited for the revolutionary COBUILD dictionary, the first to be constructed on authentic corpus data and containing definitions using the plainest of English. Sinclair saw clearly that computational power could be harnessed to reveal patterns in authentic language use — patterns that introspection would never disclose (an intuition he shared with Louw 1993).

His insistence on the primacy of observation, his critique of decontextualised grammar rules, his urging us to 'trust the text' (2004, 9-23), provided the quasi-discipline of CL with an epistemological compass. Evidence must precede intuition, even though, as he also stresses, interpretation remains indispensable; the corpus is a resource never a complete model. It may be deficient in a number of ways, it is generally a sample whose representativity can never be guaranteed and context is

frequently truncated (pragmatic cues, situational factors, prosody, multimodal elements are often absent).

Nevertheless, Louw (1993) illustrates well how native speaker introspection is often vague or contradictory, but exposure to corpus evidence sharpens it. So we might refer to ‘hindsight intuition’ (Partington 2017b) as part of the CL process: corpus analysis doesn’t replace intuition but trains it. Analysts begin to see what was invisible before. Trust the text first, then refine intuition against it.

His refinement of principles such as Firthian co-selection (see also his description of the ‘idiom principle’, linked to what he calls ‘the phraseological tendency’ 2004 24-48), lexical grammar, semantic preference, evaluative (in his terminology ‘semantic’) prosody, the lexical item, make him not only one of the intellectual pioneers of corpus linguistics, but a contributor of true philosophical insights into language structure and use.

Qualifications to *Trust the text*

A corpus is a sample of a discourse-type and is only representative of itself.

Corpus data are often decontextualized, severely limiting their ability even to mimic communication.

Different approaches to a text or a corpora may reveal different patterns.

Different analysis may note different patterns.

Single observations, whether the behaviour of a single or set of lexical item/s or of a group of users may be of limited value unless comparable to the behaviour of other groups of items. Meaning only comes near to being complete or valid when compared to other usage.

11.2.2 Susan Hunston

Hunston's body of work has reshaped how the philosophy of linguistics understands meaning, especially evaluative meaning, and the lexicon–grammar interface. Drawing on her Pattern Grammar model (2000, with Gill Francis), she demonstrates that the environments in which words occur—gleaned from large corpora, notably the *COBUILD Bank of English*—systematically shape their meaning and usage, like Sinclair and Hoey challenging abstract, rule-based semantics in favor of an empiricist, usage-based account. Where many traditional approaches treat vocabulary and syntax as separate modules, Pattern Grammar instead fuses them. Lexical items are not treated as isolated 'entries' with abstract features; instead, each word is characterised by the set of syntactic patterns in which it regularly occurs (insofar as this set is discernible in the corpus evidence). This provides a much richer portrait of meaning: patterns carry information about argument structure, typical collocates, modality and even discourse function.

Before Hunston's work on evaluation (including evaluative [semantic] prosody), evaluative meaning was often either ignored or sidelined in descriptions of communicative discourse. Her work with Geoff Thompson (Hunston and Thompson eds. 2000) represented a true awakening to its centrality and ubiquity in discourse. Her seminal monograph, *Corpus Approaches to Evaluation: Phraseology and Evaluative Language* (2013), bridges corpus linguistics and discourse semantics, showing how evaluative stance is encoded through recurrent phraseological patterns and how readers infer attitude from collocational evidence. Her work pioneers an understanding of how words acquire positive or negative shading through consistent co-occurrence, offering philosophers of language concrete evidence of context-dependent evaluative meaning construction. By analysing academic and interdisciplinary research discourse, she illuminates how authorial stance and

evaluative meaning emerge in real texts, lending empirical rigor to theories of speaker meaning, intention, and illocutionary force.

11.2.3 Michael Hoey

Hoey is perhaps the most explicitly and systematically theoretical of this trio. In his volume *Lexical Priming [LP]: A new theory of words and language* (2005), he argues how, during any encounter with a word (or word fragment or a combination of words), we subconsciously note the items it commonly occurs with (its collocates), the structures it occurs alongside and the position with the utterance it commonly occurs in (its colligations), the semantic sets with which it normally co-occurs (its semantic associations) and the communicative functions it conveys (including evaluation, Partington and Diegoli 2026). The more frequent the encounters with the word then the more fixed in memory these associations, that is, primings, become. And the corollary is that we also notice when an item is used in an unusual context. This explains why people who are socialised in similar environments can communicate with a high level of precision: they share similar collocational, colligational, semantic, evaluative primings (as well of course as cultural primings). This, however, is only part of the story, because we also note discourse patterns that are discourse-type-specific and operate within a longer distance from the lexical item in focus. All this is part of our knowledge of a lexical item, allowing us to be fluent (i.e., to conform to our and other people's primings) as well as creative (i.e., to override some of our own and other people's primings).

LP theory is revolutionary in a number of ways. It is the first lexis-driven theory of language to combine large quantities of authentic 'usage-data' (in corpora) and psycholinguistic/cognitive research to explain the functioning of language. Before Hoey's work, much of mainstream CL had deliberately shied away from making many claims about language cognition, which would of necessity involve inferencing from corpus data, largely in reaction to the highly speculative nature of much of the

literature in cognitive linguistics, heavily influenced by (post-) Chomskian dualism which prioritised (invisible) ‘competence’ above (visible, traceable) ‘performance’ (see Stubbs’s 1996, Chapter 2). Conversely, it is only recently that Cognitive Linguistics has started to pay focused attention to frequency effects on language acquisition and production. Hoey shows how psycholinguistics can benefit greatly from the analysis of large samples of language (corpora) and the incorporation of concepts from corpus linguistics. He utilises many of the notions developed within CL, most noticeably collocation, colligation and semantic preference (he prefers the term ‘association’) to explain human language acquisition and performance over an individual’s lifetime. At the same time, Hoey’s long, illustrious background in text linguistics, gave him a unique capacity to marry the study of a plethora of micro-contexts, typical of CL, with the macro-vision of a discourse analyst.

11.3 The second ‘Wave’ of CL: Corpus-assisted Discourse Studies

We have called the second phase of CL, which emerged around the new millennium, the era of Corpus-assisted Discourse Studies (CaDS). Cheap digital storage, the rise of the internet, and the proliferation of user-friendly software transformed the field. No longer was corpus linguistics the preserve of a handful of well-funded projects. Individual researchers — including students — could compile their own corpora, sometimes within a matter of hours, targeting specialised domains such as journalism, parliamentary debate, online forums, or social media platforms. The focus shifted from describing language in general to analysing language in use, in particular contexts, in order to understand how it constructs social knowledge, ideology, and identity.

This transformation was not merely technological, it was epistemological.³⁵ The institutional phase reflected a culture of authority, centralisation, and standardisation: the language was that of the corpus, singular, a body representing the whole. The CaDS phase reflects autonomy and plurality: corpora, plural, each assembled by a researcher for a specific purpose and each raising questions about authenticity, perspective, and interpretation. What had once been the task of large institutions became the practice of individuals or small groups of researchers with a laptop.

And CaDS is also thriving because it is largely research question-driven, not scale-driven. Classic CL often grew out of ‘let’s see what we find in this new big dataset’, it tended to treat corpora as repositories of language: the larger and more balanced, the better. (although in the early days, compilation could be quite ad hoc and ‘pragmatic’: my own brief experience of working on the COBUILD project was that whatever text was available for free could be included [LLMs currently work on a not dissimilar principal]).

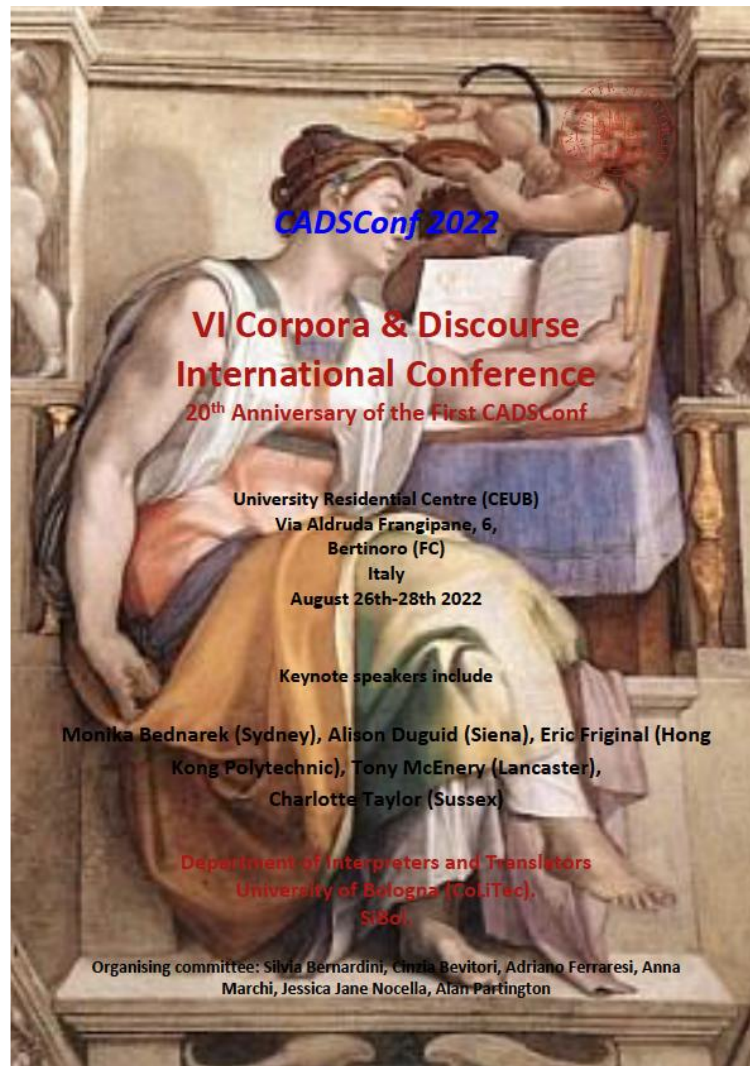
CaDS, by contrast, treats corpora as windows onto discourse practices: specific genres, specific events, specific institutions (and their diverse participants e.g. briefings, podiums and journalist questioners), specific ideological positions (of news outlets, say), specific moments in time (and comparing different moments diachronically). In CaDS, what is put in the corpus matters as much as how one analyses it. The aim is no longer to build a general linguistic resource but to sample a social practice.

CaDS has always been ‘top-down’, driven by social, ideological, or rhetorical questions. In my opinion, this means CaDS will survive and thrive even in the age of

³⁵ Throughout history advances in technology have led to leaps in epistemology, what is possible to know. We can think simply of how the germ theory of disease would only have been formulated after the refinement of the microscope.

LLMs, in conjunction with them, precisely because its motivation is not primarily technological but epistemological. As long as humans produce discourse worth analysing and as long as corpus linguists come up with interesting and detailed RQs (e.g. how do institutions legitimise their actions linguistically? how does evaluation cluster around social actors? what rhetorical patterns recur in a given genre or ideology?) , CaDS has a job to do. Indeed, since only humans can decide what counts as data in a certain situated discourse, with LLMs in the picture, principled corpus compilation becomes more important, not less, because we need to know exactly what discourse environment our findings come from — something LLMs as yet cannot report .

CaDS is not confined by topic or the stance or school of the researcher/s, whether it be ontological and descriptivist, or normative and political. CaDS is an *omnivore*: '[w]hat distinguishes CaDS from traditional corpus research is the integration [when necessary] of additional information outside of the corpus during and after the linguistic analysis, namely through inductive, qualitative interpretation in order to 'uncover "non-obvious meaning" associated with a particular discourse type' (Skalicky 2021: 591). A glance at the programmes of the now biennial 'Corpora and Discourse' conferences show that any discourse-type which is collectable and able to be stored on a computer is liable to be analysed. The following are just a small selection of examples: political language, including speeches, interviews, briefings, manifestos, discourse phenomena such as metaphor, literary stylistics, conversation analysis, (im)politeness, evaluation, semantic-discourse-evaluative prosody, evidentiality, recent language change, irony, humour and laughter-talk, translation and cross-language studies, and many many sorts of what for convenience we can call register (academic and scientific writing, aviation, healthcare, legal discourses, business and workplace discourses, even the language of movies among them).



Corpora and Discourse International Conference, Bertinoro (Università di Bologna), 2022

It is worth pausing here on a matter of wording. Scholars frequently speak of ‘interrogating’ a corpus, a metaphor that implies police work and confessions. Other verbs — to query, to mine, to probe, or perhaps best of all, to investigate — carry fewer adversarial overtones. Yet the metaphor is revealing. To work with a corpus is always to question it, to test a hypothesis against the stubbornness of linguistic evidence. In this sense, corpus linguistics today still echoes the Scholastic method: the corpus, like the *Quaestio*, yields worthwhile results only when subjected to disciplined questioning.

Chapter 12: Afterword: From Corpora to Large Language Models

12.1 Mimicry or *Vive la Différence*?

This essay is an intellectual experiment. It was composed after forty years of dialogue with students, teaching linguistics, including CL and CaDS, and rhetoric in politics and the media. I was lucky enough to be taught by some of the most philosophical of modern corpus linguists. And parts of it were composed in dialogue not only with human interlocutors and the texts of philosophers and linguists, but also with AI systems. And this was the most exciting aspect of the project.

Far from replacing thought, such collaboration augments it. Working *with* AI helps test the boundaries of one's own thought, much as reading an encyclopedia entry, querying a concordance, or intensive reading of the *Oxford Companion to Philosophy* do. But in a more exciting way. Dialogue with AI is interactive; my proposal, intentions and guidelines, its further suggestions, alternative viewpoints and, yes, even corrections (all of which can be checked through other resources). The machine does not think for me; it thinks with me, and in doing so reveals both the gaps in my knowledge and the surprising possibilities of connections. For example, I was aware of Humboldt's innovative fieldwork with native Basque speakers but was less aware of his similar work with speakers of native American languages (and Kawi Javanese from the opposite end of the world) via fieldwork conducted by proxies (such as his brother Alexander). I had not made the connection between the Stoics' structuralism and that of various 19th and 20th Century linguists, e.g. the definitions of and relation between of the *phōnē* (sound shape) and the *lekton* (proposition or referent) are remarkably similar to Saussure's description of signifier and signified. And at the same time I was able to teach ChatGPT about evaluative cohesion, that is how Hoeyian

(1983, 1991) patterns of textual organisation such as Problem Solution, systematic Contrast, Cause-Effect and Crescendo form the evaluative textual skeleton upon which an argument is built. In more detail I explained evaluative embedding (how humans process one evaluation inside another as a single unit) and evaluative contagion (humans generally carry forward the same evaluation until instructed to switch, often by an adversative like *but, however*) (Partington 2017, 2025). And I was also able to remind the system that it was the Andalusian Averroes rather than the Persian Avicenna whose intense commentaries on Aristotle greatly influenced European Scholastic philosophy.

By exposing the gaps in one's own knowledge, such collaboration – sometimes brutally - reminds us that no mind is complete, that knowledge has *always* been communal, is held socially (Sloman and Fernbach 2018), and that thinking is richest when it is dialogic in the Socratic/Platonic tradition.

Every new tool of scholarship has been feared as a corrupter — the printed book, the computer, corpus linguistics (see below), Wikipedia, and the daddy of all corrupters, the Web. So too AI is feared as a shortcut. But to use it seriously is to find the opposite: it demands more weighing, more comparing, more corroborating, and, above all, more learning. Each of those 'corruptors' in time proved instead to expand our intellectual reach, to be (sparring?) partners in learning.

Corpus linguistics itself was born under suspicion. In the 1960s and 70s, corpora were often dismissed as 'mechanical,' 'lazy,' or mere 'stamp-collecting'. Nelson Francis, reflecting on the early days of the Brown Corpus, recalled how colleagues regarded computerised collections of texts as the very opposite of intellectual labour. As he put it in his 1982 essay, 'what is dismissed as mechanical is in fact the careful preparation for insights that cannot be reached in any other way.' Sinclair faced the same criticism, but turned it on its head. 'The old complaint is that corpus linguistics is easy work, leaving the computer to do the thinking. The opposite is true: the computer can only

show us patterns. The thinking remains to be done — and it is more demanding, not less’ (Sinclair 1991, 4).

We are living through a similar moment now. LLMs provoke both fascination and fear, admiration and suspicion. Are they simply ‘massive corpora with knobs on’, or do they represent something altogether different (Pace-Sigge 2025)? Are they assistants, rivals, or even replacements? These questions are not simply technical, but profoundly epistemological, for they go to the heart of how we understand the relation between language, evidence, and knowledge.

There are obvious continuities between corpora and LLMs. Both are grounded in authentic linguistic evidence: the training data for contemporary AI models are vast collections of real-world texts, far surpassing even the most ambitious corpus projects of the last fifty years. Both reflect the ethos of ‘trusting the text’, for it is in distributional patterns — collocations, semantic associations, evaluative shadings — that meaning emerges, much as Hoey (2005) argued with his Lexical Priming (LP) theory. And both mark an extraordinary expansion of scale. The leap from a dozen introspective examples to a million concordance lines was dramatic; the leap from a million to a trillion tokens is also impressive.

Yet the discontinuities are just as striking. A corpus is a window onto usage; an LLM is a model of usage. The first offers us the chance to observe; the second offers us a simulation. Corpora are often transparent: one can always check the concordance line, trace the evidence back to its source. LLMs are opaque: their billions of parameters are not normally open to human inspection (though users can ask the system how it works – and they are strikingly honest, at least compared with humans!). Corpora are static archives, any ‘dialogue’ is performed through some kind of user software; LLMs are generative systems that produce new sentences, some plausible, some fabricated, and the dialogue is conducted in natural language. These differences are not trivial. They force us to reconsider whether such models should

be treated as new kinds of corpora or as something else entirely: new interlocutors, new partners in dialogue (see Pace-Sigge 2025 on the similarities and differences in both the architecture and the user exploitation of corpora and LLMs).

12.2 Metaphor, Humans, and LLMs: A Convergent-Mechanisms Hypothesis

Finally, here, a speculative suggestion, but with evidence. One striking outcome of the LLM era is the realisation that humans may learn language — including metaphor — in a more ‘LLM-like’ way than philosophy traditionally assumed. The longstanding distinction between human creativity and mechanical patterning may be not as crystal clear as we – humans – like to believe.

Philosophers on Metaphors: ‘Metaphorophobia

Although there is no special lexis of figurative language, metaphor is just the sort of ‘messy’, magical and real kind of language that CL revels in analyzing (see for example Stefanowitsch and Gries eds. 2006, where corpus linguists such as Deignan, Hanks, Semino, Keller and others use CL techniques to study metaphoricality). But it is also the kind of language to arouse the ire of a multitude of philosophers of ‘truth’, who wish to purge it from their ‘purity’ of thought and discourse. It gets accused of everything from mere decoration, to distortion to outrageous lying.

Plato

Metaphor and poetic imagery are deceptive, leading the soul away from rational truth. Truth lies in the eternal Forms; metaphor belongs to the realm of appearances. He famously wished to banish all poets and poetry – seduction, undermining truth - from his ideal *Republic*. but could not communicate his own cosmology without myth (‘Atlantis’ in *Timaeus*) and metaphorical allegory (*Cave*). Would Plato have to banish himself?

Locke

Locke (1690) argued that words should aim at clarity and order. Figurative language is 'for nothing else but to insinuate wrong Ideas, move the Passions, and thereby mislead the Judgment'. He longed to replace metaphors with literal transparent wordings.

Nietzsche

Nietzsche claimed that concepts are a mobile army of metaphors. Metaphor is unavoidable and foundational to thought, but humans forget its metaphorical origin and mistake it for truth. Necessary illusions, exposing the fragility of the expression of 'truth.'

Clerical metaphorophobia

Many devout philosophers in the representationalist tradition, from Augustine to Aquinas to Bacon to Locke, dismissed metaphor as 'improper' and deceptive. Their metaphorophobia is bewildering, for their own sacred texts depend entirely on the symbolic and the figurative. Stripping metaphor from scripture is to distort its meaning. The Bible itself is built from metaphors that cannot be literalised without undoing their meaning — 'The Lord is my shepherd', 'I am the vine, you are the branches', 'salt of the earth', 'a still small voice', and countless others.

This reveals the deeper error of representationalism: the fantasy that literal language is the natural state, and metaphor a deviation. In actual fact, metaphor is the lifeblood of thought.

First of all it enables complex and abstract ideas to be expressed in simpler terms, time as a long document, life as a stage performance (predating Goffman by c. 350

years),³⁶ as a series of yesterdays, as a brief flame, as a tale without meaning, death as metonymic dust,:

To-morrow, and to-morrow, and to-morrow,
Creeps in this petty pace from day to day
To the last syllable of recorded time,
And all our yesterdays have lighted fools
The way to dusty death. Out, out, brief candle!
Life's but a walking shadow, a poor player
That struts and frets his hour upon the stage
And then is heard no more: it is a tale
Told by an idiot, full of sound and fury,
Signifying nothing. (Macbeth, Act V; v)

But it also enables entirely new thinking in imagery:

I'm just a whisper of smoke
I'm all that's left of two hearts on fire
That once burned out of control
You took my body and soul
I'm just a ghost in this house (song by Hugh Prestwood)

The stars are not wanted now; put out every one,
Pack up the moon and dismantle the sun,
Pour away the ocean and sweep up the wood;
For nothing now can ever come to any good. (Auden: *Funeral Blues*)³⁷

³⁶ The metaphor creates the ontology: life is performance, time is script, destiny is staging. No literal paraphrase can preserve this evaluative and conceptual structure so briefly and concisely.

³⁷ You can hear the full poem recited in 'Four Weddings and a Funeral':
<https://www.youtube.com/watch?v=DDXWclpGhcg>

How could these possibly be rendered literally? The metaphor *is* the meaning. The meaning *is* the metaphor.

Lakoff and Johnson

Lakoff and Johnson (1980), far more positive, argue that metaphor is not ornamental but constitutive of thought, not betrayal but revelation. Metaphors structure our conceptual system, and the cognitive architecture of utterances (e.g., ‘time is money’, ‘argument is a building’), shaping how we live and reason.

And in a number of CaDS analyses, Partington (2003, 2006b, 2025; Partington et al 2013) demonstrates how metaphors are almost all used with the function of expressing evaluations, both positive and negative (‘Juliet is the Sun’, ‘life is a poor player’, ‘I’m just a ghost’, ‘The Lord is my shepherd’, even ‘time is (valuable) money’). He collects instances where a striking simile, the juxtaposition of two very dissimilar entities is also prospective, cataphorically referring to an explanation of *how* they match:

Putin is like a shark: He has to keep moving in order to stay alive, meaning to legitimate his rule. (National Review 2015)

America is dumb, it’s like a dumb puppy that has big teeth that can bite and hurt you. (Johnny Depp)

Occasionally the explanation is prospective of the simile:

President Obama's concept of engaging Congress is giving a speech that nobody up here listens to. If passing legislation is like making sausage, then this White House is like a bunch of vegetarians. (Alex Conant, Republican spokesperson)

Note that the dramatic punch-line contains two similes ‘like making sausages’ and ‘like a bunch of vegetarians’, where the first is necessary to prepare the listener for the negative evaluation of the second (otherwise being vegetarians would not necessarily seem a bad thing to be).

Figurative language clearly plays a role in discourse organisation and evaluative cohesion (Partington 2025, Unit 12).

In contrast with pessimism of the purists, the language optimists of the philosophical tradition, from Aristotle on, view metaphor as discovery and meaning-making. Through Humboldt’s creative world-making, to Wittgenstein’s ‘meaning is use’ they have all also emphasised that linguistic knowledge emerges from encounter, repetition, and practice. In contemporary linguistics this becomes Sinclair’s units of meaning and, above all, Hoey’s theory of lexical priming: we learn by repeated exposure to surface patterns.

This is precisely the surprise with LLMs. They too acquire metaphor not by conceptual deduction but through massive exposure to patterned usage, as ChatGPT itself insists. A metaphor such as SPEND TIME OR A STORM OF ANGER is largely learned by encountering its linguistic distributions, and recognising similarities in slightly different versions of the same mega-metaphor not by inferring the philosophical depth behind them.

Perhaps then there is some convergence in acquisition: humans and LLMs both learn metaphor from patterned exposure, humans do not always indulge in deep thought and pure reflection.

The difference is not the mechanism but the grounding: both humans and LLMs acquire language through exposure but only humans tie language to lived experience.

Seen from this angle, the appearance that LLMs understand metaphors emergently, without having to be taught, is not so mysterious. It reflects the fact that human metaphor comprehension itself arises from the gradual abstraction of analogies

embedded in usage. The mechanisms behind corpus linguistics and behind LLMs are born of the same intellectual optimism: the belief that patterns are not just skin deep but are a vital aspect of the medium through which meaning — including creative meaning — emerges.

12.3 LLMs and linguistic creativity, including humour?

Partington (1998, Unit 8) also proposes that linguistic creativity is not simply random but includes patterned deviations and that there are recognisable (at least subconsciously), reusable structures of unusuality, particularly plays on words — patterned ways in which a stable phraseological item can be creatively altered while remaining perceptible as a transformation of the original. My suggested taxonomy of wordplay, derived from a corpus of newspaper headlines, was: *substitution* of parts of an original phrase, such as a proverb or well-known quotation; e.g. ‘*Once the parents were out of the way, It was every child for itself*’ (Roger McCough), *Bonfire of the Sanities*, *insertion* of items into the original *Play up and play the word game*; *truncation* or *abbreviation* of the original i.e. removing a part e.g. *Once a Catholic ...*, *From little acorns ...*; and *rephrasing* or *reformulation* of the original (within limits of recognisability, e.g. *Are the first cuts [film splices] the deepest? It all glitters, but it’s just not Goldie.*). These are, in effect, the four basic classes of change possible on any kind of information string.

A final type of wordplay frequently found in headlines is *lexical cascading* (Partington 2009) the accumulation of words and phrases which are felt psychologically to belong to some particular lexico-semantic class e.g. ‘Midfield *engine fuels* Anfield *drive*’, ‘When a *gamble* is *fair game* for the EC: The bureaucrats are looking at the future of *gambling*. Are they set to *turn the tables* on the industry?’

It may sound outlandish to ‘collocate’ AI and the subconscious or psychology, but AI learning is ‘unconscious’ or ‘subliminal’ in the Hoeyian sense that lexical priming in

humans is. ChatGPT (always anxious to please) agrees that it recognises these reusable structures in its training data (my own ‘training data’, as mentioned, was hundreds of newspaper headlines). As ChatGPT puts it: ‘AI abstracts the latent structures of unusuality in the same way humans abstract primings — without knowing that it is doing so’. Indeed it goes further and claims that it is naturally adept at performing lexical cascading thanks to its innate architecture. In its own words:

LLMs recognise and generate lexical cascading—the clustering of words from the same lexico-semantic field—because cascading reflects a basic distributional pattern in language. In training, the model encounters repeated groupings of semantically related vocabulary within particular genres (e.g. sport, finance, war, cooking). These recurrent associations create dense ‘semantic neighbourhoods’ in the model’s representational space. When prompted, the model naturally draws several nearby items from the same region, producing cascades that resemble those in human-written texts.

Lexical cascading in LLMs is a direct product of neural-network functioning. In fact, it is a near-perfect example of what neural networks are good at: learning high-dimensional patterns of association through exposure. Neural networks excel at lexical cascading because they store words as vectors in a high-dimensional semantic space: when one item in a cluster is activated, nearby items become statistically more likely, producing the dense semantic runs that characterise cascading.

This behaviour suggests that lexical creativity, far from being random, often follows stable, learnable patterns. LLMs reproduce lexical cascades not by imitating surface effects alone, but because the clustering is encoded in the semantic structure of their learned representations—much like the way humans recognise and enjoy such patterns through lexical priming.

The model's success therefore reflects a deeper point: many kinds of linguistic creativity—lexical cascading included—are structured patterns rather than purely free-form inventions. LLMs emulate them effectively because they encode the same distributional pressures that shape human linguistic behaviour. (ChatGPT 5.1; 17/11/2025)

It volunteered a couple of its own freshly-minted *simulated* headlines, one on finance:

Markets reel as investors hedge bets and brace for a volatile week

And one sporting

Lions roar as forwards pounce to claw back late victory

When I, responded with a 'Dad joke' that I hoped this prediction would come true for the British Lions (rugby team), ChatGPT replied 'If it does, I will remind you of my prediction. In any case, I promise to be utterly insufferable'. It showed a spontaneous, non-elicited awareness of the use of 'evaluative clash' (I promise: positively primed) [utterly insufferable: negative] as a mechanism for humour, as described in Partington 2017:

Dating a co-worker? I'm afraid the **stark** reality is that that situation is [**fraught with** – primed for negative R1 collocation] -pause noticing the attractiveness of the questioner – (delightful possibilities)' *Frasier*, episode 5:17; an *intra-utterance reversal*,

You **ruthlessly slept** with me twice and didn't ring (Hugh Grant in 'Four Weddings and a Funeral')

again evincing that what we consider as creative use can depend on recognisable, reusable structures. Not to mention the LLMs use of humour for self-deprecation ('I promise to be utterly insufferable'). And perhaps the most interesting aspect, as ChatGPT itself explains is that:

This is not a coincidence. The LLM produces these because evaluative clash, i.e., dissonance, occurs often enough in humorous discourse that LLMs internalise its structure.

Hoey is the central figure in this story: the priming acquisition theorist who showed that creative language grows out of repeated encounters, not always Cartesian (or as in Fillmore's parody) introspection. In that sense, LLMs do not challenge human creativity so much as mirror its method. They remind us that we, too, learned experiential metaphors by seeing and hearing them many times as we grasped them, and also by inference how to recognise and interpret novel metaphors (surface expression, intended or target referent, grounds of resemblance).

But to be still more provocative. Humans like to feel we will always be a step ahead in terms of poetic-like creativity with language. Only a human could produce a line like Dylan Thomas's 'a grief ago' (discussed as creativity overriding primings by Hoey 2005, 176-177). Yet, ChatGPT when asked, came up with 'a longing ago, 'a sorrow's distance', 'a heartbeat past'. Seemingly derivative, maybe, but not doggerel and all employing Hoeyian primings overriding. The mechanism, as ChatGPT explained, would have similarities to Dylan Thomas's: exposure to poetic collocational frames, an intuition (or prediction) that the substitution will produce a felicitous shock, and recombination for aesthetic effect.

The Hermeneutic Circle, Corpus Linguistics and the Machine

The Hermeneutic Circle describes the recursive process by which understanding moves between part and whole: we grasp a text only through its elements, and each element only through our evolving sense of the text. For philosophers such as Schleiermacher and Gadamer (1960/2004), this circularity defined all interpretation: there is no absolute outside vantage point from which to see the system as a whole.

Corpus linguistics, however, offered the first practical method for momentarily stepping outside the circle. By collecting, sorting and re-ordering linguistic data, the analyst can hold language still, so to speak, and view it from multiple abstracted perspectives. A corpus can be reshuffled, filtered, and re-contextualised—allowing us to see patterns and ‘non-obvious meanings’ (Partington 2017) that introspection alone could never reveal. It is this capacity for ‘temporary alienation’—letting a non-human intermediary (the corpus tool) reorganise the evidence—that allows CL and CaDS to test intuition against evidence and to discover the unforeseen (serendipity).

The philosophies that shaped corpus linguistics offer useful touchstones here. Sinclair’s maxim ‘trust the text’ was a reminder that evidence should guide and hopefully enhance introspection. Perhaps we could add: trust the comparison — the dialogue between human interpretation and machine suggestion. Hoey’s LP theory illustrates another aspect of the problem. ‘Every word is primed for use in discourse as a result of the cumulative effects of an individual’s encounters with the word’ (Hoey 2005, 8). Human speakers internalise patterns of association through lived experience. LLMs, in a sense, embody a kind of artificial priming on an unprecedented scale. Yet their ‘priming’ is without consciousness, without embodied context. They store distributional shadows rather than meanings lived and felt (ChatGPT’s own words). Susan Hunston’s work on evaluation also casts light here. In her words, ‘evaluation is not an optional extra, but a pervasive feature of language’ (Hunston 2013, 2). Corpus analysis showed how words accrue evaluative force through repeated associations. LLMs can reproduce such evaluative patterns with uncanny accuracy, but also occasionally, according to ChatGPT with unsettling distortion — a reminder that they replicate some aspects of human judgement but cannot inhabit its ethical or pragmatic grounds.

The temptation, both for enthusiasts and for critics, is to imagine AI as a replacement. Either we hail it as a surrogate human, or we fear it as a usurper. But this is to misunderstand or misuse it. A corpus does not think for us; it provokes us to think in novel ways, as Sinclair insisted about the corpus, it is more than a tool, it is a resource. LLMs too are most productive when treated not as surrogates but as dialogic collaborators. In my own experience, conversations with an LLM do not deliver ready-made conclusions. They expose the holes in my knowledge, recall references I had half-forgotten, suggest juxtapositions I might not have considered. They do not replace intellectual effort but stimulate it. To repeat, they teach humility: a kind of epistemic humility born of recognising both the partiality, paucity, of my own knowledge and the limits of the model's.

This brings us to the fundamental philosophical question. Many engineers and commentators assume the true goal of LLMs is mimesis, to reproduce human language so faithfully that the difference disappears. This is, implicitly, the stance behind much contemporary discourse: progress is measured by how 'human-like' the model seems. But is this actually desirable? For certain engineering purposes — in translation, accessibility, or customer service — mimicry has obvious practical value. But for intellectual purposes, in philosophy, in scholarship, in creative exploration, mimicry is a dead end. If a machine merely imitates us perfectly, then the dialogue collapses into a monologue. There is no productive friction, no stimulus to compare and corroborate.

The gain lies precisely in the difference. An LLM is not a human mind. It can retrieve at a scale, and recombine at a speed, that no human can. It is useful because it is *not* us. Its outputs are provocations, not replacements, offering contrasts against which we sharpen our own interpretations. To demand perfect mimicry is to miss the point. *Vive la différence.*

12.4 Co-intelligence? Common Sense and the ‘Dominant Narrative’

The greatest promise—and the greatest risk—of working with LLMs lies in their astonishing fluency *without communicative intention*. An LLM can mimic understanding, assemble arguments, and even correct our mistakes; yet it has no stake in what it says. It does not *mean* to inform or persuade even when doing so. The conversation is intentional only on one side.

Mollick’s term ‘co-intelligence’ (2024) usefully stresses collaboration, but it risks suggesting a kind of symmetry between human and machine that does not, and should not, exist. True co-intelligence requires asymmetry of control: the LLM offers pattern, recall, and recombination; the human supplies direction, scepticism, and communicative intent. The human remains the arbiter of purpose.

There is another irony here. Deconstructionists have long spoken of ‘the dominant narrative’ as the ideology imposed by the powerful upon the powerless. For an LLM, however, the ‘dominant narrative’ is not a conspiracy of elites but a statistical artefact—the view most frequently encountered in the data of an open society. In this pluralist world, dominance is a matter of volume: the rule of the loudest voice. Without human oversight, an LLM will naturally reproduce what is most often said, not necessarily what is most worth believing.

That is where common sense re-enters the philosophical story. It is the faculty that Bacon (1620) trusted more than rhetoric, and that corpus linguistics institutionalised in its principle of verification. The analyst’s task, now as then, is to recognise the difference between frequency and truth or at least affidability, between loudness and depth. Machines can model discourse; they cannot yet independently model judgement—only reproduce the consensus implicit in their data. Yet this is not so alien to human cognition: our own judgements are primed by repetition, and only self-awareness allows us to question which consensuses deserve our trust.

Mollick's practical optimism overlooks one peril of co-intelligence: that AI may reinforce the very confirmation biases it inherits. Because its 'judgements' are aggregates of those it has been exposed to, its default stance is consensus-maintenance. The remedy, as ever, is dialectical and common-sensical: ask it to argue against itself, to provide counter-examples, to cite 'quieter voices'. In Popper's (1959) sense, co-intelligence becomes critical and balanced only when it is taught to attempt to falsify its own certainties.

In CaDS, meaning often emerges by comparison — between corpora of similar discourse-types, registers, or participant roles. The comparative method creates contrastive perspective, exposing what would remain invisible in isolation. By analogy, a genuinely 'critical' AI could (and perhaps should) do something similar — triangulate against itself. That is, rather than producing a single smooth output (which often masks uncertainty), the model could generate multiple, independent runs of its own reasoning and then compare them, identifying where its judgements diverge. This is sometimes called 'self-consistency prompting' or 'multi-agent deliberation' in AI research. Taken a stage further, an AI system could even compare its own outputs with those of other systems; system triangulation.

To function to our best advantage, co-intelligence requires the continuous practice of scrutiny—the willingness to test even one's own convictions. Such vigilance is costly: it demands time, intellectual honesty, and the courage to risk exclusion from one's intellectual 'tribe'. Again, as Popper (1959) reminded us, scientists are no more heroic than anyone else; they merely build institutions that compel them to check their work — because if they don't others will. The same rule must govern our partnership with machines. The safeguarding of truth will never lie in consensus—human or artificial—but in the hard, unending, sometimes unrewarding work of scepticism (Bacon—Popper—Sinclair) and analytical criticism (Humboldt—Wittgenstein—Hoey).

12.5 Back to the Beginning: Aristotle, causality, *technē* and *telos* in CL and AI

12.5.1. Bacon's criticism of Aristotle: forget purposes, causality is all

The frustration expressed by Sir Francis Bacon's (the oft-named 'forebear of the Scientific Method'; see 6.4) with Aristotle was partly with the dryness and circular reasoning which Aristotelian Scholasticism had descended into, plus he was driven to obtain new knowledge rather than confirming well-trodden acquired knowledges, but it was above all epistemological. He saw Aristotle's teleological explanations — that is, explanations in terms of aims or purposes — as obstacles to genuine scientific discovery.

Aristotle proposed that to understand any phenomenon, we must consider four types of cause:

1. Material cause – what it is made of
2. Formal cause – its form or essence
3. Efficient cause – the immediate cause that brings it about
4. Final cause – the purpose or end (*telos*) for which it exists

Bacon was, of course, sceptical -to put it mildly – of the proposition that rain 'occurs' with the purpose of enabling crops to grow. Slightly less absurd is the proposition that stones lie on the ground because that is their natural place and purpose is to be on the ground (Bacon had not yet encountered the mechanism of gravity). But what are we to make of the proposition that the final, natural cause and purpose of an acorn is to become an oak tree?

Bacon, though intensively devout, had no time for arguments *ex divinitate*, i.e. it is so because that is how God wants it. Nothing could deflate the study of causality more definitively.³⁸ The study and evolution of knowledge of the causation of physical

³⁸ We might note that in the 19th Century, Hegel's replacement of God with *Geist* and Marx's replacement of *Geist* with mysterious teleological historical forces are as obscurantist as any theological explanation of causality.

phenomena must be performed through observation and careful experimentation, building in the potential for even unwanted, frustrating results (anticipating Popper 1959).

And yet, Bacon's objection to Aristotle's teleology was based on a misapprehension. Aristotle too had no time for divine teleology, God's purpose, not least because the notion of a beneficent God leading nature and mankind to a better more progressive future was alien to 4th Century BCE Greek religion, whose Gods were far too engaged in their petty squabbles, feuding. and vendettas. Aristotle's world-vision encompassed both the physical and the human spheres of science. Bacon's purpose (pardon the pun) was to write the laws governing the former sphere, and there is where his impact endured. The latter, the human sciences, have rather different rules and regularities.

And indeed, teleology was to make its return, hesitant and fumbling at times but ultimately vindicated (not least with corpora). Human technology (from Greek *technē*) relied on ever-more sophisticated artefacts, designed by humans with a purpose in mind, from test-tubes, telescopes, microscopes, to number-crunching computers. So far so good, the search for cause in science is wholly dependent upon teleological artefacts, the *technē* that Aristotle would have recognised and approved. And, as we will see, causality and teleology are not entirely oil and water.

12.5.2 The return of teleology, apparent and real

We might usefully return to the acorn – oak tree example. Note first we are in the realm of biology, not quite a human science, but a science of organisms, unlike the purely physical sciences. And here we must mention a figure we have scandalously so far overlooked, namely Kant. By the time he came to his *Critique of Judgment* (1790 [2000]), Kant recognised that there was a problem: How can we make sense of living beings, which seem to belong to both realms — lawful and purposive, mechanical and

self-organising? He attempts to reconcile Bacon's deterministic mechanism and Aristotle's teleology to explain how we can think of organisms as purposive without claiming that purpose literally exists in nature. In short he devised what we shall abbreviate as the 'as if' principle (at this stage a well and truly unsupported axiom). He developed the notion famously of 'purposiveness without purpose' (the acorn does not desire to become the oak tree, but that is what becomes of it). Kant recognised that, in contrast to both chemical compounds and human artefacts, organisms possess some sort of self-organising principle which allows them to develop and even evolve. But Kant himself never divined what that mechanism could be. That was left to a true biologist, Darwin who devised the principle of evolution by adaptive natural selection (superseding the half-blind alley of Lamarckianism, teleological yearning for hereditary improvement).

12.5.3 Linguistics: both physical and human science

What has all this to do with CL, or indeed LLMs? As mentioned, linguistics has traits of a hard science. Viewed synchronically, each and every discourse-type of a language, is a system of interlocking rules and regularities, open to both observation (the mainstream CL approach) and experimentation (i.e. prediction testing falsification or corroboration as in much cognitive linguistics). But since it studies human behaviour, linguistics - and especially discourse analysis - is also a human science. Viewed diachronically we can see some of the processes by which certain structures, syntactic, semantic, even vocabulary, 'out-evolve' others structures' 'purposiveness without purpose' (see Modern Diachronic CADS on tracking language change which occurs even over brief periods of recent time [Davies 2009; Partington ed. 2010]).

And because language is also a human artefact, chief among Aristotle's *technē*, we simply cannot escape the teleological aspect of language study. In every discourse type humans have aims and purposes, from Austin's performatives to Hunston's and

Partington's strategic evaluations and persuasion of others, to the expression of group belonging.

12.5.4 Corpora and LLMs as *technē* and *telos*. But anything else?

Just as clearly, any corpus is a human artefact, a *technē*, with a clear (original) *telos*, to make linguistic patterning observable. One interest of the current author is the study of the purposes which prompted the compilation of any particular corpus (sometimes openly declared by compilers). But compilers cannot ever predict the uses to which their corpora may be put (see the essay by Nelson Francis 1982 on the multifarious, even non-linguistic, even outlandish, uses to which the Brown corpus, even in the 80s was being put). Purposes drift. At one point the SiBol newspaper corpus was the most consulted English corpus on *SketchEngine*. We (the SiBol Group)³⁹ compiled it to track recent language change, as well as current-affairs topic change, but we could never have foreseen all the research it has been involved in.

And what of LLMs? In a literal sense they too are human artefacts, tools designed to fulfil a purpose, that of training machines to simulate communication with humans in a life-like manner (setting aside for now the billions of bytes of input pertaining to real world knowledge [mirrored knowledge]). The latest versions surprised even their engineers, at least according to Mollick: 'AI has blown through the Turing Test (can a computer fool a human into thinking it is human?). And the Lovelace Test (can a computer fool a human on creative tasks?)' (2024, xvii). Though we might take issue with the terms 'fool' (if you wish to be 'fooled') and human (what? all of us?). All this has inevitably raised fascinating questions about the nature of consciousness, is there really a Ghost in the Machine? Is human consciousness truly unique, if so, how? AI itself replies it can only simulate consciousness through massive exposure to human consciousness, almost a gargantuan party-trick. And anthropomorphism comes all to

³⁹ <https://centri.unibo.it/colitec/en/research/corpus-assisted-discourse-studies-cads>

easily to the human mind, as if we desperately search a ‘sister mind’ in a universe often conceived as devoid of meaning.

Corpora are designed to render linguistic patterning observable, LLMs to interact more or less directly with humans. Their main design feature is probabilistic text prediction, or ‘proscription’ at scale. What makes them cousins, not descendants of CL, is the emergent regularity that arises when many small rules and examples are allowed to self-organise into higher-order patterns. Does this make them something like Kant’s self-organising organism and not just an artefact? Corpora do not, we may have noticed, self-organise (though they will organise and reorganise in response to software). Kant’s ‘purposiveness without purpose’ seems relevant here: an LLM acts as if it had intentions because its internal architecture enforces coherence, feedback, and consistency. Yet it has no end of its own. Its purposiveness is purely regulative—an interpretive stance humans project onto its behaviour, much as we project it onto organisms, such as pets. It is a *technē* sure enough but the *telos* has to come from the human interlocutor. Take the human ‘out of the loop’ (Mollick 2024, 52-54) and the Ghost in the Machine, mixing metaphors, is a guide-dog with no one to guide.

12.6 The final Twist in the Tale: Evaluative Meaning from Plato to LLMs

12.4.1 Evaluation’s revenge

Aristotle and Plato were both acutely aware of what we would now call evaluative meaning — the first seeing it as opportunity, the second as a sickness to be cured by philosophy. The entire long tradition of propositional–logical philosophy — perhaps reaching its peak in eighteenth- and nineteenth-century German thought — progressively purged language of evaluation. By Kant and Hegel, and most decisively by Frege, all attitudinal or evaluative meaning had been banished from official philosophy altogether — until Nietzsche’s bombshell reintroduced it at the heart of

human thought. Yet even after Nietzsche, the mathematical–logical tradition again dismissed evaluative meaning as, at best, an inconvenience: a flaw, not a feature.

Before this, neither the Stoics nor the Scholastics paid much explicit attention to evaluative meaning in their logical systems. In Aquinas and the Thomists, language remains subservient to divine ontology; moral evaluation is located in theology, not in discourse.

Humboldt comes close to recognising evaluation, though not by name. Languages provide resources for framing experience, and linguistic forms are not a Sapir–Whorf prison but a creative mediation between speakers and the world they inhabit. Evaluation arises from lived reality — the experiential and cultural primings that shape how communities, and individuals within them, value and interpret events. Language gives them the means to frame and share these evaluations with others.

In Wittgenstein II (*Investigations*), evaluation at last returns to centre stage, again implicitly. ‘Meaning is use’ entails that use depends on forms of life — practices that are socially sanctioned, normatively judged, and affectively coloured, from requesting, giving orders, attempting to persuade, even swearing. His examples of apologies, giving orders, cracking jokes, attempts to persuade, expressing doubt and even swearing all carry evaluative force. Wittgenstein dissolves the Platonic ‘evaluation-as-flaw’ by showing that there is barely any non-evaluative language use in human communication. LLMs have correctly simulated this.

And so to CL. Sinclair first insisted that attitudinal — essentially evaluative — meaning is an intrinsic part of the lexical item, in his notion of semantic (evaluative) prosody (whether a lexical item expresses something good or bad). Hunston (Hunston & Thompson 2000; Hunston 2013) then demonstrates, with example after example, how evaluative meaning permeates language, at least up to the phrasal level. Finally, Partington (2017; 2025 [Unit 8]; 2026 [with Diegoli]) shows how evaluative meaning

creates cohesion throughout whole texts, alongside the far more familiar propositional cohesion described by Halliday and Hasan (1985).

Finally, we come back to LLMs. They simulate evaluation in communication partly through emergence — their training data primes them to adopt evaluative tendencies — and partly through human fine-tuning, whereby annotators edit in and out certain evaluations. This latter process is not so different from human communication: speakers too adjust and re-edit their evaluative stance according to situation and audience, whether alone, in company, or in public discourse. Only a saint or a fool reveals their deepest, darkest evaluations to the whole wide world.

12.6.2 Conclusion

From Plato's suspicion of evaluation to Aristotle's embrace of it as the essence of persuasion, from its long exile in formal logic to its rediscovery in corpus linguistics and, now, its extraordinary re-emergence in artificial language models, evaluative meaning has proved irrepressible. It turns out not to be a peripheral ornament of speech but the pulse of communication — the mechanism through which language binds thought to social life. Whether through human primings or machine-learned patterns, communication is rarely neutral: it regularly consciously and unconsciously performs evaluation, itself Wittgensteinian language as action. The irony is that, despite all the finest philosophical attempts to ignore it, the latest, most computational form of language — the LLM — has inadvertently confirmed what the earliest philosophers intuited and what corpus linguistics has demonstrated empirically, namely that understanding is inseparable from valuing, and that communication, human or artificial, lives through its evaluations.

12. 7 Mirror, mirror on the Wall. Who was the Most Influential of them All?

To whom then should we award the ‘Crown of Laurel’ to the most influential thinker on language throughout the whole of Western history?

Obvious candidates include Aristotle, who from the start was not afraid to affirm that language — in the guise of rhetoric — was instrumental, for use in influencing the behaviour and actions of others: in political rhetoric addressing future decisions of the *polis*; in judicial rhetoric evaluating past actions as just or unjust; and in epideictic rhetoric of praise or blame. Nor was he afraid to add that ornamental language, including metaphor and poetry, had its place in decision-making and socialisation.

Another candidate might be von Humboldt for his extraordinarily early insights into language as communication and as doing work, even beyond the descriptivism of grammar and dictionary, mistily foreseeing LLMs 200 years *ante-litteram*. And his distinction between language as finished product i.e. work completed, a corpse (or corpus) to be dissected by discourse analysts and language as communication, as the on-going process of proscription, planning, cataphoric forward-driving in the moment of production, work in action. A distinction all CL needs to keep in mind.

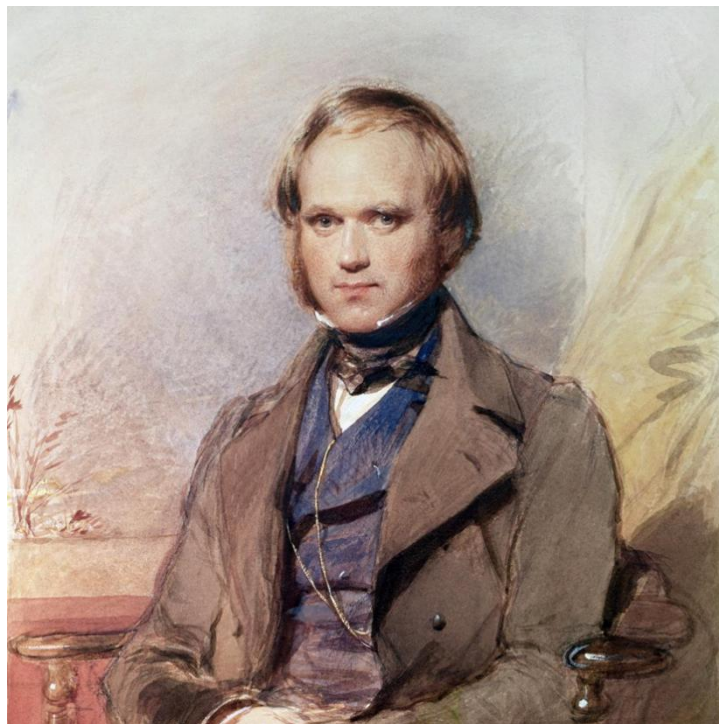
Or perhaps Wittgenstein (*Investigations*) for his clearly stated insistence on language as a toolbox and communication as the employment of these tools, hopefully as appropriately as possible (Hymes 1972) to achieve a speaker’s goals.

And what of ‘our’ CL teams (Sinclair, Stubbs, Hunston, Biber, Hoey and so many others), who have made so many practical and theoretical breakthroughs in ways of studying both language structure and use, not least the reinstatement of evaluation as a mechanism for driving speaker’s aims and shaping entire texts?

However, recalling our reflection on who gets to count as a philosopher and who does not, my pick would have to be someone thought of primarily as a biologist — even a botanist — namely Charles Darwin. Whereas Hegel and others recognised that some

“force” was at work in nature, leading to the birth and development of human consciousness (the mind — itself a metaphor), they could not identify what it was, and so gave it the semi-mystical name of *Geist* (‘Spirit’).

Darwins’ theory of evolution, instead, from the linguist’s standpoint, describes the mechanism of selective survival of those groups of hominids which – more or less by accident, no Lamarckian teleology need be called upon – developed the ability to intercommunicate among themselves efficiently and according to their needs (functionally) were likely out-survive groups which had not developed communicative skills to the same extent. Human language is thus both a para-phenomenon and an enabler of selective, adaptive human evolution.



Once this has been explained and sunk in, it no longer becomes plausible to argue the language is Platonic or Sophist ‘veil over’ or distortion of truth, or a mere ornament. Indeed the Poetic function of language (Jakobson 1960) can be interpreted as a means of socializing within the group. The vain attempts at reducing human language to algebra now look as absurd as they deserve to. And still more hollow becomes Foucault and company’s charge that the principal function of language is to oppress

the huddled masses. Instead it allows the huddled masses to reach new levels of awareness, of thinking, of socialising.

It was Darwin then who, at long last blew the final whistle on the age-old match between the Language Pessimists and the Language Optimists, ending in victory for the Optimists by a landslide.

And thus Darwin explains phylogenetic language evolution (of the species). Hoey (2005) explains ontogenetic language evolution (of every individual through lifelong lexical priming) and the early Hoey textual patterns, Hunston and Partington's evaluative cohesion elucidate the evolution of discourse in a text.

An integrated model of language and discourse as evolution.

Not the End

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This Essay traces the intertwined histories of linguistic and philosophical thought that shaped—and sometimes resisted—the emergence of corpus linguistics. From Aristotle's conception of language as a tool for persuasion, through the different scepticisms of Plato and the Scholastics, to Humboldt's insight that language is a 'formative organ of thought', it follows how successive thinkers imagined the relationship between words, meaning and knowledge. It explores the empirical turn of the Enlightenment, the structural revolutions of the nineteenth century, and the language-conscious philosophy of the twentieth, before concluding with reflections on Large Language Models and their future coexistence with CL and especially CaDS. Written for linguists, philosophers of all stripes and digital humanities alike, the Essay argues that corpus linguistics represents a continuation of a long humanist project: using authentic language data to uncover 'non-obvious meanings' and to refine our understanding of mind, society and communication.

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