ANCIENT GREEK Pronunciation Guide

and discourse on the inherent challenges of establishing a single Ancient Greek pronunciation system

with detailed explanation of the

LUCIAN PRONUNCIATION of Ancient Greek

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INTRODUCTION

The Ancient Greek language presents many obstacles to the non-Greek learner due to unfamiliar grammar, vocabulary, and alphabet. And for those who wish to learn to speak Ancient Greek, another forest must be traversed: the question of “correct” pronunciation.

Indeed, “correctness” is in many ways just in the eye of the beholder, as I shall examine in this essay. Ultimately, pronunciation standards are just conventions, and are convenient insofar as they have utility to the speaker. In the relatively isolated environment of the classroom with fellow students in one’s native country, the convention of the teacher is the only one that matters. But those who end up actively using the Ancient Greek language will no doubt encounter speakers from other parts of the world. This international usage of Ancient Greek is wonderfully appropriate, I opine, since the original cosmopolitan language is quite fit to be used by all citizens of the world of letters. Yet, when such occasions arise for groups of people to gather in spoken Ancient Greek, the stark divergence of pronunciation standards will then immediately cause problems, as I have witnessed on countless occasions: people from different countries use wildly different conventions that impose significant barriers to communication.

Must this always be so? What is the source of these erratic inconsistencies? Can we achieve a voice of our own in Ancient Greek that is at once harmonious with the historical sound of the tongue, and still compatible with existing standards?

The Lucian Pronunciation of Ancient Greek, named after 2nd century author Lucian of Samosata, allows us to imagine what Greek actually sounded like in the 1st and 2nd centuries AD, and, indeed, is designed to be easily modified in a systematic manner, forwards or backwards in time to allow the user to affect an accent from Classical Athens to Late Antiquity and every century in between. While the system I present will demonstrate its highly beneficial built-in variation, the Standard Lucian Pronunciation happens to coincide historically with the Restored Classical Pronunciation of Latin; thus these two together are companions that give a voice to people who lived right at the heart of some of the most studied events in history, and wrote some of the most celebrated literature on earth.

This essay will evaluate the many problems with current pronunciation conventions, and show why I believe Lucian Pronunciation is the balanced historical, practical, beautiful sound we might choose.

AN IMPORTANT NOTE: KOINE & CLASSICAL ATTIC ARE BOTH FORMS OF ANCIENT GREEK

Ancient Greek refers to all Greek literature from the Homeric epics to the pre-Byzantine Church fathers. Classical Attic Greek is said to end in 4th century BC, and the rise of Alexander the Great marks the beginning of the Hellenistic Koine period. Koine is a dialect not only based on Classical Attic, but in most respects its written form is identical. Students of either Koine or
Classical Greek learn the same language. I emphasize this, because the differences are often exaggerated, leading students who wish to read Biblical texts with the impression that they want to learn what they believe is a separate language called “Koine Greek,” and desiring explicitly not to learn what they think is another tongue entirely that they call “Ancient Greek.” This is not the case. Koine Greek is a form of Ancient Greek. Studying either Koine or Classical Greek will grant you the same core competencies.

Indeed, Classical Attic retains such high prestige through the end of Antiquity that some of the greatest authors of Greek in the Koine period use a highly Atticizing Koine that resonates much of the 5th century BC Classical Greek, such as Lucian himself in the 2nd century AD. A degree of that Attic influence can even be perceived in the New Testament (Horrocks 2010).

THE PROBLEM WITH CURRENT PRONUNCIATION CONVENTIONS

There exist several pronunciation conventions for working with Ancient Greek, some more historical than others: Modern Greek Pronunciation (sometimes called Reuchlinian), Buth Koine Pronunciation, Erasmian Pronunciation, Classical 5cBC Attic Pronunciation, and of course Lucian Pronunciation.

Using an historically accurate pronunciation when dealing with an ancient language may not be feasible or desirable: as with the Late Latin text of the Vulgate, neither Classical nor Ecclesiastical would be accurate for the majority of native speakers of the 4th century AD, though the former would conform slightly better. But historical accuracy need not be the sole motivation when speaking or reciting an ancient language. For more information on the pronunciation of Latin, I can strongly recommend the YouTube videos on my channels polyMATHY and ScorpioMartianus, the latter of which hosts my presentation on this subject delivered in Latin in early 2020; and I would also direct you to the Ranieri Latin Pronunciation Chronology Spreadsheet which summarizes my research on the changing sound of Latin through antiquity, as well as my video titled “The Immortal Language: How Pronunciation Made Ideas Everlasting.”

MODERN GREEK PRONUNCIATION

Modern Greek speakers, whether native or associated with the Greek Orthodox Church, use the traditional pronunciation of Greece which treats the letters of Ancient Greek as they are sounded in the Modern Greek language. And clearly this has had utility for many centuries. Why would we be motivated, then, not to use the pronunciation of actual Greek speakers today?

The reason why many have sought a different pronunciation is that Modern Greek has collapsed a great deal of the phonemic variety of the ancient language, variety which is rather fundamental to grammatical structures and lexical meanings in Ancient Greek. A classic
example of this is to compare the words for “we” and “you (plural)” in Ancient Greek, which are spelled ἡμεῖς and ὑμεῖς, but are pronounced exactly the same with Modern Greek pronunciation: /iˈmis/. This merger of many letters and digraphs, namely ι, η, υ, ει, οι, υι, into the same phoneme /i/ is called iotacism. Thus an enormous semantic load is placed on the ears of the listener, and while Modern Greek speakers may be comfortable with this for liturgical purposes, few of them ever attempt to speak Ancient Greek fluently, whereas fluent speaking of Ancient Greek is growing in popularity outside of Greece.

To accommodate the throng of phonetic mergers, those who use Modern Greek pronunciation when speaking Ancient Greek must necessarily modify their word choice away from the norms of written Ancient Greek. What do I mean by this? Well, when words with entirely different meanings and spellings sound identical, they won’t have the same impact as they did when uttered in ancient times when they sounded quite different. Homophonous pronunciations of once heterophonous words doesn’t make communication impossible, but even for those used to the practice, it definitely creates barriers that the ancient speakers never had to deal with.

It’s worth bringing up why it’s valuable to learn to speak a tongue that no longer has native speakers. Simply, it gives us better access to the literature: true reading only occurs when we are able to express ourselves, if only in a very rudimentary way, in the target language, as Dr. Randall Buth explained in his excellent talk on the subject. If we are able to think in Latin, Ancient Greek, Biblical Hebrew, Sanskrit, etc., then we can read the literature of these languages more fluently and with deeper understanding. For teachers and students of the literature of modern languages, it would be inconceivable to attempt to read books by Dante, Molière, Cervantes, Pushkin, etc., without having the most basic of conversational ability.

So most of us who speak an ancient language, especially at a high proficiency level, seek to express ourselves in a way that conforms closely to the texts that we want to read (Classical Latin, Biblical Koine Greek, Classical Attic Greek, etc.). And as we saw with the ἡμεῖς and ὑμεῖς example — among hundreds of others we might mention — this type of merger forces those who use a non-historical Greek pronunciation to change how they arrange their sentences, adding words or changing idioms away from the written norms, thus interfering with the very purpose of speaking the language in the first place: to acquire intuitive proficiency in the ancient written language.

But that said, the semantic load is not so intolerable for Ecclesiastical Latin Pronunciation users; while many confusing mergers do exist, such as ortus “birth” and hortus “garden” which are homophonous in Ecclesiastical, Classical Latin and Ecclesiastical Latin pronunciations are far more similar to each other than Modern Greek pronunciation is to historical pronunciations of any form of Ancient Greek, including Koine.
Therefore a compelling purpose for using an historical pronunciation for an ancient language is to improve intuitive literacy, and increase our connexion to the authors. For those who are comfortable with the higher semantic load, Modern Greek Pronunciation is of course a perfectly reasonable choice, just as Ecclesiastical Pronunciation is for Latin speakers.

ERASMIAN PRONUNCIATION

Erasmian Pronunciation refers to a hodgepodge of systems used with varying consistency in different countries outside of Greece. Named after Erasmus of Rotterdam, who in the 16th century hypothesized about the nature of the sound of Ancient Greek and how it must have differed from the natively Greek spoken in his own time, is the eponymous source of the term Erasmian for these chaotically disorganized conventions.

In the rest of this discourse, you will perceive my antipathy towards Erasmian Pronunciation, so if you happen to prefer it I hope you won’t regard my words as being hostile towards you. Please feel free to continue to enjoy it if you like it. My distaste for Erasmian is mostly centered on what I have found is the right choice for me, and this essay is meant to explain how I arrived at that conclusion.

The issue I have is that the purpose for the existence of the Erasmian Pronunciation of Ancient Greek is to be an accurate historical reconstruction of the ancient language. But the systems used that are called “Erasmian” are only half-restored, unbalanced conventions that make little linguistic sense (as we will treat later), and have not taken advantage of the well developed philological science of the past five hundred years. This is a missed opportunity. As Erasmus intended to explore the actual phonology of Ancient Greek, I think the man, one of the greatest Classicists in history, would be disappointed to know that no progress was made in his name since his initial efforts.

Beyond the unfortunate name and quinquicentennial stunted growth, Erasmian presents several pedagogical obstacles to a deeper appreciation of Ancient Greek literature. Most egregious is the lack of emphasis on distinguishing long and short phonemic vowels — phonemic vowel length is the soul not only of Latin but also of Ancient Greek, and absolutely indispensable for appreciating the poetry and prose of Epic, Lyric, Classical, and Koine Greek. The other problems with Erasmian regard the unequal restoration of vowel and consonant qualities. For example, Erasmian makes the Modern Greek voiced fricatives γ, δ, β into occlusives /g/, /d/, /b/, while leaving χ, θ, φ the same as in Modern: /x/, /θ/, /f/. Yet this is the exact opposite of their historical development: γ, δ, β were certainly fricatives /ɣ/, /ð/, /β/ well before χ, θ, φ mutated from Classical /kʰ/, /tʰ/, /pʰ/ (Horrocks 2010).

Worst of all in Erasmian, I feel, is the invention of a true diphthong /ei/ out of the digraph ει. The digraph ει at no point represents the diphthong /ei/ from the Classical Attic of the 5th century BC up to the present (Allen 1968, Horrocks 2010). It is at all times from 5cBC to present a monophthong, the long vowel /eː/ in the Classical period and later /iː/ before...
consonants by the Roman Republic, and then /iː/ everywhere in the Roman Empire. Many more critiques may be leveled at Erasmian Pronunciation, particularly how inconsistently it is realized between countries (which I have observed first-hand lead to further confusion among its users), its lack of interest in the vital Ancient Greek characteristic of pitch accent which was still active through to the end of the Western Roman Empire, and other inadequacies.

With all those criticisms voiced, we can note that Erasmian, however imperfectly, at least seeks to untangle iotaism, among other mergers of this type. This much is laudable. My disappointment with Erasmian can be summarized with two points: 1) its purpose for existing is to be historical, yet the philology behind it has not been advanced since the age of Erasmus and thus is entirely anachronistic; 2) its practical realization leads to other mergers, such as English speakers who natively render ει, η, and even many occurrences of ε as a single diphthong /eɪ/, which replaces the semantic confusion of Modern Greek Pronunciation with a similarly difficult merger. This is an obstacle to comprehension, as I have experienced firsthand and witnessed on countless occasions in groups of speakers of Ancient Greek.

Ultimately, if individuals have used Erasmian as a Greek pronunciation for a long time, they could not be expected to change their convention, and I do not criticize them if they prefer it. I do not, however, in any way advocate its further employment where better systems exist (which, as we will see, they do).

BUTH KOINE PRONUNCIATION

The illustrious Dr. Randall Buth has proposed a compromise in his Buth Koine Pronunciation of Greek (Buth 2012). You can hear examples of Buth Koine recited by fluent speaker and wonderful Hellenist Ben Kantor at his KoineGreek.com website and YouTube channel. This system resolves some of the above complaints about Erasmian. Based on copious exemplars of spelling errors found in Egyptian papyri, it seeks to recreate a sound of Greek during the Late Koine period.

While Buth Koine comes close, I believe, to representing the sound of at least some speakers of Greek at some historical period, it seems vanishingly unlikely it can account for the majority of Greek speakers during the time of the events of most of the Koine period particularly during Classical Rome, where we have direct attestations of living grammarians as to the sound of contemporary Greek, such as Cicero, Quintilian, Velius Longus, and Terentianus Maurus, all of whom describe the sound of living Greek in their own centuries and how it can vary according to dialect; they do not speak about Greek pronunciation in some idealized form that represents no one.

In this sense I regard Buth Koine, while a beautiful system and definitely a reconstruction superior to any variety of Erasmian, as being too evolved, if you will: very much at home in the Byzantine Greek period, but too similar to Modern Greek to be the voice of most Greek speakers of the early Roman Empire, to wit: Buth Koine ignores phonemic vowel length,
pitch accent, geminated consonants, and assimilates to Modern Greek many other features. Dr. Buth has indeed found compelling evidence for the seeds of such developments during the Koine period, but, as I have stated, the direct attestation by living Koine period grammarians contrary to the conclusions of Dr. Buth shows that, if Buth Koine is the sound of Koine speakers, it was not all of them.

Dr. Buth, whom I must reiterate I admire greatly, and I have had a public discussion about this topic on an online forum, which you may read at this link. I encourage you to investigate our respective conclusions and make up your own mind on the historical validity of either Lucian Pronunciation or Buth Koine Pronunciation.

But as I mentioned above, a high degree of historical accuracy, while a very interesting pursuit and highly valuable for many reasons, is not the only cause for adopting one convention or another when dealing with ancient languages. The quadrivium which guides these decisions for all people will be elaborated on below.

RESTORED CLASSICAL 5th CENTURY BC ATTIC PRONUNCIATION

Another standard to mention is the seldom-employed but highly venerable reconstructed 5th century BC Classical Attic Pronunciation, which enjoys advocates like Ioannis Stratakis on his Podium-Arts YouTube channel. I myself at one time used 5cBC Classical Attic Pronunciation exclusively. While this pronunciation is certainly viable for much of the Koine literature, especially because it does retain phonemic vowel length, pitch accent, and geminated consonants, all of which are sine qua non for Ancient Greek, some sounds are sufficiently foreign both to Modern Greek speakers and to other European language speakers, as to discourage my personal employment of for all Ancient Greek.

And herein lies the problem of practicality: when one learns Ancient Greek, whether concentrating on Biblical Koine or Classical Attic, it remains the same language. Inevitably, the student of one style will read texts from the other style. Should the student shift pronunciations suddenly when encountering the text of a different century? By what degree? Which letters should change their sound? While I enjoy such exercises in phonological reconstruction quite a bit, it is impractical for most people. Learning any language is difficult enough, especially an ancient one, and doubly so for Greek. Moreover, fluent reading requires mastery of at least one sound system, so being exposed to multiple sound systems can be counter-productive for beginners, and of marginal utility only for advanced readers. It is a reason that students of Spanish, Portuguese, or English will choose one of the dominant forms of these global languages, rather than seeking to learn all the standard pronunciations from the start. Moreover, this is why non-historical pronunciations like Erasmian and Modern Greek Pronunciation are obviously perfectly valid ways to learn and teach the language, since the basic ability to read consistently and fluently by the end is the same.
Still, this is troubling, since Erasmian, Modern, Buth Koine, and Classical Attic are not especially compatible with each other in a group setting. Unlike Ecclesiastical and Classical Latin pronunciations, which take very little time for speakers of one to get used to the other since the semantic load of the differences is so low, groups of people attempting to speak in Erasmian, Modern, Buth Koine, and Classical Attic pronunciations at the same time end up experience a lot of confusion, which I have witnessed first hand on many occasions.

This inspired my quest: Can we find a system of sounds that we can confirm existed historically, and also allows us access to all of Ancient Greek literature? Could this system even unite the disparate groups that currently exist?

It was in pursuit of an answer to these questions that my colleague Raphael Turrigiano and I developed the Lucian Pronunciation of Ancient Greek: a system which satisfies the quadrivium, as we call it, of factors which influence our decision when choosing a pronunciation convention for an ancient language:

Science • Art • Pedagogy • Politics

The factor of science refers to the linguistic accuracy of pronunciation as an historical reconstruction (if it is attempting to do so): is this the sound of the language when it was spoken natively?

Next, art is the aesthetic value to the user, a factor which is entirely subjective, but quite important nonetheless: do I like the sound of this pronunciation?

The factor of pedagogy refers to the utility of the pronunciation in the classroom: will my students be able to understand this pronunciation consistently?

And the factor of politics refers to cultural norms; for example, the traditions of speakers of native languages descended from the ancient ones, such as Italians for Latin and Greeks for Ancient Greek: will they accept it?

Based on this quadrivium, we may judge any historical pronunciation system. Let’s do that now for Latin, then Greek. These analyses will not be exhaustive, but merely representative of my own perspectives.

Restored Classical vs. Italian Ecclesiastical in Latin

SCIENCE: by definition the former is highly accurate to the centuries of 100 BC to 200 AD. The latter only begins to exist in the 9cAD (Wright 1982).

ART: Classical is aesthetically pleasing to many, especially if rendered with correct attention to the precise phonemes; when spoken with strong American or German accents, however,
Italians misunderstand the Germanic accents as being an inherent part of the pronunciation system (which is not the case), and often reject it on these superficial grounds (but I can understand why they would feel this way). In contrast, the usage of Ecclesiastical in music for centuries associates it with lots of aesthetic beauty.

PEDAGOGY: Classical is equally as useful as Ecclesiastical Pronunciation. Both Ecclesiastical and Classical Pronunciation should teach phonemic vowel length, but this has been less common until more recently; however, insofar as Classical Pronunciation strictly teaches phonemic vowel length, this makes it pedagogically more useful.

POLITICS: as Ecclesiastical Pronunciation is the traditional pronunciation of Italy, and ever since the 1910s the pronunciation of the Catholic Church, Ecclesiastical Pronunciation has become associated with certain political and ethnographic dynamics in Europe that are less familiar to me as an American; namely, Northern Europeans vs. Southern Europeans, Catholics vs. Protestants, etc. This association can motivate those with connexions to the Catholic Church to prefer Ecclesiastical, and those who would rather not invoke the Church to prefer Classical. (I have witnessed vitriolic altercations erupt on these grounds.)

As we can surmise, all of the above factors come into play when choosing a pronunciation. In the case of Latin, the art factor has been a primary obstacle for Italians becoming interested in using Classical pronunciation, because they think it has to sound like a person with a strong American or German accent. But very often when an accurate historical model is shown to them, one which naturally sounds quite a bit more like an actual Romance language, I have observed it to be well liked by most Italians. Indeed, the majority of the fluent Latin speakers I know from Italy use the Classical pronunciation, and being Italian they sound fabulous since Italian phonology has a great deal in common with Latin.

*Modern Greek Pronunciation in Ancient Greek*

SCIENCE: not historical, but at least the phonetic system corresponds to a form of Greek.

ART: very aesthetically pleasing to me, because Modern Greek sounds wonderful.

PEDAGOGY: the semantic load mentioned above is the main issue.

POLITICS: perhaps even more intensely than with Ecclesiastical vs. Classical in Latin, Greeks are fiercely defensive of their heritage, and regard almost any attempt to reconstruct a language that they see as inseparable from their own vernacular as a vicious attack from
barbarous outsiders. While Italians may react strongly in defense of the Ecclesiastical Pronunciation they learned in school, Greeks will rebel furiously, as if their very identity were being stolen from them. This isn’t hyperbole. More than that, and most remarkably, many Greeks are usually taught in school that the Greek language has sounded exactly like the modern one since earliest antiquity. Some Greek academics will even publish linguistic articles asserting such things (Caragounis 1995). I welcome you to see the comments sections of my videos where I talk about or use Restored Classical Attic, and see what many of the native Modern Greek speakers have to say about historical reconstructions of Ancient Greek. (You will however see many positive responses to Lucian Pronunciation from Greeks.)

So you can imagine that developing a pronunciation system for Ancient Greek that would be agreeable to native Modern Greek speakers, as accurately pronounced Classical Latin also is often agreeable to Italians, to be an important factor indeed.

**Erasmian Pronunciation in Ancient Greek**

**SCIENCE:** ostensibly an historical reconstruction, it’s actually the exact opposite.

**ART:** varies widely from speaker to speaker. The fact that its purpose for existing is to be an historical reconstruction, yet isn’t at all, makes it aesthetically displeasing to me.

**PEDAGOGY:** proven track record of utility in the classroom; its greatest deficiency is in the absence of phonemic vowel length.

**POLITICS:** same as the above, but in reverse; I have observed many Classicists look down on Modern Greek, and I think there is an ethno-religious origin to this as well, going back to the Great Schism between the Eastern and Western Christian Church. You would be surprised how often these old hatreds from Greece against the West or from Western Europeans against Greeks appear in online debates about “correct” Ancient Greek pronunciation.

Greeks will not accept Erasmian. And since it is an anachronistic mix of half-restored phonetics, why should they?

**Restored 5cBC Classical Attic**

**SCIENCE:** well constructed model that is applicable at least to the 5cBC, and certainly into the 4cBC.
ART: when done well, such as by native Modern Greek speaker Ioannis Stratakis, it sounds authentically “Greek.” (Surprisingly, despite the precision and style of his performances, not many Greeks seem obliged to follow Stratakis’ example.)

PEDAGOGY: this is the sticky part that I encountered when seeking to promote Restored Classical Attic pronunciation. Even if willing, and fully embracing the science, very few people who learn Ancient Greek speak a language that has phonemically aspirated consonants. Now, we do have aspirated voiceless occlusives in English, like some other Germanic languages, but it’s allophonic, meaning it only occurs in certain environments, namely just initial to words or prior to stressed syllables, such as pan which has /pʰ/ while span has /p/ — you can test this by holding your hand in front of your face pronouncing each of these words; the first will have a more impressive puff of air.

But Ancient Greek has these as phonemic differences, so aspirated φῶς “light” and unaspirated πῶς “how” are completely different words and would never be confused by native speakers who have this distinction. Well known languages that have phonemic aspirated occlusives include Chinese, Korean, Hindi, and Icelandic. But unless you speak one of these really well, picking up this distinction will not be easy. So to achieve the correct effect in English, we have to train ourselves to aspirate internally to a word, and de-aspirate initially, so that ἐπη /epeː/ sounds like a different phoneme from ἐφη /epʰeː/, and πῶς vs. φῶς need to sound different too. While I am comfortable doing this with Ancient Greek, I found that nearly all those I was encouraging to follow a similar path were unable to achieve any consistency. This is perfectly understandable. Much of the time, the native English speakers I have met trying to do 5cBC Classical Attic make initial /pʰ/ like in φῶς not into an aspirate, but into an affricate, and say /pʰf/, thus /pʰoːs/, and their “unaspirated” initial π is just like in English “pan.” So they’ll distinguish φῶς “light” from πῶς “how” as /pʰoːs/ and /pʰoːs/ respectively, which does nothing to aid comprehension.

And since any consistency is not to be expected, huge semantic confusion ensues anyway. Failing to hit the mark by creating more mergers that are not historically attested defeats the purpose of trying to restore an ancient phonology. I am perfectly fine with employing historically attested mergers, such as ι and ει = /iː/ from Koine to present, but making new ones is not at all a desirable outcome.

While I am a polyglot and get giddy about pronunciation varieties and difficult aspects of phonology, most people who deal with classical languages don’t necessarily have the essential background in phonetics to attempt a difficult thing consistently and correctly like distinguishing /p/ from /pʰ/, and probably just want a convention that works well enough for their own pedagogical purposes — hence their perfectly reasonable attraction to Erasmian.
POLITICS: as mentioned above, few Greeks have taken to adopting the 5cBC phonology, maybe because it's just as difficult for them.

Buth Koine Pronunciation

SCIENCE: using excellent and well curated data from the Koine period, mostly in the form of spelling errors, Buth has found plenty of evidence for certain mergers (that I will be discussing in more detail below) that presage the same mergers found in Modern Greek. Buth's phonetic choices are mostly superb, with only a few additional prescriptions required like retracted s / ʃ /, and palatalized velar occlusives in front of front vowels (such as κε γε χε, to be explained below) to make it a fully consistent system that definitively existed in Greek history.

My conclusions (and those of others like Horrocks and Allen) show that the Buth Koine system, with the above mandatory additions, is especially representative of a general sound of Greek late in Antiquity and certainly in much of the Byzantine Greek period, with the number of speakers who have all these features less and less represented the further we go back in time. Buth Koine rejects phonemic vowel length, geminated consonants, and pitch accent, all of which are well attested at least into the 2cAD and indeed quite a bit later until the 4cAD. (Geminated consonants still exist in some Modern Greek dialects!) An excellent example is the Seikilos epitaph, which is famous for having preserved sheet music composed by (assumed to be) middle class native speakers of Greek, and this among many other popular musical compositions show intuitive understanding of lexical pitch accent, phonemic vowel length, and geminated consonants.

ART: as mentioned above, Ben Kantor's beautiful rendition of Buth Koine pronunciation is fantastic, and his speaking fluency is truly admirable. Since this aims to be an historical pronunciation of some period, my only desire would be for the palatalization of velars before front vowels and retracted s, just as Modern Greek. These features, indeed, would make it sound even more like Modern Greek, which is always a good thing where it is historically reasonable.

PEDAGOGY: Buth Koine differs notably from Erasmian by using all six fricatives for χ γ θ δ φ β just as the Modern language, which makes it as easy to learn and use as Erasmian despite differing from it, and also makes ευ = εβ and αυ = αβ, a merger found as Modern Greek too. Additionally, diphthongs ᾦ and οι are monophthongized, the former just like Modern Greek as /ɛ/, and the latter merged with ν /y/. These mergers somewhat increase the semantic load of individual phonemes with respect to Classical Attic or well pronounced Erasmian (which, as we mentioned above, can have lots of unintended mergers). However, on the whole there can be no doubt that Classical Attic, Erasmian, Buth Koine, and Modern Greek pronunciations are
about equal in their utility in the classroom when it comes to plain teaching and recitation, though Modern Greek pronunciation is probably the most hindered due to its high number of mergers and consequent semantic load.

POLITICS: Buth Koine has gained support in communities of Biblical scholarship, supplanting Erasmian in such places, which, in my clearly biased opinion on the matter, is a good thing, but this has also associated it with a lower form of Greek, since many Classicists deal with pre-Biblical literature and may not care much for Koine literature (which is, in my opinion, a mistake since the overwhelming majority of Ancient Greek literature is from the Koine period); thus many Classicizing Attic fans prefer Erasmian’s clearer distinctions, despite its antihistorical faults, assuming they are even aware of them. Thus the literary divide that already existed between academics of the Classical language and Biblical specialists is now also marked by pronunciation choice. This is a shame.

As a lover of Ancient Greek, I would very much prefer to have a pronunciation that unites these disparate groups. We have a pronunciation for 5cBC Classical Attic, 5cAD Koine-Byzantine, and post-Byzantine Modern Greek (and also Erasmian, which fits nowhere on the timeline). Can’t we have something in the middle? Would such a pronunciation indeed be more useful than the above systems?

Let’s review the four systems together. Science: The systems of Classical Attic and Buth Koine get points for being (for the most part) very historical representations of the Greek language at some point, so if that’s important to you (and it clearly is to me), then these two offer something. Art: All four are aesthetically attractive to me except for Erasmian, for the above stated reasons. Pedagogy: Classical Attic and Modern Pronunciation take the hit here, the former for having aspirated occlusives that are hard for most people to produce, and the latter for the huge amount of semantic load. Politics: All of them have deep and likely unresolvable problems.

This is where I found myself in early 2020: four conventions, none of which satisfies the complete quadrivium.
LUCIAN PRONUNCIATION OF ANCIENT GREEK

As I have suggested up to this point, Lucian Pronunciation satisfies all factors in the quadrivium. In this section, I will provide you with a detailed pronunciation guide, as well as explain many of the historically attested changes of Ancient Greek pronunciation through the centuries. If you would like a video summary of the below, I recommend you watch the [video presentation](https://www.youtube.com/watch?v=POLYMATHT) made by myself and Raphael Turrigiano on my YouTube channel polyMATHY.

And as you will find out, Lucian is not just a single monolithic standard; it contains a core standard with a range of more conservative and more innovate varieties that the speaker may choose from based on personal preference. Since Lucian has similarities with all of the other systems, I have also observed that Lucian has the rather surprising ability to increase the mutual comprehensibility of everyone in a group setting where multiple pronunciation systems are being used: users of 5cBC Classical Attic, Erasmian, Buth Koine, and Modern tend to understand Lucian user with ease, and vice versa.

Lucian Pronunciation, however, is not truly novel; the research in historical changes to native phonetics has already been done by many others including W. Sydney Allen and Geoffrey Horrocks. The only novelty here is that we have put into practice as a coherent system the sound of the language during an important stage in its history, corresponding to the Classical Period of Latin literature and to the Second Sophistic of Greek literature in the Early Empire.

QUANTITY & QUALITY

International Phonetic Alphabet (IPA) symbols will be used extensively to indicate phonemes. If you are unfamiliar with these symbols and would like to learn more, you can copy and paste them into Google or directly into Wikipedia to hear them pronounced.

Two useful linguistic terms are quantity and quality. Quantity is the duration of a vowel, consonant, or syllable. The first vowel in the Latin word *amāre* “to love” differs from the second vowel in terms of quantity only: /a/ vs. /aː/. Their quality (the precise shape of the mouth when uttered) is identical. Quantity in IPA is indicated by the two triangular dots (ː). The first and last vowel of *amāre* have the same quantity, being short, yet have different oral shapes when uttered, thus they are said to differ in quality.

Gemination of consonants in Italian, Japanese, Finnish, and Latin is a way that these written languages show the quantity of long consonants. For example, Latin *annus* /anːus/ “year” differs from *anus* /anuːs/ “old woman” in that the first word has a geminated or long consonant sound /nː/ (the quantity of the *n* is long). As a consequence, the first syllable of *annus* is long in duration, while the first syllable in *anus* is short.
VOWELS

Most Lucian Pronunciation vowel qualities are the same as in Modern Greek:

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<th>IPA</th>
<th>example word</th>
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<td>α</td>
<td>/a/</td>
<td>ἄρτι</td>
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<td>ε</td>
<td>/ɛ/</td>
<td>ἔχω</td>
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<td>ι</td>
<td>/i/</td>
<td>ἵως</td>
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<td>ο</td>
<td>/o/</td>
<td>ὅψις</td>
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Ancient Greek also has the sound:

υ /y/ λόκος

Lucian Pronunciation retains the phonemic distinction between short and long vowels. The long vowels have the same quality as the short vowels, but they have a longer duration:

ā /aː/ ἁγάν
η /ɛː/ ἔτη
ει /iː/ εῖπον
ī /iː/ ἀποκρινεται
ω /oː/ κώμη
ου /uː/ ούδαμως
ū /yː/ δείκνυμι

When hearing words with phonemic vowel length in unstressed syllables for the first time, such as δείκνυμι, listeners can be confused, particularly Italian and English speakers. In English and most especially Italian, long duration vowels are associated with stressed vowels in open syllables, such as the second a in Italian mangiare “to eat.” So upon hearing δείκνυμι as /ðiːknymi/, you might interpret stress in the second syllable because the vowel is long. Learning to distinguish quantity from accent is perhaps the most critical part of internalizing Latin and Ancient Greek phonology.

Note that ει /iː/ and ī /iː/ have merged completely in Standard Lucian. However, ει before vowels likely retained a more open quality for at least some speakers until the early Roman Empire. We can tell this easily from the frequency of both spellings in Latin: Alexandrēa occurs 73 times, while Alexandrīa occurs 205 times. Cicero, who lived in the 1cBC, used both,
the former 31 times, and the latter 18 times, indicating that the Late Republic to Early Empire is when the quality was merging to /iː/ in both environments.

If you prefer a more conservative variant of Lucian, you might open ει + vowel to /eː/. However, ει + consonant should still be /iː/, since all Greek words with ει + consonant are i in Latin, which borrows from Greek during its entire Koine period. If you make ει /eː/ in all environments, then you have restored the Classical Attic sound of the digraph.

This ability for Lucian Pronunciation to be systematically adapted into more conservative or more innovative variants is one of its key features. This also promotes an atmosphere of tolerance, since it has both internal variation and is compatible with other pronunciation systems.

How do we know that Ancient Greek had phonemic vowel length? Allen (1968) and Horrocks (2010) demonstrate the detailed research. In brief: the Ancient Greeks themselves explain this feature, as do their Latin speaking contemporaries in the Roman Republic and Empire when describing both languages.

There are other ancient languages like Hebrew which certainly had phonemic vowel length at one point in history. Classical Hebrew poetry, however, in contrast with Classical Arabic, does not make explicit use of syllable length when arranging metrical patterns. Since Biblical Hebrew literature does not depend on phonemic vowel or syllable length, it is perfectly reasonable to adopt a spoken Hebrew convention that does not retain this feature.

This is not the case for Ancient Greek and Latin, whose literature is fundamentally based on the interchange of long and short syllables. And not just poetry: the prose of great rhetoricians, and even historians and plain letter writers, all include a conscious effort, or unconscious motivation, to improve the euphony of the text through this careful arrangement. You will hear the effect of this in my recitations of Ancient Greek, whether prose or poetry, and even from the Bible; certain lines are meant to have a deliberately powerful impact based on the sequence of short and long syllables. Teaching Koine Greek without any attempt to train phonemic vowel and syllable length robs us of the ability to explore this possibility.

As I mentioned above, if you have no experience with a language that has phonemic vowel length (ones that do have it include Japanese, Classical Arabic, Estonian, BCSM, Slovak, Czech, Finnish, and Hungarian), this difference may still seem unimportant to you, especially if you have spent a lot of time already with Latin and Ancient Greek without being trained in this aspect of their phonologies. To help show why this is such a big deal, let me illustrate with a more vivid example. French does not have lexical stress: unlike English, Italian, German, Russian, Portuguese, Romanian, Spanish, and many others, French words do not have one emphasized syllable; all are stressed equally; or rather, certain syllables in a phrase (usually the last syllable) get emphasized for a variety of expressive or prosodic purposes. (Dynamic stress...
or accent is realized in most languages as greater loudness, and occasionally higher pitch as well as lengthening of the stressed syllable, though the latter two are not always true.)

While French poetry is based merely on the number of syllables per line, the poetry of English, Italian, German, Russian, etc., is based on the arrangement of stressed syllables. Therefore, if a Frenchman speaks English fluently but without command of lexical stress (and all the other lovely features that a strong French accent will have in English), he will still probably be well understood in conversation. But if the same Frenchman picks up a poem by Shakespeare, he will not be able to recite it correctly, nor appreciate the nuance of interchanged syllable stress that every native English speaker employs naturally. Thus a famous line like

Shall I compare thee to a summer’s day?
Thou art more lovely and more temperate.

can only be appreciated by the Frenchman in terms of its raw literal meaning. The music of the verse will be totally lost on him, until he learns to use stress accent in his spoken English.

Here is another analogy. Music also has interchange of longer and shorter notes. Imagine some famous songs, but performed where each syllable gets the same quarter note length. They would all sound terrible! The musicality is completely gone; indeed, they become different songs.

Given the essential importance of phonemic vowel length to Latin and Ancient Greek literature, I do not believe we should rob students of this intuitive understanding in their initial studies. It’s so much harder to learn later. But even if we do learn it later, it is well worth the effort! The reward for doing so is to feel resonating in our ears and hearts the intended musicality of some of the greatest poetry ever composed in the history of the human race.

Let’s talk about some variants in the basic vowel qualities. Horrocks (2010) and Buth (2012) show relatively few confusions between ε and η during the Koine period, which suggests they had sufficiently different quality for many speakers. Although for simplicity I prescribe the same vowel quality in standard Lucian (true-mid vowel ɛ for both,) I think it’s perfectly reasonable to raise the quality of η and make it /e:/, which was certainly its quality before merging later with /i/.

I also prescribe the true-mid vowel for both ω and ο, but you may be inclined to vary these based on personal preference. This isn’t particularly important, as their critical difference is quantity, not quality.

As for Dr. Buth’s assertion that phonemic vowel length was lost in all Greek by the 3cBC, I vigorously argue against this based on the fact that borrowings from Greek into Latin, each borrowing having occurred from the 3cBC forward, regularly retain the phonemic vowel

Ancient Greek Pronunciation

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lengths of the original Greek words. Moreover, Greek borrowings consistently show Latinized spelling conventions that imitate the Greek pronunciation with which they came in contact:

κωμῳδία > cōmoedia, 2cBC

The long diphthong /oːj/ is rendered as /oe/ in Latin (pre-Classical Latin /oj/).

ῥαψῳδός > rhapsōdas, 1cBC

By 1cBC, the long diphthongs had merged with regular long vowels, confirmed by Latin transcriptions.

φοίνικος > foenīcis, 2cAD

The emergence of a fricative form of φ was noticed by Latin speakers.

And, as we just recalled, Latin retains phonemic long vowels wherever they are current in contemporary Greek. Buth points to spelling confusions such as αι ~ ε, ει ~ ι, and ω ~ ο as hard evidence proving the loss of phonemic vowel length. However, in response to these same conclusions arrived at by others, Allen says on p. 94 of Vox Graeca, “whilst these phenomena could result from a loss of length distinctions, they need not do so, and cannot therefore be relied upon as evidence,” and specifically in reference to αι for ε and vice versa, “this need indicate no more than the quality of the monophthong in the absence of any other appropriate symbol,” and places the loss of phonemic vowel length at the 3cAD (Allen, 1969).

I take a somewhat more charitable view towards Dr. Buth’s analysis, and I say that his model can certainly be a voice for at least some Greek speakers during the Koine period, especially the later Koine period, and most definitely for Byzantine Greek. The quest for a single, dominant pronunciation is probably foolhardy. I can imagine a Mediterranean world where millions of Greek speakers use something like Standard Lucian Pronunciation and millions more use Buth Koine Pronunciation, and coexist just fine (or perhaps one or the other was geographically isolated somehow). This may be the best explanation when compelling evidence exists for both systems.

What ought we to do then? This is where pedagogy comes into play: do we choose a system that cuts us off from an intuitive understanding of the rhythms employed in literature, both poetry and prose? (i.e., do we recite Shakespeare like a Pepé Le Pew?) or do we select a more expansive model that can accommodate both potential realities? If you resonate favorably with my leading questions, you can probably see why Raphael Turrigiano and I were driven to put the historical Greek phonology research that already existed into practice and propose the Lucian Pronunciation system.
Diphthongs

Lucian Pronunciation also has two true diphthongs:

αι /æ̯i/ κόραι
οι /øi/ οἶμοι

You can think of the former as a transition between /a/ and /e/, exactly as it is in Classical Latin. The latter is a transition from /ø/ to /y/. Just as /y/ is the rounded version of /i/, /φ/ is the rounded version of /ɛ/. Note that diphthongs are considered a species of long vowel.

It’s perfectly reasonable to affect a more conservative accent by leaving these diphthongs closer to their 5cBC equivalents: /ai/ and /oi/. I personally tend to render the former a bit more evolved, shifting the first element forward: /æ̯e̯/, such as in καί /cæ̯e̯/ meaning “and.” In practice, my way of pronouncing οι in recitation ends up being closer to /φγ/. The point that all of these variations demonstrate is a tendency to round and to front both components, which helps the diphthong to represent the intermediary stage between Classical Greek /oi/ and Byzantine /y/.

And you may prefer to evolve both of these digraphs into monophthongs. If you desire this, my pedagogical recommendation is for αι /æː/ and οι /øː/ since this keeps them phonetically distinct from other vowels. But if you like the merger, as is used in Buth Koine, then it’s certainly within the realm of historical reasonability to make them αι /ɛː/ and οι /yː/. No doubt many living speakers were producing a variety of these while the diphthongs become monophthongs in the Koine period. Note that if you use /ɛː/ for αι, you will definitely have to raise η to /eː/, as αι and η do not merge in Modern Greek.

Prior to the 1st Century BC, Ancient Greek had long diphthongs, marked by the iota-subscript, but these merged with the plain long monophthong vowels:

φ /aː/ ζδῶ
η /ɛː/ ληστής
ω /øː/ κωμῳδία

If, however, you would like to have a more conservative sound in your personal version of Lucian Pronunciation, you may choose to restore the iota-subscripts. (Note that if you do this, you will probably also want to have other conservative traits contemporary with pre-1cBC Koine, such as aspirates for χ θ φ instead of fricatives. Ranieri’s Greek Pronunciation Chronology Spreadsheet will be a useful tool to help you track these synchronic changes on the timeline, as will the Lucian Pronunciation Chart which follows this guide).
The Aspirate

The “aspirate” is the name for the sound of English ‘h’, /h/. As in my pronunciation of Classical Latin, I frequently pronounce this sound in hiatus, that is, when it occurs after a pause, such as at the beginning of a phrase. However, this sound will tend to go silent with a continuously enunciated phrase, such as in: Ὅ στρατιώτης τὸ αἷμα βλέπει.

If you’re interested in a more innovative sound, you may allow the aspirate to be completely silent. A more conservative variant would pronounce the /h/ consistently.

Synaloephe: Vowel Junctions Between Words

In Latin, all final vowels that occur before a word that starts with a vowel, such as multum ille (final -m in Latin is not a true consonant, but the nasalization of the preceding vowel, thus Latin final -am, -em, -im, and -um all behave as vowels in front of other vowels) are blended into the vowel of the following syllable.

The situation is a bit more various in Ancient Greek. The Latin paradigm works fine as one possibility which does occur in Greek; the other is that final long vowels, instead of being completely merged or elided into the following vowel, retain their syllabic weight and are merely corrupted into a short vowel. For example, ἀντὶ ἔλεγον results in /afʷto ἔλεγον/.

Just as in Latin, vowel mergers occur through the aspirate /h/ as if it weren’t even there: ἀλλὰ ἵνα for example is often written ἀλλ’ ἵνα. I will occasionally pronounce the /h/ in word combinations like ἀλλ’ ἵνα, which would be a more conservative rendering of the sound. Spelling indications like ἀλλ’ ἵνα or ἀλλ’ ἐγώ are orthographic examples of true elision (removal of the first of the two vowels at word boundaries in pronunciation; for more on the types of Greek synaloephe, see Vox Graeca).

Consonants

As in Modern Greek, σ and ζ are retracted since Greek of all periods lacks a post-alveolar fricative, the /ʃ/ sound as the English word “she.” (This is also true of Classical Latin.)

σ /s̠/ συκίζω
ζ /z̠ː/ ζητεῖσ

If your language contains both /s/ and /ʃ/, as in English or Italian, you can find this sound by either retracting your tongue from your normal /s/, or pushing it forward from your normal /ʃ/. If your native language is Greek, European Spanish, Finnish, etc., then the sound of retracted s /s̠/ should come naturally.
Before voiced consonants, σ will be voiced, as in Λέσβος /lezβος/ and τὰς δὲ /taːz de/, just as in Modern Greek. Greek shares this trait with Latin, Spanish, Italian, and other languages.

The sound of ζ is always geminated, meaning doubled in duration. This is because it developed from a more complex sound, either /zd/ or /dz/; precisely because neither /zd/ nor /dz/ can be absolutely defined as the correct candidate in the antecedent to Koine Greek at this time — Allen’s (1968) conclusion in favor of metathesis of /dz/ into /zd/ requires more linguistic scrutiny — I tend to discourage any attempt to render either when dealing with Ancient Greek, and favor /z/ for all periods of Ancient Greek.

Letters δ and θ are dental fricatives, as in Modern Greek.

δ /ð/ δίδωμι
θ /θ/ θέλω

The earliest evidence that δ had become /ð/ for at least some Greek speakers is found in non-Attic dialects of the 6cBC (Horrocks 2010), with more evidence of it in Koine, the successor to Attic, starting in the 3cBC. In Standard Lucian Pronunciation, I recommend the fricative /ð/ everywhere, except after /n/ such as in the word ἄνδρα /ándɾa/ and in word combinations such as ὧν δέ /hon de/.

The pronunciation of θ was the aspirate /tʰ/ in Classical Attic and definitely the general pronunciation in much of Greek in the first part of the Koine period; yet the first possible evidence of a fricative pronunciation comes from the Doric of the 5cBC (Horrocks 2010). How early this became generalized is too hard to tell at this time, but the fricative pronunciation /θ/ probably became common during the Roman Empire. This is why it is recommended in Standard Lucian.

Letters γ and χ are also as in Modern Greek. In front of back vowels, they are /ɣ/ and /χ/.

γ /ɣ/ Γαλάτεια, γαῦρος, γονεῖς, γοῦν
χ /χ/ χαμαί, χαυών, χόρτος, έχουσιν

You can make the sound /ɣ/ by saying the g-sound in “go” many times to teach yourself to consciously recognise the point of articulation. Then, while silently pressing the tongue to the velar part of the roof of the mouth where the /g/ is sounded, slightly separate the tongue from that point, and it should be close enough to say the voiced velar fricative /ɣ/. You can do the same for /χ/ (which is found in German words such as Bach), just keep your vocal cords silent on the χ sound to make it the voiceless version of /ɣ/.
But before front vowels (αι ἐ ει η ι οι υ), they move forward into the palate, which is a process called palatalization, a key feature both of Modern Greek and Koine (and incidentally post-Classical Latin). Front vowels are those that are articulated at the front of the mouth, such as Latin /e/, /i/, /y/, while back vowels are articulated are articulated towards the back, for example Latin /a/, /o/, /u/.

γ /j/ γῆ, γαῖα, γεῦμα, γιλός, γοῖ, γύψ

Note that αι and οι diphthongs behave as front vowels. Something very similar occurs in the Icelandic word kær /chæːr/ “dear” where the diphthong /aj/ palatalizes the k just like other front vowels.

The palatalized version of γ, /j/, is really fun to pronounce. You can achieve this sound by saying the y-sound /j/ in English “yeah” several times until you feel the point of articulation in the palate; then, while keeping that oral posture, bring the tongue closer to the point of articulation so as generate frication. This is the difference between the voiced palatal approximate /j/ and voiced palatal fricative /ʝ/.

The fact that voiced palatal fricative /ʝ/ is so close to the voiced palatal approximate /j/ is the very reason we sometimes see misspellings such as ιγερου for ιεροῦ “of a temple” (Buth 2012), where the γ stands for the glide between the two vowels. The first such misspellings occur quite early in the 5cBC, and become more frequent by the 2cBC (Horrocks 2010). Such misspellings can occur only if the phenomenon of palatalization is generalized to all the velar consonants, γ, χ, κ behaving similarly.

And this is where Buth stops short of completing his system to be fully integrated linguistically and historically; if γ before front vowels is /j/, then the process of front-vowel palatalization had already necessarily happened for every velar consonant. Thus a pronunciation system where χαῖρε is pronounced /xe̞ɾe̞/ next to εὖ γε pronounced /e̞ν je̞/ makes little sense, and in this respect unfavorably resembles Erasmian since it is only a half-restored phonology.

For the palatalized version of χ /ç/, use the same trick for /j/, just make it voiceless:

χ /ç/ χερσίν, ἐχεις, χαϊρε, χοῖρος, ταχύ

This is the same sound as in German ich.

Palatalization also occurs for κ before front vowels.

κ /c/ κενός, κείμενος, καιρός, κοινή, κύνα
If you have practiced χ /ç/ and γ /ʝ/, then this κ /c/ is the same point of articulation, only it’s an occlusive (also called a stop or plosive), meaning that the tongue makes full contact with the palate, temporarily impeding the airflow.

The letter γ is also used for the velar and palatal nasal.

γκ /ηκ/ ἀγκαλος
/ηκ/ ἄνάγκη

γγ /ηγ/ ἀγγαρεία
/ηγ/ ἀγγελος

The same sound also occurs across words: τὸν γάμον, τὴν γένεσιν. Note that γ becomes the voiced palatal occlusive /ɟ/ before front vowels when preceded by another γ, another really cool sound that’s fun to say.

These velar-palatal consonants take some training to recite with proficiency, but they are virtually identical to their Modern Greek counterparts, and are used correctly by thousands of students of Modern Greek daily. Thus you can train yourself to produce them consistently by listening to Modern Greek.

These letters sound pretty much as expected:

τ /t/ τέτταρα (make sure not to aspirate initial τ)
π /p/ πάππος (make sure not to aspirate initial π)
λ /l/ λάλλαι (the /l/ sound is like RP English initial “bright l” at all times such as in “light,” as in Italian, Spanish, and Modern Greek, not as in American English.
μ /m/ μαμμία
ν /n/ νάννη
ρ /ρ̩/ ἀρά, ἔρρωσθο

Single ρ is an alveolar tap, ἀρά, while double ρρ is a trill, ἔρρωσθο, as in Italian and Spanish. I treat initial ρ, which is always given the aspiration mark (ῥ), as I do in Latin words borrowed from Greek with initial ρ, such as rhētor, and render them as the voiceless alveolar trill /r̩/, which is why it is perceived to have aspiration.

Double consonants are also geminated, meaning they last longer in duration than single consonants, as in Cypriot Greek.

Letters φ and β are fricatives, but not exactly as in modern Greek. In the Lucian Pronunciation these are bilabial fricatives /φ/, /β/, meaning they are made with the lips alone as opposed to the lips and teeth.
φ /φ/ φιλόσοφος
β /β/ βιβλία

For Standard Lucian, I recommend fricatives /ɣ/, /ð/, /β/ for γ, δ, β everywhere (as in Modern Greek) except after nasals, since Modern Greek words like ἀντρα /andra/ come from ancient ἀνδρα /andra/ which is pronounced the same, demonstrating that γ, δ, β resisted frication in this environment.

While Standard Lucian generalizes the fricative, it is entirely possible that these letters acted more like their equivalents in Modern Spanish for some speakers, rendered as approximates /ɣ/, /ð/, /β/ in most positions, but as the occlusives /g-//, /d/-, /b/- at the beginning of an utterance or after hiatus as well as after nasals. If you are a Spanish speaker and you are comfortable with this system, I regard it as a legitimate variant of Lucian Pronunciation.

Finally, we have the two false diphthongs; these consist of a vowel followed by a bilabial fricative. The bilabial fricative component is rounded, making this truly the intermediate point between the 5cBC Classical Attic αυ /aʊ/, ευ /eʊ/ and Modern Greek /av, af/, /ev, ef/.

αυ /aβʷ, aφʷ/ αὔριον, αὐτός
ευ /εβʷ, εφʷ/ Εὐγενίᾱ, εὖτροπος

Note that the voiceless versions occur before voiceless consonants.

These /aβʷ, aφʷ/ and /εβʷ, εφʷ/ sounds are very interesting to the ear. When spoken at normal speed, a word like αὐτός /aφʷτός/ in Lucian Pronunciation sounds at once like it could either be as old as 5cBC Classical Attic /aʊτός/, or as evolved at Modern Greek /afτός/. This has the effect of being recognisable and perfectly intelligible to users of any Ancient Greek pronunciation system. The letter combinations αυ and ευ are extremely common in Greek, so the recurrent enunciation of /aβʷ, aφʷ/ and /εβʷ, εφʷ/ in Lucian Pronunciation is a powerfully unifying force.

Here is how to reproduce them: make a voiceless bilabial fricative /aφ/, and then do it again while rounding your lips as in /u/ when you get to the fricative: /aφʷ/.

These sounds /aβʷ, aφʷ/ and /εβʷ, εφʷ/ have been determined to be the transitional stage between the older true diphthong and the modern version (Horrocks 2010), and if they persisted for a long time during the Koine period, it would explain a great many things. For instance, confusions in spellings between αυ and αβ, and ευ and εβ begin during the Roman Republic, yet Greek borrowings into Latin don’t seem to reflect anything other than a true diphthong until a great deal later in the Roman Empire. Assuming the false diphthong pronunciations /aβʷ, aφʷ/ and /εβʷ, εφʷ/ were general to the Greek speaking population, this would answer why the Latin speaking Romans could hear /aβʷ/ but perceive their native
diphthong /au/, yet native Greek speakers could confuse the false diphthongs /aβ̣w/, aϕ̣w/ and /eβ̣w/, eϕ̣w/ with the slightly simplified unrounded versions /aβ/, aϕ/ and /eβ/, eϕ/.

Indeed, the next step in the evolution of these digraphs is to pronounce them αυ /aβ/, αϕ/ and ευ /eβ, eϕ/. A yet more innovative variant is to pronounce them as in Buth Koine Pronunciation and Modern Greek: αυ /av, af/ and ευ /e̞v, e̞f/.

You may also choose from a more conservative step in the evolution: αυ /aw/ and ευ /e̞w/. These are different from diphthongs αυ /aʊ/, ευ /e̞ʊ/ in that the final glide /w/ is less distinct than the non-syllabic vowel ũ. And of course you might prefer to use an even more conservative variant that coincides with 5cBC Classical Attic αυ /au/, ευ /e̞u/.

Choosing A Variant

I support experimentation with the stated variants of Lucian Pronunciation, while adding the caveat that certain sounds evolved together, so mix heedlessly at your own peril! For example, the change of φ from aspirate /pʰ/ to voiceless labiodental fricative /f/ took place at the same time as β finally became voiced labiodental fricative /v/ and αυ and ευ became /av, af/ and /e̞v, e̞f/. This crucial stage in the evolution of Greek phonology is the reason why Erasmian, which restores conservative /b/ for β but retains Modern /f/ for φ, is an unacceptable rendition of any historical pronunciation.

So it’s perfectly fine to prefer /f/ for φ as in φιλόσοφος, but then you must also say αὐτός /afˈtɒs/, αὁριον /avˈrɪon/, εὐτροπος /ˈeftropoʊs/, εὐρίς /ˈevriːs/, and βάρβαρος /ˈvarvaroʊs/. But if you prefer to keep /b/ always for β and /aʊ/ for αυ and /e̞u/ for ευ, then you will have to learn how to use the aspirate /pʰ/ for φ, and consequently the other aspirates. My spreadsheet may guide you in these and other possibilities if you choose something other than Standard Lucian.

What I think is so useful about Lucian Pronunciation, and why I strongly recommend as the primary pronunciation for any general course in Ancient Greek whether oriented towards Classical Attic or Biblical Koine, is that once it is mastered, the speaker can easily modify it in a linguistically consistent manner to be progressively more conservative back towards matching 5cBC Classical Attic Pronunciation, or be stepped forward until it reaches Buth Koine Pronunciation or even more evolved pronunciations. Although Lucian Pronunciation is centered at one of the most studied periods of history, the Late Roman Republic and Early Roman Empire, its variants actually span the entire Ancient Greek language. I feel that Lucian Pronunciation could resolve many of the disputes that exist in the current fractured pedagogical landscape, and give us one pronunciation with pleasing variants for the one language of Ancient Greek, a tongue richly diverse in many beautiful dialects from Epic to Attic to Doric to Koine.
Pitch Accent

Ancient Greek lexical emphasis was marked by pitch accent (a variation in musical pitch, i.e. sound frequency) rather than stress accent (a variation in dynamic loudness, i.e. sound amplitude) (Allen 1968, Horrocks 2010). This changes gradually during the later Koine Period, but pitch accent survives in some form until as late as the 4cAD (Allen 1968). The obvious transition between these stages would be a range of time when pitch accent was reinforced by stress accent.

This is how I render Lucian Pronunciation, with combined dynamic stress plus musical pitch accent. Using stress to reinforce pitch, in addition to being an historically valid interpretation, has great pedagogical utility: few people who study Ancient Greek speak a language that uses pitch accent instead of stress accent, so it can be quite difficult to turn stress into a free intonational device, as it is in Japanese, rather than a lexical marker.

Those of you who are Japanese speakers, however, will be pleased to find that the preserved sheet music from antiquity (most of it from the Koine period, which is important to recall for those who might not believe pitch accent still existed in Koine Greek) shows an Ancient Greek pitch accent system coded into the very musical notes, demonstrating a prosody that compares quite favorable with the well-studied Japanese pitch accent system; to see examples of actual Ancient Greek sheet music displaying pitch accent I recommend this article.

So, how do you do pitch accent in Ancient Greek? Well, in addition to imitating my models of Lucian Pronunciation (linked below), I can give some simple guidelines. The key word is downstep. Unlike much more complex tonal languages like Chinese and Vietnamese, Japanese and Ancient Greek only have two pitches: high and low. The default pitch for any mora (the building block of a syllable) is high. Once a mora is marked with a high pitch accent, such as in λόγος, the mora that follows will have a low pitch.

And that’s it. As soon as the first syllable λό- is uttered, the next syllable -γος must have a perceptibly lower pitch.

Once you know that a pitch accent marks the high mora as the highest pitch in a word, and that the mora that follows shows the consequent fall in pitch, the work is done:

νόμος
ἔλεγον
θυγάτηρ

Note how in a word like θυγάτηρ the syllable prior to the accented one may be lower or just as high as the accented syllable:

θυγάτηρ
And that's how acute accents on short vowels work.

Circumflex accents are on long vowels, which contain two morae, such as in the word ὀ /ðː/ (or broken up moraically as /ðo/, the first mora high, the second low). The second half of the vowel shows the fall. So in words like θεῶ, the first syllable may be as high as the first mora of the accented vowel, or lower than it.

Acute accents on long vowels are the inversion of circumflexes, for example ὦν /ð:ːn/ (or moraically /oːn/), where the second mora of the vowel is the highest part of the word.

Grave accents only occur on final syllables prior to another word in the same phrase, and may be rendered as suppressed acutes, full acutes, or ignored completely; I use a combination of these options in my recitations.

Acute accents before many consonants can sound something like a circumflex, such as in ἀνθρώπος. Since ν is a voiced consonant, it is capable of carrying pitch, and so the two morae of the initial /án/ may give a contour reminiscent of a circumflex, which is a high pitch plus a low pitch on the same syllable. Something similar can be heard in ἀλλός.

Much more detail can be spent on dissecting the pitch accent system and its orthography, but I think this relatively simple explanation will be enough to get you started in the right direction. For other models to listen to, Ioannis Stratakis on his Podium-Arts YouTube channel demonstrates pitch accent very well, and usually supports it with stress accent like I do for Lucian Pronunciation.

Lexical pitch accent is also coinvolved with phrasal prosody or sentence intonation patterns. Ancient sheet music tends to show something much like a combination of Japanese and Modern Greek: there is often a downtrend, especially towards the end of a sentence, while before a pause within a sentence (such as at a comma), the phrase melody rises. For example, Καὶ ἄλλα πρόβατα ἔχω, ἃ ἦν ἔστιν ἐκ τῆς αὐλῆς ταύτης. (John 10.16). In the word before the comma, ἔχω, the ἔ- is higher than the first mora in the -χω, but the second mora in the -χω rises nearly as high or higher than the lexical pitch accent. And the final word ταύτης is quite low, but even here the pitch difference can be detected. The features of sentence prosody can seem to drown out or suppress lexical pitch accent, which is to be expected. (All this is modeled in the audio introduction of my Gospel of John audiobook.)

Another important feature is called terracing. The general downtrend of the melody is audible, yet the pitch accents are still there, forming little terraced steps as we go along. As the sentence proceeds, the height of the downsteps tend to become smaller and smaller, just as in Japanese. Terracing is a very important thing to practice in order to sound more natural when using pitch accent, as it is not recommended to jump between the same two pitches for every occurrence of a word accent when speaking.
This is the basic pitch accent and prosody model for any statement in Lucian Pronunciation. There are many possibilities though, and for these I recommend listening to lots of Modern Greek to improve your Ancient Greek pronunciation, and imitate it wherever applicable. Modern Greek happens to exhibit quite a bit of melodic variation that likely echoes the pitch accents of its ancient past, merely reassigned to mostly non-lexical emphasis. I also use the interrogative intonation patterns of Modern Greek as much as possible in my Lucian Pronunciation, such as Τίς εἶ σύ; This distinct final-word rising is rather pronounced in Modern Greek when there is a question word such as τί, τίς, πῶς, ποῦ, πότε, etc., and actually is similar to the interrogative intonation pattern of Japanese.

CONCLUSION

I hope this rather lengthy pronunciation guide has been interesting! You may of course elect to use completely different pronunciations from what I model, and I think that’s just fine. It’s definitely more important to study Latin and Ancient Greek in the first place, rather than become subsumed by phonological systems.

Nevertheless, based on the wonderful feedback I have received since my first recordings in Lucian Pronunciation were made public — most surprising and welcome of all perhaps were the glowing words from native speakers of Modern Greek, something I had hoped to achieve but had never expected in such high numbers — and for linguistic, aesthetic, historical, and pedagogical reasons, I feel that the promotion of Lucian Pronunciation will continue to unite the disparate groups of Ancient Greek speakers around the world. Lucian Pronunciation appears to have this mollifying effect even where just one person in a group uses it. Reports from these Lucian Pronunciation users, in addition to my own experience, confirm that Lucian Pronunciation is understandable to a wide group of people, and thus raises the mutual intelligibility of all members of a speaking group where many different pronunciation conventions are heard. This unforeseen unity is nothing short of remarkable.

χάριν σοι ἔχω! ἔρρωσθε.

OTHER RECORDINGS IN LUCIAN PRONUNCIATION

Ancient Greek in Action
(https://www.youtube.com/playlist?list=PLU1WuLg45SixsonRdfNNv-CPNq8xUwgam)
Kataskopos
(https://www.patreon.com/posts/42738514)
Athenaze
(https://www.patreon.com/posts/36186862)
REFERENCES

Publications


Wright, Roger, 1982, Late Latin & Early Romance, Francis Cairns.

Grammarians and other ancient authors

Other resources


The Lucian Pronunciation of Ancient Greek video: https://youtube.com/watch?v=Dt9z5Gvp3MM

The Lucian Pronunciation of Ancient Greek article: http://lukeranieri.com/lucianpronunciation

Latin & Greek Pronunciation Evolution 500 BC to 500 AD: https://youtube.com/watch?v=c_Giy_LHAIU

Video course on phonemic vowel length in Latin: https://youtube.com/playlist?list=PLQQL5leNgck0-tQ4AZgKFMIQCUd_VY_H

The Immortal Language, How Pronunciation Made Ideas Everlasting: https://youtube.com/watch?v=XeqTuPZv9as

Randall Buth talk: https://youtube.com/watch?v=VWOjBulEyrs


Iotacism, Wikipedia article: https://en.wikipedia.org/wiki/Iotacism

Seikilos epitaph, Wikipedia article: https://en.wikipedia.org/wiki/Seikilos_epitaph

Ancient Greek Pitch Accent, Wikipedia article: https://en.wikipedia.org/wiki/Ancient_Greek_pitch_accent
Pronunciation of Ancient Greek in Teaching, which exemplifies the painful inconsistency of Erasmian pronunciation around the world:
https://en.wikipedia.org/wiki/Pronunciation_of_Ancient_Greek_in_teaching

Occurrences of “Alexandrēa” in Roman Latin literature:
https://latin.packhum.org/search?q=alexandrea

Occurrences of “Alexandrīa” in Roman Latin literature:
https://latin.packhum.org/search?q=alexandria

Pronouncing & Translating the Divine Name (YHWH) by Andrew Case:
### Standard Lucian Pronunciation and Variants

The columns astride the central Standard Lucian do not necessarily represent a coherent system; see the above video and Ranieri’s Greek Pronunciation Chronology Spreadsheet for integrating conservative or innovative variants.

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<tr>
<th>Greek letter</th>
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Click on the above video to learn about how to pronounce Ancient Greek!
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