

## The Multilingual Signscape of Ankara: Reflections from a Linguistic Landscape Study

Oğulcan YAVUZ<sup>1</sup>, Eda BALAKBABALAR<sup>2</sup>, Gökçe SELEN<sup>3</sup>,  
Özgenaz MOROVA<sup>4</sup> & Melike ÜNAL GEZER<sup>5</sup>

<sup>1</sup> TED University, Ankara, TÜRKİYE  
[ogulcan.yavuz@tedu.edu.tr](mailto:ogulcan.yavuz@tedu.edu.tr)

ORCID: 0009-0009-0777-5478

<sup>2</sup> TED University, Ankara, TÜRKİYE  
[eda.balakbabalar@tedu.edu.tr](mailto:eda.balakbabalar@tedu.edu.tr)

ORCID: 0009-0008-7844-8768

<sup>3</sup> TED University, Ankara, TÜRKİYE  
[gokce.selen@tedu.edu.tr](mailto:gokce.selen@tedu.edu.tr)

ORCID: 0009-0006-3836-8013

<sup>4</sup> TED University, Ankara, TÜRKİYE  
[ozgenaz.morova@tedu.edu.tr](mailto:ozgenaz.morova@tedu.edu.tr)

ORCID: 0009-0000-0441-003X

<sup>5</sup> TED University, Ankara, TÜRKİYE  
[melike.gezer@tedu.edu.tr](mailto:melike.gezer@tedu.edu.tr)

ORCID: 0000-0002-1598-9611

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**Abstract:** Linguistic landscape studies (LLS) involve analyzing public signs in specific areas (e.g., streets, entire cities) to reveal the socio-cultural and sociolinguistic structures present. Turkey has been influenced by various cultures, particularly following the refugee influx starting in 2011 and recent internationalization efforts. Such social phenomenon's linguistic repercussions on multiculturalism, linguistic diversity, and vitality is an under-explored area. Therefore, this study explores the linguistic landscape of Turkey's capital, Ankara, to understand the extent of multilingualism in public spaces. Over a year, 1,291 signs were photographed across central areas of Ankara. Researchers were trained to ensure data collection, sorting, and analysis consistency. The study employed descriptive statistics with a quantitative approach to analyze language choice and prominence. Findings revealed that the linguistic landscape of Ankara was mainly Turkish monolingual and English-Turkish bilingual. The study's implications are mainly for language teacher educators, so they embed linguistically aware language teacher education models, and for language education policymakers, they incorporate authentic, multimodal, and multilingual LL to English as a foreign language education.

### Anahtar Sözcükler:

Dilbilimsel peyzaj  
Ticari levhalar  
Çokdillilik  
Dilbilimsel farkındalık

### Ankara'nın Çokdilli Levhaları: Bir Dilbilimsel Peyzaj Çalışmasından Yansımalar

**Özet:** Dilbilimsel peyzaj çalışmaları (DPC), belirli bölgelerdeki (caddeler, şehirler vb.) kamusal işaretlerin incelenmesi yoluyla mevcut sosyo-kültürel ve sosyodilbilimsel yapıları ortaya çıkarmayı amaçlar. Türkiye, özellikle 2011'den itibaren başlayan mülteci akını ve son dönemdeki uluslararasılaşma çabaları sonrasında çeşitli kültürlerden etkilenmiştir. Bu toplumsal olguların çokkültürlülük, dilsel çeşitlilik ve dil canlılığı üzerindeki dilsel yansımaları henüz yeterince araştırılmamıştır. Bu nedenle, bu çalışma Türkiye'nin başkenti Ankara'nın dilsel peyzajını inceleyerek kamusal alanlardaki çok dilliliğin boyutlarını anlamayı amaçlamaktadır. Bir yıl boyunca Ankara'nın merkezi bölgelerinde 1.291 işaret fotoğraflanmıştır. Verilerin toplanması, sıralanması ve analizinin tutarlılığını sağlamak için araştırmacılara eğitim verilmiştir. Çalışmada dil tercihi ve baskınlığını analiz etmek için nicel bir yaklaşımla tanımlayıcı istatistikler kullanılmıştır. Bulgular, Ankara'nın dilsel peyzajının ağırlıklı olarak Türkçe tek dilli ve İngilizce-Türkçe iki dilli olduğunu ortaya koymuştur. Çalışmanın bulguları, özellikle dil öğretmeni eğitimcileri için, dilsel farkındalığı olan dil öğretmeni eğitim modellerini dahil etmeleri ve dil eğitimi politika yapımcıları için, özgün, çok modlu ve çok dilli dilsel peyzajı yabancı dil olarak İngilizce eğitimine entegre etmeleri açısından önem taşımaktadır.

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## 1. Introduction

Ari (2005) laid out the synchronic and diachronic changes the word underwent in the etymological analysis of the term landscape. While in the beginning, it simply meant the view of terrain, over the years, the meaning started to have cultural associations with the view, and this perspective has been validated by Cosgrove (2017). Linguistic landscape can be defined as “the visibility and salience of languages on public and commercial signs in a given territory or region” (Landry & Bourhis, 1997). It displays languages in public spaces, including signs, billboards, advertisements, and graffiti. As Wardhaugh and Fuller (2015) put it, linguistic landscapes are not straightforward reflections of the official use of the languages or indicators for inter-language relationships. Instead, they are evidence unearthing the underlying mechanisms for the linguistic codes and their users (Hélot *et al.*, 2012) as they reflect the perceived values (Stroud & Mpendukana, 2009). In metropolitan and urban contexts, linguistic landscapes are like a colorful mosaic with multiple languages as posting notifications present. In those contexts, the dominant language would be the officially accepted one, and depending on the statuses of other varieties, they can be incorporated into official signs as well. In Singapore, for instance, the governmental signs are written in Malay, Tamil, Chinese, and English; they are official varieties in this context. In officially monolingual contexts, such as Turkey, where Turkish is present, other varieties, such as English, are pervasive. Using those languages in signage reveals some untold patterns of linguistic vitality steered by domestic and international policy and planning, migration, and many other sociolinguistic variables.

Users often come across signs in metros or bus stations where instructions for the passengers are provided for emergencies, or street signs can provide information in more than one language, considering the diverse linguistic backgrounds of the users. The spread of languages across business signs is quite interesting to study, and Turkey is a unique spot on the world map due to its centuries-long linguistic diversity and cultural heritage. Over the years, Turkey has been the focal point of various researchers and their studies focusing on various linguistic landscapes and languages that are both ancient, such as Assyrian (Arikan *et al.*, 2017) and contemporary age (Sofu, 2009), and even across media platforms (Sarioğlu, 2019). Turkey is literally the cradle of civilizations and their languages, cultures, and religions. People from various religious and linguistic backgrounds live in harmony in various regions of Turkey. In addition to Turkish, other varieties, such as Kurdish and Arabic, are commonly spoken in certain geographic regions of Turkey. In Antakya, Arabic is a high-saliency variety, and there is a handful group of Arabic-speaking Orthodox Christian communities in Antakya, the southernmost city of Turkey with its border with Syria. Köse, Arikan, and Saraç (2017) investigated the diachronic change in this community’s linguistic choices over the generations. Köse *et al.* (2017) found an inter-generational decline in using Arabic for literacy practices in their study examining Arabic for literacy practices. The language choices made are confirmatory points on the saliency of those languages, and it became apparent that Arabic, in this linguistically and culturally unique setting, had not been maintained by younger generations. Such linguistic choices interlocutors make can also unfold as favoring one language over the other across landscapes.

Turkish used by the European diaspora and revealed through the linguistic landscapes of European settling has been studied (Wardhaugh & Fuller, 2015). The researchers examined the Turkish-German shop signs prevailing in Berlin and reported that they had found Turkish use in the business, and shop signs were mainly used to advertise special products to Turkish culture referencing a specific culture and cuisine. In other words, the bilingual

signs in Turkish and German were not intended for Turkish-speaking customer clientele but rather to mark the landscape as a Turkish and local variety blended zone (Wardhaugh & Fuller, 2015). This makes the zone special, differentiating it from other locally available varieties.

Linguistic landscapes can be conceptualized as marking the boundaries of linguistic territories by regulating language use on public signs, including billboards, street signs, commercial signs, and in-place names (Landry & Bourhis, 1997). The rationale of the linguistic landscape studies came from the founding fathers claiming that,

Using the theoretical framework of ethnolinguistic vitality, it was hypothesized that the experience of the linguistic landscape by members of a language group may contribute to social psychological aspects of bilingual development.” (Landry & Bourhis, 1997, p. 23).

Linguistic landscape studies have been done in many countries in the world for a plethora of reasons. The earliest example by Backhaus (2006) examined Tokyo’s linguistic landscape massively to understand the nature of language distribution across governmental and non-governmental signboards, finding out about 80 to 20 per cent Japanese monolingual and approximately 20 per cent multilingual signs existing in over 11,000 signs. The study of capital cities has been the locus of LL studies. Gorter (2007) examined the ancient city of Rome for the use of languages in signscape. In a context where 97% of the residents were reported to be Italian native speakers and with only 29% of the population as English literate, the pervasiveness of English with a quarter of all the signs collected in certain parts of the city was intriguing. Further classification of Rome’s signscape revealed that top-down-governmental signs are rarely configured in English. Bottom-up signs, on the other hand, were mainly in English. This reflected a private initiative to bring English into the linguistic landscape of Rome. The use of English proved that it was used for broader communication or lingua franca in touristy spots of Rome. Besides this plenary example of linguistic landscape, successive studies were also conducted in Turkey (Çetinkaya, 2020; İnal et al., 2020).

Contrary to the common belief that Turkey is a monolingual country, Turkey is worth further examination from the sociolinguistics perspective to understand the presence of languages and their interaction. Turkey is a Turkish *de jure* monolingual country, but it is diverse and has many languages (Ünal Gezer & Dixon, 2021). English is pervasive across developing nations, including Turkey, where EFL education is as low as Grade 2 among young language learners (Ünal Gezer, 2022). The inevitable role of English as a lingua franca in multilingual and multicultural contexts intrigues researchers from various disciplines, such as sociology, linguistics, and language education. Turkey’s linguistic, ethnic, and cultural diversity has been extensively dealt with to set the stage for LLS (İnal et al., 2020). Over the past few decades, Turkey has been receiving immigrants from Syria, Iraq, Afghanistan, and Somalia. People originating from these countries speak varieties of Arabic and Kurdish. Additionally, due to the war between Russia and Ukraine, Turkey has received a significant number of Ukrainians fleeing from the war zone conditions. Such linguistic diversity, on top of the undisputable position of English, sets an intriguing context to explore.

If we apply the formal language, Turkish, to all contexts, including signs, we would only see signs in Turkish. However, it is already visible that a combination of languages is used in governmental and non-governmental buildings. Solmaz and Przymus (2021) introduced a linguistic landscape study via virtual exchange to introduce LL in language instruction. Their collaborative work demonstrated samples of linguistic landscapes from Turkey and the USA

and provided samples of pedagogical tools for linguistically-aware lessons in English language education as the instructional outputs of tele-collaborative effort. İnal *et al.* (2020) examined İstanbul's Taksim Square in Beyoğlu to examine multilingualism in İstanbul's linguistic landscape, and they reported multilingual code-switching and translanguaging across signs of Taksim. Çetinkaya (2020) studied Ankara's commercial signscape and found mainly Turkish and English monolingualism pervading commercial signs. The linguistic landscape of a city is meant to be logically arranged, revealing power relations among dominant and subordinate language groups, as it is the exhibition of contemporary language ideologies and, on occasion, the linguistic vitality of the present languages (Gorter, 2006). For this reason, we wish to delve into the linguistic landscape of Ankara for multilingualism and expand the literature about the linguistic structure of Turkey by examining Ankara as a case. The main research question and the sub-questions included:

1. How was multilingualism revealed through the signs of Ankara?
  1. a. Where were the signs sampled out in Ankara? What was the sign distribution like?
  1. b. What was the count of linguistic modality appearing in the sampled signs?

## 2. Method

### 2.1. Research Design

Linguistic landscape studies are based on collecting samples of signs in some geographical regions, and oftentimes, the researchers struggle to choose the most suitable area to focus on, and the dilemma is to choose one based on the most valid reasons (Hult, 2014). The research site for the present study is the capital city of Turkey, Ankara, with the following districts: Çankaya (Kızılay / Kurtuluş / Kolej / Birlik / Tunalı, Akyurt, Mamak, Altındağ, Keçiören, Pursaklar, Etimesgut and Eryaman. In these districts, the focus was mainly on the public signs, mainly shop signs. As for the significance of this site, Ankara has become the hub of peoples of various linguistic, ethnic, and racial backgrounds as it is the capital city symbolizing bureaucracy, military, and higher education in Turkey. Ankara is more diverse than ever, and to understand the diversity and multiculturalism in Ankara, the present study took place extensively in the districts of Ankara.

Gorter and Cenoz (2023) discussed numerous data collection methods, one of which is called the public transport axis method, with a circumference of prominent traffic lines crossing the city. This method includes major, populous streets and neighborhoods in the dataset. Data collection took place over ten months, and multiple researchers who were trained to collect samples of LL data took part in it. In the data collection processes, researchers used the same data collection tool, pooled all of the LL samples into the same platform, and tagged the sampled LLs according to the research questions. To ensure inter-coder reliability, this coding procedure was conducted with the active involvement of paired researchers who coded and recoded to ensure consistency across coding (Fraenkel *et al.*, 2012). The inter-coder reliability on the coding of LL signs was ensured as the sampled linguistic signs were consistently coded by two coders who agreed on their separate evaluations to a certain extent.

### 2.2. Sampling

The sample of this study consisted of photographs of the linguistic landscape of Ankara which were governmental, local, official, semi-official, or non-official signs, posts, notifications accessible publicly on the streets, shops, bus or metro stations, hospitals, cafes, restaurants, and many other places. The total number of these signs was 1291 for the present

study. The inclusion criteria were a) to be a public sign, b) to appear in one of the targeted districts of Ankara, or in other words, to be located in one of the arteries of the capital city.

### 2.3. Data Collection

Data collection took place in numerous districts of Ankara. Following the training they received for data collection and analysis, a team of researchers started collecting photos of the street, shop, warning, commercial and non-commercial notifications, bulletin boards, signs of warning, and announcements. The data comprised photos of such post notifications that the team members photographed using non-professional cameras. These photos were collected in various neighborhoods and districts of Ankara. At times, a single researcher took photographs of the linguistic landscapes; at other times, two researchers jointly visited a site and took photographs. In their training, they were instructed that a linguistic landscape could be one single sign or multiple signs based on the researcher's position and how the linguistic varieties dispersed across the landscape. This has to do with the unit of analysis, and this is a blurred part of LLS, as Gorter (2018) discussed before. A unit could hold one single sign (e.g., a street sign within minimal proximity) or multiple signs (e.g., various signs over the silhouette of a building). In the present study, even in a compiled signscape, each sign was evaluated separately. The researchers were asked to photograph every sign they came across as they passed through the district throughout their visit. Researchers systematically scanned the city map to determine the data collection sites and made a linguistic landscape tour plan to photograph the landscapes (e.g., Team Member 1, Day 2, Ulus). Impromptu or unplanned data collection was included if the researcher unintentionally ended up in a zone and if the researcher got tempted to take photos within those zones. Once the data collection phase was over, the researcher returned to the computer where the data was stored. They sorted out the photos of the signs, deleted the unclear ones, and archived the sign photos on a digital archive platform called Google Photos with the date of data collection, the information of the researcher in charge, and the location of the data collection site information included. This procedure was called tagging. Including all of these stages, data collection took ten months in total.

### 2.4. Data Analysis

The sample of the present study comprised 1291 business and shop signs, which are analyzed based on the count of districts where signs were sampled, the count of the linguistic modality of languages in signs in each district, the language distribution in signs in each district, the language(s) of prominence in signs in each district, the type and size of font of languages in signs, the amount of information provided in either language in bilingual signs, and the translation of texts in signs. Further information on these criteria is provided below. Before data analysis, analysis training was given to coders, and inter-coding reliability was ensured using the code-recode technique.

#### 2.4.1. Data Analysis Schema

As Ankara is one of the major cities of Turkey, not all of the districts were included. A total of 25 districts were involved in the data collection processes. Some of them were Altındağ, Çankaya municipality with Söğütözü, Bahçelievler, Beysukent, Bilkent, Demirtepe, Dikimevi, Kolej, Emek, Kızılay, ODTÜ, Hacettepe, Mamak, Tunalı and other municipalities including Etimesgut, Yenimahalle. These districts were chosen randomly. For linguistic modality, the count of the languages on each sign provided linguistic modality, and the categories for this were monolingual, bilingual, and multilingual signs. If the sign presented

one language only, it was coded as a monolingual one; if it included two languages, it was coded as a bilingual sign; and if it embodied more than two languages, it was a multilingual sign. Language distribution denotes all the languages observed on the signs that were enlisted.

A sign can include many languages or one language only. Linguistic prominence can be defined as the visibility of the languages on the signs. The prominent language on each sign is the most highlighted and visible language to the eye of the person. Closely associated with linguistic prominence are the type and size of the font, which is the following code for analysis, which can be regarded as indicators of prominence as the font size is bigger or bolder than the others, which signals linguistic prominence on a sign. Different fonts can be chosen on a sign to bring a language to the fore or keep certain pieces of information in the background. If the font size and type are all the same across one sign, it is coded as the same, and if there is any difference, it is coded as different. Signs carry much information all at the same time. The amount of information is about the nature of information provided by a sign. A sign with multiple languages can provide the shop title in one language and further explanation or slogan in another. If more information is provided through the first language, it suggests this language is a more prominent linguistic choice on that specific sign. Finally, although minimally, we looked into whether there was any translanguaging, code-switching, or translation from one language to the other. The translation coding category examined whether the signs included any translation and whether the translation was in complete form or only partial. If no translation was involved, the sign was coded as zero translation.

### 3. Findings

The present study's findings were based on the research questions. The first research question was about the districts of Ankara where data collection took place. Figure 1 lays out the districts researchers collected sign samples. The distribution of the linguistic landscape, which includes business signs, mainly shows that the majority of the sampled signs come from Çankaya district. This is aligned with the district-based distribution of institutional dwellings and the presence of metro and bus lines as Çankaya is the home of Kızılay, the heart of the city, and its accessibility via metro and bus lines makes access to the site feasible. Çankaya is the district where higher education institutions, hospitals, and businesses are located, and it is a rich hub of linguistic diversity with racially and ethnically diverse dwellers. Approximately forty per cent of the sampled linguistic landscape in the present study came from other districts such as Etimesgut, Keçiören, Altındağ, and others. Figure 1 provides further information on the breakdown of the linguistic landscape signs originating from different vicinities of the major districts of Ankara.

The second research question focused on linguistic modality across the sampled signs. Figure 2 reveals linguistic distribution across districts of Ankara. The business signs in the sample are primarily monolingual. Pursaklar region is an exemption to this trend with the presence of an airport where signs are mostly bilingual. Bilingualism is the following pervasive pattern observed in the sampled data set of business signs across Ankara. In all districts, except for Yenimahalle, bilingual sign mode is the second most common pattern in the sample. The least common linguistic modality observed within the dataset is multilingualism, where three or more languages were used for business and shop signs. In three districts, multilingual signs did not exist, and in the next three, the percentage of multilingual signs was quite low. Yenimahalle, which mainly included Beştepe was the only unique district where multilingualism levels were significantly high.

The study comprised further information to describe linguistic modality with the information on linguistic choices of the business signs. When the languages distributed across the sampled linguistic landscape are considered, the most pervasive language across signs was found to be Turkish only, followed by English and Turkish bilingual modality. English only or other linguistic varieties on the shop and other signs was the least common modality, as Figure 3 demonstrates.

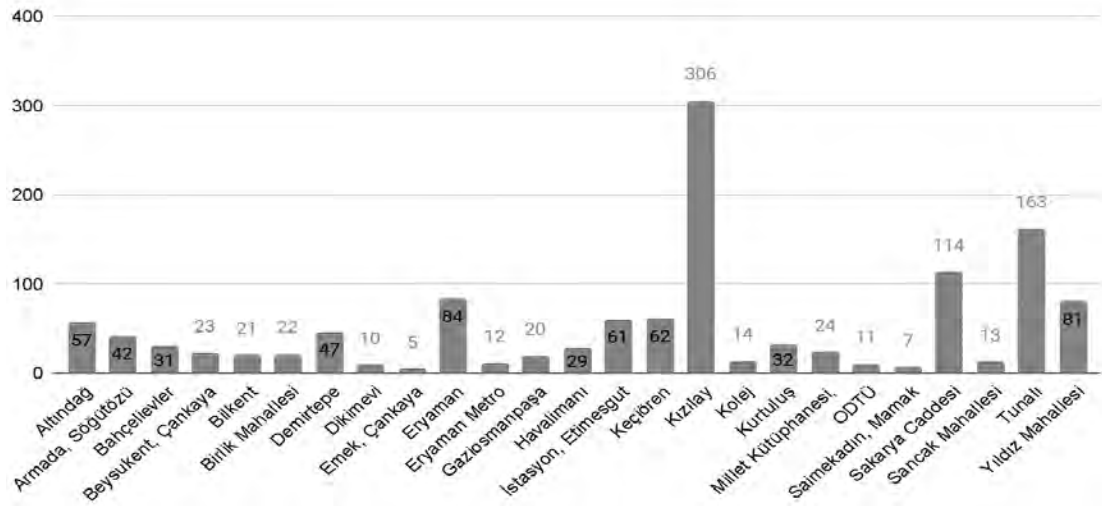


Figure 1. Breakdown of the Linguistic Landscape in Ankara

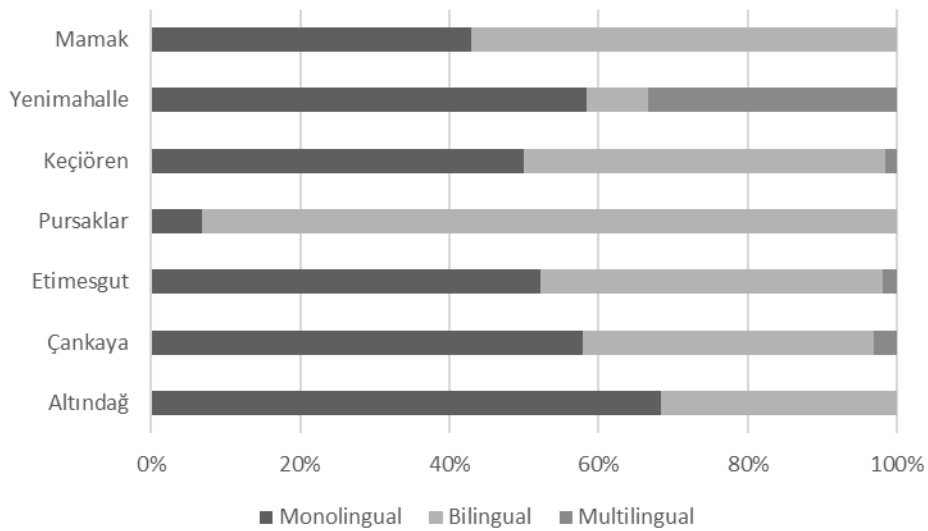


Figure 2. Linguistic Modality of Linguistic Landscape across Districts of Ankara

In the next round of analysis, the research team looked into the prominence of linguistic distribution on the bilingual signs within the sample. The descriptive statistics revealed that Turkish was more prominent in 137 Turkish-English bilingual signs, English was more prominent in 211 signs, and finally, both languages were equally prominent in 46 signs. Overall, using English alphabetic characters, Anglicization of some of the originally Turkish terms, and other processes such as using a larger font size, a different font, or using bold text were utilized to keep English variety in the center of attention.

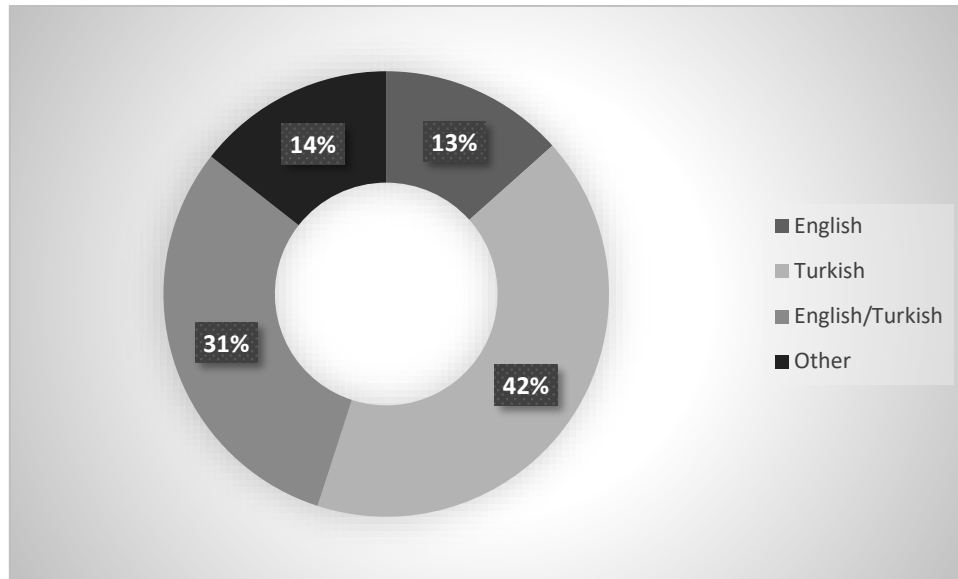


Figure 3. Linguistic Choices in the Linguistic Landscapes

Image 1 displays an English monolingual sign compared to Image 2, a Turkish-English bilingual sign. In Image 2, the place name is Turkish, and the rest of the information, such as the product sold and the date of this establishment, was given in English. In the sampled shop signs displayed in the appendix section, one sign used possessives attached to a Turkish word *tabak* (meaning plate in English- see Image 3), an Anglicization process to keep the sign interesting. In Image 4, the equivalent translation of the term can be seen while the Turkish variety is in the fore and the English one is in the back with the font size choice. This sign is an example of linguistic prominence where the Turkish variety became more prominent than English. Ampersand is visible in the sixth image, which originally did not exist in Turkish writing conventions. The fifth image is an example of the Anglicization of the Turkish word *cep* (meaning pocket in English), which received the second final consonant to move the word's origin from Turkish and make it more of an English-like term. Across the sampled signscape for the present study, there were cases where languages were mixed and matched creatively to keep the signscape of shops, cafes, and restaurants intriguing.

Following these analyses, the overarching question 'How was multilingualism revealed through the signs of Ankara?' was revisited. The potential answer to this question was that Turkey was on its way to becoming a multilingual nation, as the public signs revealed. It was visible that the more the vicinity became a popular and touristic site, the more visible it became that the signs were linguistically diverse. This is to attract many more tourists or diverse language-speaker populations, especially on the arteries of the main districts. The shops such as cafes and restaurants that appeal to the younger generation's needs were found to be more creative with the mix-and-match of the languages as such shop signs revealed. Furthermore, Turkish signs were mainly monolingual. Of those who are bilingual, the most pervasive linguistic distribution was the Turkish-English bilingual mode. In those signs, the language combination varies with the levels of language saliency, as sometimes English is in the center, and in others, Turkish is the highlighted variety with the font choice (i.e., bold, different characters) and other graphic designs. The districts crowded with speakers of different languages are more multilingual, and the businesses appealing to the needs of younger generations are more linguistically diverse than the smaller neighborhoods where



primarily locals reside. The business signs are mainly Turkish monolingual or Turkish-English bilingual in those contexts.

#### 4. Discussion

The use of English in commercial signs is often not to transmit factual information but English has its connotation value (Piller, 2003). The connotations of English are internationalization, success, sophistication and fun (Gorter, 2007), which the present study validates. The present study findings yielded two discussion points that can be further expanded with the contributions of the present study. One of them is that regardless of which language is the highlight in a context, the pervasive pattern across signscapes is multimodality. The second is a further expansion of the present study over to instructional practices such as language and teacher education.

##### 4.1. Multimodalities in Linguistic Landscapes

In Kachru's expanding circle (1985), Turkey is an underexplored context for sociolinguistic studies, especially linguistic landscape studies, a trending research scope in the country. In their analysis of the linguistic landscape in İstanbul, İnal *et al.* (2020) concluded that multilingualism has become increasingly visible via instrumental uses of English prevalent in the linguistic landscape. Especially following immigration, the use of languages brought along a colorful mix of languages, modalities, and scripts were reported. In such multilingual patterns, code-switching and translanguaging patterns were observed (İnal *et al.*, 2020). Similarly, in the present study, the patterns of creative play with the languages were visible in many cases. The language choice, reflected by the linguistic landscapes surrounding the users of languages, can be regarded as the echoes of their language preferences.

Despite its citizens' pluralistic abilities, Turkey has been monolingual due to the official status of Turkish (Ünal Gezer & Dixon, 2021). In educational contexts, from K-12 to higher education, English has been endorsed as the primary foreign language. The probing question for the present study was what other languages have been preferred in other official and semi-official domains of Turkey. For the analysis part of our paper, we used what Cenoz & Gorter (2006) used in their paper entitled *Linguistic Landscape and Minority Languages* during the analysis part with some modifications. As they analyzed the size of languages on bi/multilingual signs, their scales included "all the same," "majority bigger," "minority bigger," "majority + minority bigger," and "majority + foreign bigger." The scales required modifications because the scope of our study surpasses minority languages used in signs. We mostly found English and Turkish signs in Ankara; for this reason, our scales were "English bigger," "Turkish bigger," and "same size of font for both languages." The second and final modification was on the amount of information given in bi/multilingual signs. The scales for this analysis procedure in Cenoz & Gorter's (2006) study were "same all languages," "minority more," "majority more," "majority + minority more," "foreign more," and "ambiguous." Our study included the categories such as "English more," "same both languages," and "Turkish more." The reasons for such modifications include their scope being minority languages, our scope being the overall LL of a city, and the fact that there were primarily English and Turkish signs in the city analyzed. We have enhanced the implementation of LLS in Turkey and around the world by moderating the coding scheme according to the needs of a specific context.

There are a few studies conducted in Turkey about LLS. Some of them are conducted to find the LL structure of İstanbul (İnal *et al.*, 2020), concluding that İstanbul mostly has Turkish, English, and Arabic signs, similar to the present study findings. The investigation

of Ankara's LL with the present study and the interpretation of İstanbul's multilingualism by İnal *et al.*'s (2020) study summarizes that Turkish is the most common language in the two very big cities of Turkey. This is because Turkish is the official language of the Republic of Turkey. The present study did not systematically code the sampled signs for translanguaging or code-switching. İnal *et al.*'s study (2020) coded the signs of translanguaging on signs. Although some signs within the present study sample were clearly translanguaging and code-switching, the research team did not add translanguaging practices that Ankara's signscape reflects to the analyses.

Another considerable LLS, which was conducted in Ankara, with a more limited scope than our study, belongs to Çetinkaya (2020), including signs from Mamak, Çankaya, and Altındağ only. The author found out that 71.5% of the signs in Ankara were Turkish monolingual, signifying the monolingual structure of Ankara. He further found that Mamak and Altındağ districts have more monolingual signs than Çankaya, which the present study confirms with supporting findings. This is explained by the sociologic adaptations the residents of the districts have adopted as the resident profiles socio-economically and demographically differ from the residents of Mamak or Altındağ in Ankara. Çetinkaya (2020) states that many Syrian and Iraqi refugees reside in Mamak and Altındağ, increasing the number of Arabic signs in the vicinities. Our research also supports the high number of Arabic signs in the mentioned districts. Collected samples from Altındağ and nearby neighborhoods were limited in the present study; therefore, they comprised a small percentage of the overall data. All in all, the present research, with its findings, not only supported the existing literature but also expanded the scope of linguistic landscape research with a broader scope of analysis. Regardless of the city and the district to focus on, the signs were mainly multimodal, with a combination of languages or combined use of illustrations and written input.

#### **4.2. Linguistic Landscape Studies and Teacher Education**

Studying linguistic landscapes from the linguist or sociolinguist perspectives is one aspect of LLS. Theoretically, linguistics finds its applied zone by carving out the instructional pedagogical implications and using LL to increase education quality and raise next-generation English teachers who are linguistically aware. Although the present study has no such instructional effort, the trending research has demonstrated the emerging endeavor across researchers that LLS has a role in English education. As an integral part of sociolinguistic studies, LLS has implications not only for linguistics but also for language education and pedagogy, as the signscape is a linguistically and culturally-loaded platform that can be used as authentic and naturalistic linguistic input for teachers and learners. In a recent study, Solmaz (2023) regarded LLS as an instructional tool and studied the impacts of LL tasks on EFL pre-service teachers' understanding of English in local and global contexts. The study found an improved English as a lingua franca and Global Englishes knowledge and awareness among participating teacher candidates. In their study of multilingualism across signs of İstanbul, İnal *et al.* (2020) also directed their attention to instructional implications of LL for teacher education programs, and they proposed that World Englishes and English-as-a-Lingua-Franca-aware English language teacher training with the plurilingual view of English and sociolinguistic processes would be the key to a comprehensive training program and well-rehearsed language teacher development.

Globalization, as İnal *et al.* (2020) put it, is the driving force behind the global status of English. English as an international language (EIL) or as a lingua franca (ELF) could be used in opposition to English as a foreign language pedagogy, which is the discussion that LLS

facilitated. In this context, multilingualism is not the addition of languages but the interplay of different variables that are configured in many complex ways. Directing in-service and pre-service teachers' awareness of such interplay is an interdisciplinary and contemporary approach to teacher education.

## 5. Conclusion

The present study is an extensive examination of the linguistic landscape of Ankara, and it contributes to the literature with a massive dataset revealing the language choices made on the signs of Ankara—the contributions of the present study to the field in two ways. First, the topical contribution of the study is an extensive examination of the landscape in major districts of Ankara. Following Çetinkaya's study (2020), the present study further expanded the zone of analysis as it included many more districts of Ankara. Second, methodologically speaking, the present study systematically followed the analysis scheme that focused on crucial sociolinguistic factors such as language prominence and multimodal linguistic choices. The linguistic analyses of the landscape of Ankara revealed the linguistic choices as mainly Turkish monolingual and Turkish-English bilingual modes. The language combinations on the signs were more and less dominant depending on the district of Ankara, its people, and ethnolinguistic diversity. All in all, the linguistic choices are the reflections of the inhabitants and are not isolated from society and the people.

## 6. Limitations

It would be safe to claim that the present study has room for further improvement. Not all regions were included; those unexplored districts may be explored more for future studies. The regions highly populated by residents with temporary residency in Turkey are especially worth examining. In the present study, those regions that were visited were not equal data providers. In some regions, the sample size was significantly smaller due to the number of visits and accessibility problems. This might have distorted the data set and thus impacted the interpretation of the linguistic spread. In its present form, the project mainly offered analyses with descriptive statistics. Malinowski explained this in his speech (2020) as the first version of linguistic landscape studies. In its current form, though, the study of linguistic landscapes is more advanced, related to policy-making, (multi)linguistic rights advocacy, or instructional dimensions such as linguistically-aware teacher education. We also would like to acknowledge that we did not focus on the translanguaging of signs as we mainly analyzed the signs based on *a priori* categories quantitatively without a much-needed qualitative approach to data analyses. These can shed light on the future of LLS and inspire upcoming studies.

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## Note on Ethical Issues

The authors confirm that ethical approval is obtained from TED University (Approval Date: 28 04/2021).

## Conflict of Interest

The authors do not have any conflict of interest in the present study.

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Appendix.



Image 1. English-only sign (English monolingual)



Image 4. Turkish-English equivalent sign



Image 2. A Turkish-English bilingual sign



Image 5. Original Turkish word Anglicized



Image 3. Turkish word receiving apostrophe 's



Image 6. A sample of signscape with degrees of linguistic prominence