

# A Study on the Influence of Linguistic Distance on China's Outward Foreign Direct Investment

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**Abstract.** This paper will introduce linguistic distance as a key variable and select the top 20 countries in China's Outward Foreign Direct Investment stock from 2012 to 2021 as samples to build a fixed effect model to explore the relationship between linguistic distance and China's OFDI stock. The conclusion shows that linguistic distance has a significant negative relationship with China's OFDI stock. This paper also puts forward some targeted suggestions at the national level and the enterprise level.

**Keywords:** Linguistic distance, OFDI, Cost Theory.

## 1 Introduction

In December 2016, China issued laws and regulations on OFDI, which reduced many irrational foreign investments. China's OFDI has changed from high-speed development to high-quality development and integrated into the high-standard opening up. However, Language, as a tool to convey information and communicate feelings, plays an important role on international trade. The wave of globalization is the general trend, and it is imperative for China to invest in more small language countries in the future. Therefore, we should not only make a descriptive analysis of the current situation of China's foreign direct investment, but also make a thorough quantitative analysis, so as to provide reference and suggestions for multinational enterprises and local enterprises that want to go abroad to accumulate experience and make great achievements.

## 2 Research status at home and abroad

Existing research on OFDI mainly focuses on the factors that affect OFDI, such as geographical distance, labor force number, wage level, etc., and the most representative is the gravity model. With the deepening of research, more microscopic and abstract factors, such as cultural distance and psychological distance, can also be included.

Currently, the research on the relationship between linguistic distance and OFDI mainly focuses on two perspectives which as follows.

## 2.1 Cost perspective

cost perspective mainly focuses on all kinds of expenses generated by every part in communication. Bin Jian Cheng believes that the economic growth of English-speaking countries is faster than that of non-English-speaking countries because English, as a global language, can reduce the global communication cost and effectively enhance the cross-border communication of workers<sup>[1]</sup>.

## 2.2 Cultural identity perspective

Cultural identity perspective focuses on the construction of trust network and identity network which can lead to the preference of investment location. Gu&Zhang found that foreign investors would choose regions with high cultural identity and cultural similarity to form favorable market expectations and confidence dependence paths<sup>[2]</sup>. Su Jian (2020) proposed that language is a representation of culture, and cultural differences caused by different languages will affect the trust of trade between the two countries<sup>[3]</sup>. Otherwise, Su found that The impact of cultural differences between investing and host countries on OFDI by TNCs cannot be ignored<sup>[6]</sup>.

However, culture distance has two sides effect. Wang& Xu found that the dominant effect of cultural distance plays a role in outbound investment through higher power distances and collectivist tendencies Chinese<sup>[10]</sup>.

Most of the existing studies less focus on the relationship between Chinese and OFDI stock and linguistic distance is often taken as a dimension of cultural distance. So it is necessary to make up for this shortcoming. And we will add more variables that less be considered to our model.

## 3 Research design

The samples eventually selects 21 countries: USA、Australia、Singapore、UK、Netherland、Norway、Russia、Canada、Indonesia、Switzerland、Sweden、France、South Africa、Malaysia、Vietnam、The United Arab Emirates、Laos、Thailand、Myanmar、South Korea.

### 3.1 Variable selection

This paper mainly studies the influence of linguistic distance on China's OFDI stock, and the specific variables are as follows:

This paper selects 2012-2021 China's OFDI stock to samples as dependent variable.

the key independent variable——Linguistic distance LD is measured by the WALS features and the dummy variable method, the same feature is recorded as 0, and vice versa is recorded as 1, and the average is obtained after summing.

In this paper , five control variables are as follows:

(1)CD.

The cultural six-dimension data provided by Hofstede<sup>[4]</sup> was used and processed using the Hofstede formula<sup>[5]</sup>.

(2)GDP.

The market scale is expressed by the GDP of host country.

(3)TRADE.

This variable adopts the ratio of the total import and export goods between two sides to the GDP of the host country every year.

(4)NAT.

The proportion of ore, metal and fuel exports in the total exports of the host country can be used to express the richness of natural resources in a country. Some research showed that The resources of the host country represent an important opportunity for our direct investment in it<sup>[9]</sup>.

(5)FTA.

This variable is a dummy variable. If China signed FTA with a country, it will be recorded as 1, otherwise, it will be recorded as 0.

The sources and processing methods of the above variables are shown in Table 1 as follows.

**Table 1.** Source of Variables

| variable | data source                          |
|----------|--------------------------------------|
| OFDI     | Statistical bulletin on China's OFDI |
| LD       | WALS ONLINE                          |
| CD       | hofstede Personal website            |
| NAT      | World Bank official database         |
| TRADE    | China'S Yearbook                     |
| GDP      | World Bank official database         |
| FTA      | World Bank official database         |

### 3.2 Model Construction

As mentioned in Chapter 2, the most authoritative model in the study of OFDI is the gravitational model, with the deepening of the research, a series of explanatory variables can be added to the study of the investment effect to optimize and correct the model<sup>[7]</sup>.so this study draws on the research of Kleiner & Toubal(2010)and Wang&Jin <sup>[8]</sup> to construct the following model, in order to overcome the problem of heteroscedasticity and the problem of nonnormal distribution of residuals, this study constructs the model as follows:

$$\ln OFDI_{it} = \beta_1 LD_{it} + \beta_2 CD_{it} + \beta_3 \ln GDP_{it} + \beta_4 \ln TRADE_{it} + \beta_5 \ln NAT_{it} + \beta_6 FTA_{it} + \epsilon \dots \quad (1)$$

In this equation, OFDI<sub>it</sub> represents the stock of China's OFDI in country i in the year t; LD<sub>it</sub>、CD<sub>it</sub> represents the linguistic distance and cultural distance between China and country i; and the others represent the value of variable X in the country i in the year t.

## 4 Conclusions

According to the results shown by statistical software, all variables pass the significance test.

### 4.1 Results

According to Table 2, It can be seen that all variables have positive correlation with OFDI stock expect for linguistic distance.

**Table 2.** Regression results

| Variable   | Coefficient | std.error | t-statistic | prob.     |
|------------|-------------|-----------|-------------|-----------|
| LD         | -1.283984   | 0.476111  | -2.696815   | 0.0076*** |
| LOG(GDP)   | 0.379764    | 0.029383  | 12.92448    | 0.0000*** |
| LOG(TRADE) | 0.249696    | 0.090119  | 2.770736    | 0.0061*** |
| LOG(NAT)   | 0.137359    | 0.075780  | 1.812605    | 0.0714*   |
| FTA        | 0.546867    | 0.201465  | 2.714459    | 0.0072*** |
| CD         | 0.026478    | 0.012313  | 2.150388    | 0.0327**  |

### 4.2 Analysis

(1) LD affects communication cost、 contract conclusion cost、 supervision cost and etc. At the same time, LD also affects cultural identity. all of this can hinder OFDI.

(2) GDP can represent a country's investment prospect to a certain extent, and a country's natural resources export volume also represents its natural resources richness. Trade dependence and the signing of a FTA can enhance the trust level and reduce a lot of cumbersome procedures, so they all conducive to attracting investment.

(3) the results show the effect of "outsiders' income" in this sample. Maybe it is related to the fact that the official language of these countries is English, the disadvantage of excessive CD that can be adjusted by taking global language, English, as a basic course. Besides, the number of immigrants and students from China also moderate the unfavorable influence.

### 4.3 Suggestions

This paper will provide feasible suggestions from international communication、 policies formulating、 Education reform in two levels.

#### (1) National level

Actively strive for the right to host international events、 signing FTA、 selectively carry out pilot projects in developed areas, provide more choices of minority languages all work.

#### (2) Enterprise level

Multinational enterprises dare to jump out of the comfort zone. Companies and enterprises must have the enterprising spirit of striving for perfection and the courage to cross the rubicon.

Enterprises that want to go abroad should learn from the predecessors. Cultivate forward-looking vision and pay attention to cost control.

To sum up, both countries and enterprises should take "going out" as the only way to build a powerful country and a powerful enterprise, and on this road, more and more tiny details such as linguistic distance should be taken into consideration, not only taking into account the overall situation, but also grasping the details.

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