The Linguistics of Name Translation: Preferred Personal and Business Names in English, Korean, and Chinese

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This research examines personal and business names and their translations among typologically contrastive languages: English, Korean, and Chinese. A linguistic framework is proposed that predicts and tests whether and how ideal translations will be based on sound or meaning, as defined by the phonetic or semantic features of the given orthography. Two separate surveys (online in the US and onsite in Korea) were taken about preferred translations of names from and to the three languages. The linguistic prediction was borne out by the survey results: sound translation is preferred from and to English, meaning translation from and to Chinese, and preference is mixed from and to Korean. An additional finding was that translation preference was sound-based for personal names but meaning-based for business names. The full list of 118 original names and 302 translation choices in the three languages investigated in this study is provided in the appendix.

KEYWORDS personal names, business names, sound-based translation, meaning-based translation, English, Korean, Chinese

Introduction

There has been considerable discussion of preferred translation patterns of translingual business names with different orthographies, such as English, Chinese, and Korean. However, findings have varied as to what determines the chosen patterns. Researchers investigating business names are divided over what is more significant: is it a preference for sound- or meaning-based translation (Schmitt and Zhang 2012; Awan and Chiang 2014; Chao and Lin 2017). *Sound-based translation* refers to the selection of spellings in the target language that

corresponds as much as possible to the sound of the original name; and *meaning-based translation* aims at replicating the original meaning of the *source language*. Bilingual brand naming where both foreign and local brand names are used without translation is considered ineffective as it may generate a poorer perception of a brand's image and value than a foreign brand name. This result was found in a Chinese context (Kim et al. 2019).

The lack of consistency in preferred translations of business names may be attributable to the limited domain tackled by the studies (e.g. one survey conducted in one country, uni-directionally examining translation from an original to a target language) or the limited range of names and translations considered (e.g. business or personal, but not both). In addition, the categories of name translations may vary considerably from sound-based to meaning-based/meaning-suggestive (e.g. of brand features) to phono-semantic. While translation studies on business names are inconsistent, studies on personal names are scarce. No study to our knowledge has dealt with the translation of personal names of Korean or Chinese people other than a few studies of Anglicized nicknames (Heffernan 2010; Chen 2015).

We performed a study to extend this limited research scope. Our specific goal was not only to examine the relationships between translations of both personal and business names across three typologically contrastive languages. It was also to investigate the bi-directional relationship between the original and target languages. We used two types of survey, online and onsite, to test a large cohort of US and Korean men and women.

The three languages we investigated were the following: 1.) English, an Indo-European language using a phonemic alphabet; 2.) Korean, viewed variously as an Altaic language, a language isolate, or the main representative of a small Koreanic family utilizing either syllabic representation with the alphabetic principle or an "alphabetic syllabary" (Taylor and Taylor 2014, p.180); and 3.) Chinese, a Sino-Tibetan language that uses a logographic syllabary where syllabic characters represent meaning units. Due to this three-way contrast in linguistic typology, pronunciation similarities across these three languages are low. Chinese uses tones in its phonology, English relies on stress, and Korean employs neither. Yet, together, these three languages are useful for a name translation study because most English letters can be converted to Korean letters based on the sounds. At the same time, most Chinese characters and their associated meanings can be converted to Korean syllables. In fact, most personal names and many business names in Korean are based on transliterated Chinese characters in order to transmit the associated meanings. For example, the Korean business names *Samsung* and *Hyundai* are transliterations of the Chinese characters 三星 [sānxīng] 'three stars' and 现代 [xiàndài] 'modern,' respectively. The use of three different orthographies means that the need for name transl(iter)ations among these three languages is great. This need is heightened by the mandate to use local orthography to officially register personal and business names in (South) Korea, China, and the US.

The extended scope of our investigation yielded a wide range of name translations, with 24 possible types: 2 linguistic types (sound- and meaning-based

translations) × 2 directions (from and to each language) × 2 name types or purposes (personal and business names) × 3 (the three typologically contrastive languages: Korean, English, and Chinese). Linguistic findings yielded from this study may therefore have increased potential validity as compared to previous studies (e.g. Schmitt and Zhang 2012) with only 4 possible types of translations: 2 linguistic types (sound- and meaning-based translations) × 1 direction (from one language to another) × 1 purpose (business names) × 2 (two typologically different languages, such as English and Chinese). Using extensive, balanced data, this research examines why and how the names are translated and proposes a novel linguistic framework that predicts translation preferences for the three typologically contrastive languages of Chinese, Korean, and English.

Hypotheses and predictions

From the linguistic contrasts investigated between the three languages, we made several linguistically dependent and functionally dependent hypotheses:

(1) Linguistically dependent hypotheses

- H_1: Name translations from and to the Chinese language will predominantly be meaning-based.
- H_2: Name translations from and to the English language will predominantly be sound-based.
- H_3: Name translations to the Korean language will predominantly be sound-based if the source language of the original name was English but meaning-based if the source language was Chinese.

The first two hypotheses, H_1 and H_2, are based on the facts that daily representations of written names in Chinese orthography convey meaning, while names in English orthography convey sound. The third hypothesis, H_3, is based on the fact that Korean orthography is an alphabetic syllabary. Therefore, most English letters can be converted to Korean letters based on the sounds, while most Chinese characters can be converted to Korean syllables. If these three hypotheses are correct, then it is further hypothesized that the translation pattern would look like (a), not (b), in Figure 1.

The diagonal line in Figure 1 (a) conforms to our hypotheses H_1–H_3 in (1), in that name translations are predicted to be based on sound (top triangle) when the origin or target language is English but on meaning (bottom triangle) in the case of Chinese. It is hypothesized that both sound- and meaning-based strategies will be exhibited for name translations into the Korean language. In contrast, Figure 1 (b) demonstrates a diagonal line in the opposite direction. If this pattern were found, this finding would contradict our hypotheses, in that name translations would be based on meaning when the target language is English but on sound when the target language is Chinese.
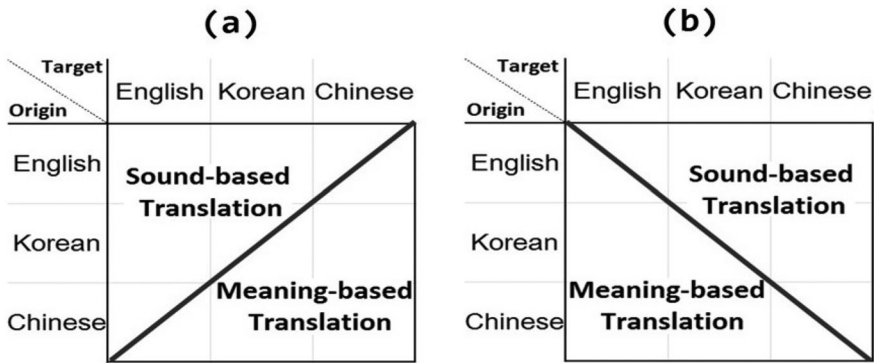
FIGURE 1 The linguistically dependent translation model is shown in (a) and the independent model in (b). Name translations from and to a given language are sound-based in the case of English, meaning-based for Chinese, and mixed for Korean in (a), but not in (b).

Further complicating this set of hypotheses is the fact that translations of brand names from English into Chinese have been shown to prefer names with meaning over sound-based meaningless translations (Chao and Lin 2017; Cui 2019). Reasons include the desire to incorporate a positive nuance into the perception of product properties as well as the attempt to elicit an emotional response in consumers to enhance their memory of the name and thereby promote business. However, for personal names, Chen (2015) reports that Chinese names are often translated to phonetically similar English names. Based on these studies, we advanced another set of hypotheses:

(2) Functionally dependent hypotheses

- H_4: Personal name translations will be primarily sound-based
- H_5: Business name translations will be primarily meaning-based

If hypotheses H_4 and H_5 were to be substantiated, we further predicted that the pattern (a) in Figure 1 would show a larger proportion of sound translations and a smaller proportion of meaning translations in personal names (a larger triangle at top left). At the same time, there would be a larger proportion of meaning translations and a smaller proportion of sound translations in business names (a larger triangle at bottom right). In the remainder of this paper, we present the evidence and argumentation for our hypotheses.

Methods

Participants

A total of 288 people—113 who completed an onsite paper survey in Korea; and 175 who completed a web survey in the US—voluntarily participated in the study advertised on two university campuses. All participants had college accounts and contact addresses or numbers (by email, phone, or mobile payment
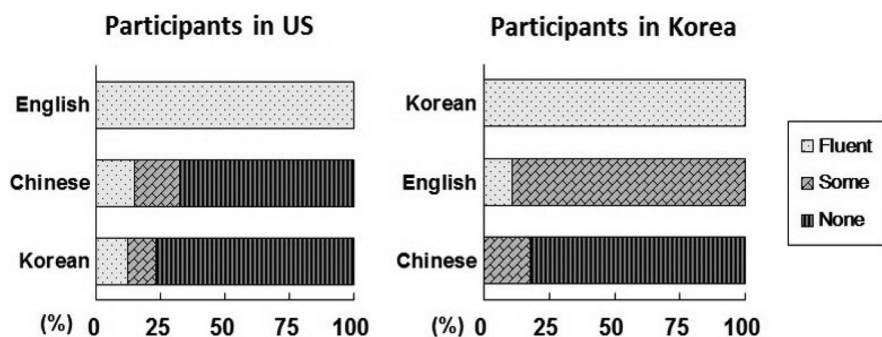
FIGURE 2 Language proficiency of participants in the US ($N = 175$) and in Korea ($N = 113$).

account). In the survey, the respondents were asked to include their name, native language background, and degree of proficiency in the other two languages. The majority of respondents were university students in the age range of 18–23; and both genders were represented (45% of men, 55% of women). The demographics of the respondents in terms of their language background are shown in Figure 2.

Figure 2 shows that the two comparison groups were homogeneous and complementary in that all the US participants described themselves as being fluent in English (top left bar) and all of the Korean participants indicated they were fluent in Korean (top right bar). None of the participants self-identified as "fluent" in all three languages or submitted a duplicate survey.

Design of question items

A total of 118 original names (52 personal and 66 business names) were created in all three languages (36 Chinese, 36 English, and 46 Korean names). The name translations into the two comparison languages were based on either meaning or sound. In the survey, there were 12 types of translations for personal and business names between three language pairs: (1) English and Korean; (2) English and Chinese; and (3) Korean and Chinese. The personal names covered both genders, and the business names covered two different business categories: hedonic (clothing and cosmetics); and utilitarian (groceries and restaurants). This distinction was made because translation preferences have been shown to be sensitive to this distinction in the literature (Chow, Tang, and Fu 2007). We ensured that each gender and business category comprised the same number of names to achieve a balanced distribution. Table 1 shows the exhaustive list of name translation combinations and the corresponding situations presented in this survey.

As shown in Table 1, the names and contexts were designed to be comparable across the three languages (marked as "same context" in each comparable cell) in order to isolate only linguistic factors that are commonly applicable to

TABLE 1
LANGUAGES AND CONTEXTS OF NAME TRANSLATION ($N = 118$ NAMES)

Languages to translate	Context
A. *Personal Names*	
1. Korean into English (6m, 6f)	I am a Korean businessperson in Koreatown, Los Angeles. My American customers like to call me by my first name. I am looking for an English name that is more familiar to them
2. Chinese into English (6m, 6f)	Same context, but with personal name of Chinese origin, doing business in Chinatown, New York
3. Korean into Chinese (5m, 5f)	Same context, but with personal name of Korean origin, doing business in China
4. English into Korean (3m, 3f)	My American friend is attending a summer program at a Korean University. He must use the Korean letters for his name to enroll in the program. Which name in Korean letters would you recommend he uses?
5. English into Chinese (3m, 3f)	Same context, but with personal name of English origin, trying to enroll in a Chinese university
6. Chinese into Korean (3m, 3f)	Same context, but with personal name of Chinese origin, trying to enroll in a Korean university
B. *Business Names*	
1. Korean into English ($3n \times 4$ categories)[†]	I am a Korean businessperson. I want to open a franchise store in Koreatown, Los Angeles. Which name would you recommend for my business in LA so that customers including non-Koreans can easily remember my store and quickly search on the internet?
2. Chinese into English ($3n \times 4$ categories)	Same context, but with original business in China, and the franchise store in Chinatown, New York
3. Korean into Chinese ($3n \times 4$ categories)	Same context, but with original business in Korea, and the franchise store in China
4. English into Korean ($3n \times 4$ categories)	Same context, but with original business in New York, and the franchise store in Korea
5. English into Chinese ($3n \times 4$ categories)	Same context, but with original business in New York, and the franchise store in China
6. Chinese into Korean ($6n \times 1$ category)[‡]	Same context, but with original business in New York, and the franchise store in Korea

m, male; f, female.
[†] 3 names each in 3 categories of consumer business: clothing, cosmetics, grocery stores, and restaurants.
[‡] 6 names in 1 category were used for restaurants, because it is rather uncommon to find the other three categories of Chinese business in Korea.

different cultural contexts. In this way, we sough to minimize the possible unwanted confounding effects of cultural factors.

Sample translations from the online survey in the US are given below in Table 3. Examples of both the onsite paper survey conducted in Korea and the online survey conducted in the US are shown in Appendix A. The full list of original and translated names is provided in Appendix B.

Figure 3 illustrates all eight types of name translations in the US survey. The personal and business name pairs are displayed to the left and right, respectively. The translations involving English and Korean appear in the top tier of the figure, in sectors (a) and (b); while the English and Chinese translations appear in the bottom tier in (c) and (d). The original names marked in bold accompany

(a) English to Korean		(b) Korean to English	
Male: Stanley (stony meadow)	**Cosmetic brand: Charmiss**	**Female: Daeun (blessed)**	**Restaurant: Nakwon (paradise)**
⭕ Stanley 스탠리	⭕ Maehok 매혹	⭕ Benita	⭕ Parada
⭕ Sukwon 석원	⭕ Charming 챠밍	⭕ Dana	⭕ Paradise
⭕ Sumin 수민	⭕ Charmiss 챠미스	⭕ Denise	⭕ Nakwon
(c) English to Chinese		(d) Chinese to English	
Female: Jaslene (gift of God)	**Grocery brand: Premire**	**Male: Bingjun (bright)**	**Clothing: Lingfūrén (first lady)**
⭕ Bǎoyuàn 宝愿 "gift of God"	⭕ Dìyī 第一 "prime"	⭕ Branson	⭕ First Lady
⭕ Juéshìlín 爵士琳 "knight"	⭕ Pūrènměi 铺韧美 "firm"	⭕ Albert	⭕ Firstro
		⭕ Benson	⭕ Lingfuren

FIGURE 3 Screen shots of sample translations on the online survey. Each original name (bold letters in the top row of each box) is presented with a randomized list of translation choices (oval marks). Pairs of personal and business names are illustrated (a) from English to Korean, (b) from Korean to English, (c) from English to Chinese, and (d) from Chinese to English.

the meaning if available, in parentheses. One of the translation options below includes the translated meaning in the respondents' own language. When the names were made up by the researcher and had no pre-existing meaning, as in the names *Charmiss* in (a) and *Premire* in (c), a fictionalized meaning was given instead. Examples in (a) and (c) are as follows. The first translation option in (a) is the translated meaning in the Korean language for the Korean respondents. Take for example, *Maehok* 매혹. Here the first element is a Korean word in English, and the second element is Korean orthography for 'charming.' The second translation option in (a) is the translated meaning in the English language for the English respondents. Consider *Charming* 챠밍. Here the first element is an English word, and the second element is Korean orthography representing the fictionalized meaning of the name *Charmiss*. The first translation option in (c) is the translated meaning in the Chinese and English languages for both the Chinese and English respondents. *Dìyī* 第一 '*prime*,' is composed of a first element which utilizes the is Chinese pronunciation system of pinyin while the second element features Chinese orthography that means 'prime'. In addition, the third element has the fictionalized meaning of 'prime' in English orthography and is placed in double quotation marks. We provided Chinese characters when the target names were in Chinese, because recognition of Chinese names requires a higher degree of semantic processing (in the interpretation of the Chinese characters) and a lower degree of phonological processing (Schmitt, Pan, and Tavassoli 1994).

For the personal names, we selected given names that may potentially find equivalent meanings in all three cultures. For example, we included some English names with meanings obviously translated from Chinese or Korean names, as in *Gemma* for *Bǎolín* or *Borim* 'treasure,' *Prudence* for *Kǎisī* or *Kyeongsuk* 'thoughtful,' and *Felicity* for *Jìnxī* or *Jinhui* 'happy.' (See Appendix B for complete list). Chinese and Korean given names generally consist of one or

two syllables and refer to a character trait that the parents wish their child to have (Martin 1987).

The translations between Korean and Chinese were not included in the US survey but only in the Korean survey, because most of the respondents in the US did not know Korean or Chinese. For the same reason, the translations between English and Chinese were not included in the Korean survey, but only in the US survey. The original names (bold letters) accompanied the translation options (oval marks) in random order in each set (each box) so that the respondents would not expect either a sound- or a meaning-based translation in a given location.

The translation choices for the target language with phonemic orthography, that is, English or Korean in (a), (b), and (d), included one more type of change—a phonological alteration that violated the original source language but obeyed the target language phonology. The result was a name that sounded exotic to the speakers of the original language. For instance, a name obeying English phonotactics but violating Korean phonotactics would produce a foreign or exotic sound to a Korean ear. This strategy is illustrated in (d) where the three choices for the English translation of the original Chinese name *Bingjun* included the option, *Branson*, a name with a phonology change which would most likely sound exotic to a Chinese ear as Chinese phonology does not allow multiple consonants in the beginning of a word (*[br] in *Branson*). This third option was provided as an extra competing choice to disguise our research purpose, because sounds with a "foreign feeling" may affect personal interactions (Pennesi 2014) as well as consumer attitudes (Zhou, Hui, and Zhou 2010). Such options were not available for the translations into Chinese. This left only sound- and meaning-based translations as choices in (c) because the Chinese orthography is not phonemic but logographic. It therefore disallows phoneme-to-phoneme transcription of another language. The target orthography for translations into Chinese or Korean is provided in (a) and (c), along with the English spellings, because the translated names are used in the target orthography.

A number of factors were considered for the name translation scenarios in Table 1 and the translated names in Figure 3. These included socio-cultural adaptations such as gender roles more positive connotations for names; more product-related meaning; phonologically desirable sequences for short length; and trademark laws to discourage surnames for business names, as suggested in the literature (Alden, Steenkamp, and Batra 1999; Francis, Lam, and Walls 2002; Adams and Adams 2005; Sang and Zhang 2008; Chao and Lin 2017; Kim 2017; Zhao and Yu 2018; Cui 2019). In particular, several methods were adopted to cope with inevitable differences in popularity between the names derived from translations. This step was considered important as name translations can be expected to yield culturally dispreferred names due to different naming traditions.

To complete the survey, the respondents were told that the names were to be translated based on sound or meaning in each set of question items (See

Appendix A). All of the personal names in this survey were carefully chosen from among actually reported real names in all three languages. Moreover, all the personal names in Korean were composed of characters listed in a name character dictionary (Supreme Court of Korea 2019). By contrast, all the personal names in English were ranked by the US Social Security Administration (2019) as being less popular than the 100th-most-popular name in their official listing. This precaution was taken in order to avoid high frequency names. Care was also taken to guard against the inclusion of uncommon but well-known personal names such as those of celebrities, famous criminals, or historical figures (e.g. *Stormi, Dunstan*). Common nouns with obvious meanings were included only if they were attested personal names (e.g. *Felicity*). Personal names judged to be without immediately obvious, highly transparent meanings, (e.g. *Benita* or *Albert*) were selected for the survey. The business names were also carefully chosen to avoid well-known brand names (e.g. *Attensis* instead of *Vogue*). However, business names that provided some indication of product properties (e.g. *Charmiss* for *Cosmetics*) were used. Finally, to avoid triggering a negative affect among the respondents, sound translations considered to have the best connotations among the possible translation options were chosen wherever possible. For example, sītàixī 斯泰曦 'peaceful sun light' was selected over sītèxī 斯特西 'special west' for the English name *Stacy*.

Survey completion procedure

Each participant was asked to fill in a questionnaire in either Korean or English depending on the country. The survey asked respondents to indicate which of the translated names they would recommend for the original name provided. Both surveys in this study used the same original name and translation option data for each set of language pairs. Only one name and thus only one strategy per original name could be chosen among the translation options: sound translation, meaning translation, and phonology change.

The translation choices were presented in a different order in the two surveys: randomized in the online survey but fixed in the onsite survey: (1) sound translation, (2) phonology change, and (3) meaning translation (see Appendix A for examples). The randomization difference was to test if a different method would bring in different results; however, statistical analyses revealed no significant ordering effect. The task completion time was 15–20 minutes.

Pretest

To validate the survey's construction, both groups of participants underwent the same pretest on the Romanization of Korean names. They were asked to indicate which Romanization of 12 Korean names they preferred. For each name, they were given two choices: (1) an Anglicized form; and (2) the form officially recommended by the Korean government (Korean Ministry of Culture, Sports, and

Tourism 2014). We expected to find a preference for the official form by the survey respondents in Korea, but not in the US, because the official form is commonly used only in Korea. This expectation turned out to be correct: the pretest results showed that participants in Korea significantly preferred the officially recommended forms (227/384 = 59.1%, χ^2 (1, $N = 384$) = 12.76, $p < .001$), while study participants in the US chose slightly more Anglicized forms. However, this preference among the US participants was non-significant according to the chi-squared test performed (1,075/2,100 = 51.2%, χ^2 (1, $N = 2100$) = 1.19, $p = .28$).

Discussion and results

Overall findings

On the whole, the survey results for the name translation survey supported our hypotheses H_1–H_5 above. This finding was based on a total of 21,111 responses to the personal and business names ($n = 9,330$, $n = 11,781$, respectively). These results excluded the pretest data. Table 2 shows the full list of survey results from both the online and onsite surveys.

In Table 2, the name translations into Korean show contrasting preferences. The most preferred translations were based on sound **if** the names presented were originally English (bold numbers). However, if the names were originally Chinese, the most preferred translations were based on meaning (underlined numbers). This preference held for both personal and business names (left and right sides of rows in A and E) and for both surveys: that is, those conducted in the United States and in Korea (first and second rows in A).

To illustrate the overall pattern, all types of preference shown in Table 2 are reproduced in Table 3. Here only the relative percentages between sound- and meaning-based translations are used. The filler data on phonological change of the original names has been excluded.

Table 3 shows two naming preferences in terms of languages and function. First, the translation choices are more sound-based on the top-left side, toward English (greater-than sign ">"), However, they are more meaning-based on the bottom-right side, toward Chinese (less-than sign "<"). Second, for the personal names, the respondents showed a stronger preference for sound-based translations (more ">"signs), whereas for the business names, they demonstrated a stronger preference for meaning-based translations (more "<"signs). Every result, for each pair of original and translated names, was statistically significant (asterisk "*") according to the chi-squared test performed.

Findings for the separate hypotheses

To see if our hypotheses and predictions were correct, Table 3 was re-written into Figure 4, which marks the preference for sound-based translations using S

TABLE 2

PREFERRED TRANSLATION COUNTS BASED ON SOUND, PHONOLOGICAL CHANGE, AND MEANING BETWEEN ENGLISH, KOREAN, AND CHINESE IN TWO SURVEYS: ONLINE IN THE US AND ONSITE IN KOREA ($N = 21{,}111$)

Languages to translate	Personal Names				Business Names			
	Sound-based	Phonology change	Meaning-based	Total	Sound-based	Phonology change	Meaning-based	Total
A. *English to Korean*								
In US survey	**530** (50%)	354 (34%)	**166** (16%)	1050 (100%)	**1087** (52%)	375 (18%)	**638** (30%)	2100 (100%)
In Korean survey	**389** (57%)	113 (17%)	**176** (26%)	678 (100%)	**747** (56%)	216 (16%)	**381** (28%)	1344 (100%)
B. *Korean to English*								
In US survey	1357 (65%)	462 (22%)	281 (13%)	2100 (100%)	697 (33%)	546 (26%)	857 (41%)	2100 (100%)
In Korean survey	672 (50%)	446 (33%)	237 (17%)	1355 (100%)	359 (27%)	518 (38%)	476 (35%)	1353 (100%)
C. *Chinese to English*								
In US survey	1436 (68%)	464 (22%)	200 (10%)	2100 (100%)	617 (29%)	557 (27%)	926 (44%)	2100 (100%)
D. *English to Chinese*								
In US survey	622 (59%)	n/a	428 (41%)	1050 (100%)	765 (39%)	n/a	1206 (61%)	1971 (100%)
E. *Chinese to Korean*								
In Korean survey	<u>279</u> (41%)	n/a	<u>398</u> (59%)	677 (100%)	<u>170</u> (40%)	n/a	<u>259</u> (60%)	429 (100%)
F. *Korean to Chinese*								
In US survey	132 (41%)	n/a	188 (59%)	320 (100%)	120 (31%)	n/a	264 (69%)	384 (100%)

Bold indicates preference for sound translations from English to Korean; Underlining indicates preference for meaning translations from Chinese to Korean.

TABLE 3
PREFERRED TRANSLATIONS (%) BASED ON SOUND AND MEANING BETWEEN ENGLISH, KOREAN, AND CHINESE IN TWO SURVEYS: ONLINE IN THE US AND ONSITE IN KOREA ($N = 17{,}060$ RESPONSES)

Language	Personal Names						Business Names					
Origin / Target	English		Korean		Chinese		English		Korean		Chinese	
	S	M	S	M	S	M	S	M	S	M	S	M
English												
US survey			50 > 16***		59 > 41***				52 > 30***		39 < 61***	
Korean survey			57 > 26***						56 > 28***			
Korean												
US survey	65 > 13***				41 < 59**		33 < 41***				31 < 69***	
Korean survey	50 > 17***						27 < 35***					
Chinese												
US survey	68 > 10***						29 < 44***					
Korean survey			41 < 59***						40 < 60***			

S, sound-based; M, meaning-based. **Significant at $p < .01$. ***Significant at $p < .001$.

FIGURE 4 Linguistic relevance of name translation for both the online survey in the US and the paper survey in Korea. The preferred translation is based on sound (S letters above the diagonal line) if translation is between languages using a phonemic alphabet (English and Korean), but based on meaning (M letters below the diagonal line) if translation involves languages using syllabic characters for a shared meaning (Chinese and Korean). This preference indicates a tendency toward sound-based translations (more Ss) for personal names in (a); and a preference for meaning-based translations (more Ms) for business names in (b). ($N = 17,060$ responses).

and meaning-based ones using M. Notice the striking similarity between the resulting Figure 4 and our predicted Figure 1 (a).

Both (a) and (b) in Figure 4 show that the respondents preferred sound-based translations (triangles on top left) for names translated from and to the English language (H_2) However, they preferred meaning-based translations (triangles on bottom right) when translating from and to the Chinese language (H_1). The pattern follows the predictions of H_3, in that name translations into the Korean language were predicted to be sound-based if the name was originally English but meaning-based translation if the original name was Chinese. This prediction was made for both personal and business names.

Figure 4 also shows, in (a), that sound-based translations were preferred for personal names (bigger triangle on top left), while in (b), meaning-based translations were preferred for business names (bigger triangle on bottom right). Thus, the pattern follows H_4 and H_5 in that the translations between English and Chinese were primarily sound-based when the respondents were presented with personal names (H_4) but mostly meaning-based when they were given business names (H_5). It is important to note that the resulting Figure 4 shows the predicted pattern (a) in Figure 1, with a larger triangle at top left in personal names but at bottom right in business names. The preference found for sound-based translation between Chinese and English personal names is consistent with findings reported by Chen (2015) on English names of Taiwanese students. However, the preference found for meaning-based translation between Chinese and English business names is controversial (Zhang and Schmitt 2001; Hong, Pecotich, and Shultz 2002; Kum, Lee, and Qiu 2011; Chao and Lin 2017).

Note that in Figure 4, translations of personal names in (a) were symmetrical, and predominantly sound-based between Korean and English (H_2); however, the

personal name translations were primarily meaning-based between Korean and Chinese (H_1). Business name translations between Korean and Chinese were also symmetrical and mostly meaning-based regardless of the language in which the name was originally presented (H_1, H_5).

However, Figure 4 also contains a result that was not predicted by, but also does not contradict, some of our initial hypotheses: H_3, H_4, H_5. The business name translations in (b) were not symmetrical between Korean and English. The preferred translations from English to Korean were those based on sound (H_3), but from Korean to English, the preferred translations were based on meaning (H_5). This is an important asymmetry, because all of the other translation pairs in Figure 4 are symmetrical. Previous findings in the literature are in line with this asymmetry in business names. For example, on the Korean market, brand names in English have been found to evoke greater positive consumer attention than those in Korean (Awan and Chiang 2014). The nonreciprocal preference between business names of English origin and those in the other languages is particularly interesting given research demonstrating that consumers actually misidentify brand origins when the brand name is given in a different language (Samiee, Shimp, and Sharma 2005). This asymmetrical result also supports previous country of origin effect studies that have demonstrated consumer preferences for English brand labels in non-English speaking countries (Elliott and Cameron 1994; Hulland 1999; Josiassen, Lukas, and Whitwell 2008; Zhuang et al. 2008). The results of this investigation do not support, however, the claim by Hong, Pecotich, and Shultz (2002) that "a phonetic translation may be mandatory for an unknown brand" (29).

Conclusion

In light of the present results, the disparate previous findings on business names translated between English and Chinese may be attributable to the different research designs in terms of translation direction (e.g. from English to Chinese or the reverse); the number of name items (usually less than ten); translation types (e.g. phonetic, semantic, suggestive); survey locations (e.g. China or the United States); survey types (e.g. paper vs. online survey); and/or participants (e.g. with or without a college education).

Every effort was made in this study to extricate the language factor from confounding variables. Despite this precaution, there are two major limitations in this study. First, there are no data from a Chinese location, although there was no significant difference in translation preferences between the locations in Korea and the US (Table 3). It would be interesting to compare the results presented in Figure 4 with those of a replication study conducted in China. Second, the familiarity or appropriateness of the name translation data was not controlled. We tried to accommodate for this problem by using the same names for reciprocal roles in the original and target language translation pairs in all

three languages. In this way, the respondent' onomastic familiarity would remain the same overall for the languages involved. Nevertheless, this method is valid only between countries with comparable sets of names. For example, it is hard to find Chinese business names for clothing, cosmetics, or grocery stores in Korea; but Korean business names for these categories are relatively easily found in China. The reverse may be true for other categories of business. The difficulty of controlling the familiarity variable was also a challenge in this study. However, in this respect, this study is no different from many others in this area. Name familiarity has remained a difficult confound for many years in the field, and no clear solution has been identified.

Despite this difficulty, the present investigation still yielded many compelling and important findings. In contrast to earlier, more simplistic studies, we presented a linguistic framework of preferred personal and business name translations based on three typologically contrastive languages: English, Korean, and Chinese. Based on past research, we predicted that the preferred translations would be sound-based either into or out of a phonographic language, but meaning-based for translations into or out of a logographic language. These predictions were supported for reciprocal name translation pairs of original and target languages using two different survey methods, in both the US and Korea. In a future investigation, it would be interesting to test the sound- and meaning-based translation preferences of respondents in China. Clearly, there is more work to be done.

Acknowledgements

Disclosure statement

Funding

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Appendix A. Survey forms with a sample context, names, and translation choices

1. Onsite paper survey form

Unlike the online survey, the paper version was given in the Korean language, because it was tested in Korea with respondents who were all fluent in Korean but not in English. The Korean terms in the column headings refer to the following: 1. similar sounds (원음과 유사), 2. exotic sounds (이국적 발음), and 3. same meaning (뜻이 같은 이름). The examples depict personal name translations from Korean into English in Table 1. All 12 names in the survey are shown below (six males, six females).

Your Name Choices in the USA, Korea, and China

I. I am a Korean businessman in Koreatown, Los Angeles. My name is **Beomjun Kim.** My American customers like to call me by my first name. I am looking for an English name that is more familiar to them. Which of the following names would you recommend me to use? The meaning of the Korean name is provided in parenthesis, although many Koreans are not aware of the meaning.

Gender:	Korean name	"Meaning"	**1.** Sound Translation	**2.** Phonology Change	**3.** Meaning Translation	**Your Choice**
1. Male:	**Beom-jun**	"superior"	Benson	Branson	Superior	____
2. Male:	**Jae-seon**	"wise"	Jason	Jaxton	Alfred	____
3. Male:	**Ki-tong**	"boisterous"	Keaton	Clayton	Rowdy	____
4. Male:	**Gil-heon**	"lucky"	Gilon	Griffin	Lucky	____
5. Male:	**Dae-yun**	"prosper"	Darin	Draven	Prosper	____
6. Male:	**Su-min**	"smart"	Simon	Stanley	Cadmus	____
7. Female:	**Bo-rim**	"treasure"	Belen	Braelyn	Gemma	____
8. Female:	**Jin-hui**	"happy"	Jenny	Jaslene	Felicity	____
9. Female:	**Kyeong-suk**	"clear"	Kasey	Christine	Clair	____
10. Female:	**Yeon-u**	"lotus"	Annie	Ashlyn	Lotus	____
11. Female:	**Su-jin**	"lotus"	Susan	Stacy	Virtue	____

2. *Online web survey form*

This version of the survey was given in the English language because it was tested in the US with respondents who were all fluent in English. The examples depict business name translations from English into Chinese in Table 1. One name per business category is taken from among all 12 names ($3n \times 4$ categories).

Your Name Choices in the USA, Korea, and China

From your perspective, please fill out the best sounding names for a person or a company across the USA, Korea, or China. You need to know English, but not necessarily Korean or Chinese. The expected time for this survey is 15 to 20 minutes.

Best Name for an American Brand in China

My business name in New York is "Firstro." I want to open a franchise store in China. I must use the Chinese characters for an official business name, with or without an English name. Most companies choose the second option: registering only a Chinese name. Which name would you recommend for my business in China? I have two choices: sound translation or meaning translation. The third option is not available because Chinese characters do not transcribe sounds automatically into its own orthography as in the Korean case. The pinyin transcription is provided for non-Chinese speakers.

[…]

65. Clothing brand: Joiery

Mark only one oval.
○ Huānxǐ 欢喜 "joyful"
○ Jiārì 嘉日 "encourage"

66. Cosmetics brand: Charmiss

Mark only one oval.
○ Chuòměixiù 绰美秀 "beautiful"
○ Mèihuò 魅惑 "attraction"

69. Grocery brand: Frestree

Mark only one oval.
○ Xīnxiān 新鲜 "fresh"
○ Fùxiùruì 富秀瑞 "outstanding"

72. Restaurant brand: Townis

Mark only one oval.
○ Tuányuèxǐ 团悦喜 "happy meeting"
○ Cháng'ān 長安 "downtown"

Appendix B. Complete list of personal and business names and translation choices in this study

1. Personal names

Original Name	Translations based on Sound/Phonology/Meaning	Original Name	Translations based on Sound/Phonology/Meaning
A. English^{EM} into Korean^{(E)K}		**D. Korean^{(K)EM} into English^E**	

Original Name	Translations based on Sound/Phonology/Meaning	Original Name	Translations based on Sound/Phonology/Meaning
A. English[EM] into Korean[(E)K]		**D. Korean[(K)EM] into English[E]**	
Male		Male	
Clayton 'clay town'	Clayton/Kidong/Dojin	Beomjun 'superior'	Benson/Branson/Superior
Griffin 'hooked nosed'	Griffin/Kilhun/Kokbi	Jaeseon 'wise'	Jason/Jaxton/Alfred
Stanley 'stony meadow'	Stanley/Sumin/Sukwon	Kidong 'boisterous'	Keaton/Clayton/Rowdy
		Gilheon 'lucky'	Gilon/Griffin/Lucky
		Daeyun 'prosper'	Darin/Draven/Prosper
		Sumin 'smart'	Simon/Stanley/Cadmus
Female		Female	
Jaslene 'gift of God'	Jaslene/Jinhui/Bowon	Borim 'treasure'	Belen/Braelyn/Gemma
Christine 'faithful'	Christine/Kyungsook/Heesun	Jinhui 'happy'	Jenny/Jaslene/Felicity
Stacy 'resurrection'	Stacy/Sujin/Hyunsung	Kyeongsuk 'clear'	Kasey/Christine/Clair
		Yeonu 'lotus'	Annie/Ashlyn/Lotus
		Daeun 'blessed'	Dana/Denise/Benita
		Sujin 'trustworthy'	Susan/Stacy/Virtue
B. English[EM] into Chinese[ECM]		**E. Chinese[EM] into English[E]**	
Male		Male	
Clayton 'clay town'	Kèláidùn//Táochén	Bǐngjùn 'bright'	Benson/Branson/Albert
Griffin 'hooked nosed'	Gǔlìfēn//Qūbí	Jiésēn 'hero'	Jason/Jaxton/Rupert
Stanley 'stony meadow'	Sǐdānléi//Shíyuán	Guīdòng 'boisterous'	Keaton/Clayton/Rowdy
		Guóliáng 'country'	Gilon/Griffin/Tilton
		Dàirén 'benevolent'	Darin/Draven/Sean
		Suìmǐn 'smart'	Simon/Stanley/Cadmus
Female		Female	
Jaslene 'gift of God'	Juéshìlín//Bǎoyuàn	Bǎolín 'treasure'	Belen/Braelyn/Gemma
Christine 'faithful'	Kèlìsītíng//Xǐxiān	Kǎisī 'thoughtful'	Kasey/Christine/Prudence
Stacy 'resurrection'	Sītàixǐ//Xiānshèng	Jìnxī 'happy'	Jenny/Jaslene/Felicity
		Àiniū 'beloved'	Annie/Ashlyn/Cheryl
		Dàēn 'blessed'	Dana/Denise/Benita
		Xiùzhēn 'gem'	Susan/Stacy/Jewel
C. Chinese[ECM] into Korean[K]		**F. Korean[KC] into Chinese[E]**	
Male		Male	
Jǐn Míng 'bright'	Jin Ming // Kim Myeong	Yeonggil 'prosper'	Yeonggil//Yǒngjí
Yáng Xiùyīng 'outstanding'	Yang Siuying // Yang Suyeong	Jeongeun 'righteous'	Jeongeun//Zhèngēn
Lǐ Chāo 'superior'	Li Chao // Lee Cho	Uiseon 'kind'	Uiseon//Yíxuān
		Dawon 'original'	Dawon//Duōyuàn
		Eunhui 'happy'	Eunhui//Ēnxǐ
Female		Female	
Yáng Xiùlán 'orchid'	Yang Siuran // Yang Suran	Bona 'blossom'	Bona//Bāonà
Jǐn Guìyīng 'flower'	Jin Gwiying // Kim Gayeong	Hyerim 'blessed'	Hyerim//Huìlín
Lǐ Píng 'peaceful'	Li Ping // Lee Pyeong	Dayeong 'glory'	Dayeong//Duōróng
		Geunhye 'hibiscus'	Geunhye//Jǐnhuì
		Subin 'pretty'	Subin//Xiùbīn

Note. Order of superscript symbols represents either the order of orthography or meaning presented in the survey. Unlike in the names in the other languages, Chinese names in Column C include surnames. This was done to give the respondents typical forms that unambiguously represent names instead of just common nouns. This procedure was followed because given names in Chinese are often common nouns such as *Míng, Chāo,* and *Píng.*
[C]Chinese orthography; [E]English orthography; [K]Korean orthography; Mmeaning; [()]optionally provided if necessary in the given survey location.

2. Business names

Original Name	Translations based on Sound/Phonology/Meaning	Original Name	Translations based on Sound/Phonology/Meaning
A. English^E(M) into Korean^(E)K		**D. Korean^(K)E(M) into English^(K)E**	
Clothing		Clothing	
Firstro	Firstro/Yeongbuin/First Lady	Yeongbuin 'first lady'	Youngbuin/Firstro/First Lady
Attensis	Attensis/Sisun/Style	Siseon 'attention'	Shisun/Attensis/Style
Joiery	Joieory/Hwanhi/Joy	Hwanhi 'joy'	Whanhi/Joiery/Joy
Cosmetics		Cosmetics	
Charmiss	Charmiss/Maehok/Charming	Maehok 'attraction'	Maihok/Charmiss/Charming
Pritie	Pretty/Eoljjang/Pretty	Eoljjang 'pretty face'	Eoljang/Pretie/Pretty
Beatria	Beatria/Mimo/Beauty	Mimo 'beauty'	Mimo/Beatria/Beauty
Grocery		Grocery	
Frestree	Frestree/Shinson/Fresh	Sinseon 'fresh'	Shinsun/Frestree/Fresh
Premire	Premire/Cheil/Prime	Jeil 'prime'	Cheil/Premire/Prime
Valmax	Valmx/Boram/Value	Boram 'worthy'	Boram/Valmax/Value
Restaurant		Restaurant	
Townis	Townis/Jangan/Downtown	Jang'an 'downtown'	ChangAnn/Townis/Downtown
Spree	Spree/Bomnae/Spring	Bomnae 'spring'	Bomnai/Spree/Spring
Parada	Parada/Nakwon/Paradise	Nakwon 'paradise'	Nakwon/Parada/Paradise
B. English^E into Chinese^ECM		**E. Chinese^EM into English^EM**	
Clothing		Clothing	
Firstro	Píshòuxiān//Lìngfūrén	Lìngfūrén 'first lady'	Lingfuren/Firstro/First Lady
Attensis	Àitōngxì//Shìxiàn	Shìxiàn 'attention'	Shixian/Attensis/Style
Joiery	Jiārì//Huānxǐ	Huānxǐ 'joy'	Huanxi/Joiery/Joy
Cosmetics		Cosmetics	
Charmiss	Chuòmèixiù/Mèihuò	Mèihuò 'attraction'	Meihuo/Charmiss/Charming
Pritie	Púyùtián/Hóngyán	Hóngyán 'pretty face'	Hongyan/Pritie/Pretty
Beatria	Biǎotáo//Měimào	Měimào 'beauty'	Meimao/Beatria/Beauty
Grocery		Grocery	
Frestree	Fùxiùruì//Xǐnxiān	Xǐnxiān 'fresh'	Xinxian/Frestree/Fresh
Premire	Pūrènměi/Dìyǐ	Dìyǐ 'prime'	Diyi/Premire/Prime
Valmax	Bèimàoxiù//Bǎolán	Bǎolán 'worthy'	Baolan/Valmax/Value
Restaurant		Restaurant	
Townis	Tuányuèxì//Cháng'ān	Cháng'ān 'downtown'	Changan/Townis/Downtown
Spree	Sèpiàoliang/Chūnchuānguǎn	Chūnchuānguǎn 'spring'	Chunchuanguan/Spree/Spring
Parada	Pāróután//Lèyuán	Lèyuán 'paradise'	Leyuan/Parada/Paradise
C. Chinese^EM into Korean^K -		**F. Korean^KCM into Chinese^E**	
Clothing		Clothing	
		Yeongbuin 'first lady'	Yángbùyīn//Lìngfūrén
		Siseon 'attention'	Sīsǔn//Shìxiàn
		Whanhi 'joy'	Huànhè//Huānxǐ
Cosmetics		Cosmetics	
		Maehok 'attraction'	Mèihuòkè//Mèihuò
		Eoljang 'pretty face'	Ěrjiāng//Hóngyán
		Mimo 'beauty'	Mìmóu//Měimào
Grocery		Grocery	
		Sinseon 'fresh'	Sīnsùn//Xǐnxiān
		Jeil 'prime'	Zhélè//Dìyǐ
		Boram 'goody shop'	Bōlāmǔ//Bǎolán
Restaurant		Restaurant	
Guōlǐzhuàng	Guorijuang//Gwarijang	Jang'an 'downtown'	Jiāngān//Cháng'ān
Hǎidǐlāo	Haidilao//Haejeoro	Bomnae 'spring'	Bōmǔne//Chūnchuānguǎn
Jīnghóngyuan	Jinghongwan//Jeonghongweon	Nakwon 'paradise'	Nàikèwàn//Lèyuán
Cháng'ān	Changan//Janganok		
Chūnchuānguǎn	Chunchuanguan// Chuncheonguan		
Lèyuán	Lewian//Nakwon		

Note: Order of superscript symbols represents the order of orthography or meaning presented in the survey.
^C Chinese orthography; ^E English orthography; ^K Korean orthography; ^M meaning; ^0 optionally provided if necessary in the given survey location.

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