Economics Bulletin

Volume 39, Issue 4

Soft power and exporters behavior in international trade

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Abstract

Soft power is a political and economical tool in international relations characterising the competitiveness of a country, its integrity and its attractiveness. The country image helps to promote exchanges and international business through people's perception. These political and economic influence have outcomes by creating positive impressions among foreign countries. I investigate the unexplored relationship between soft power and exporters behavior in international trade. I mainly use two proxies with the BBC-GlobeScan and Pew surveys about people's opinion on exporter countries. I employ a theory-based and robust structural gravity model with aggregate and disaggregated trade data for micro characteristics of exporters. I find evidence that soft power has significant effects on exporting firms behaviors, essentially for some developping countries at the aggregate level of trade. The results are less significant at the disaggregated level.

I am very grateful to the Editor (John P. Conley), the associate editor (Valerie Mignon) and one anonymous referee for their insightful suggestions. All remaining errors are mine.

Citation: Laurent Didier, (2019) "Soft power and exporters behavior in international trade", *Economics Bulletin*, Volume 39, Issue 4, pages 2595-2614

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Submitted: August 25, 2019. **Published:** November 16, 2019.

1. Introduction

"Soft power is the ability to get what you want through attraction rather than through coercion or payments. It arises from the attractiveness of a country's culture, political ideals, and foreign and domestic policies" (Nye, 2005). The role of country images influence several aspects of international relations: exports, foreign direct investments, the stability of relations, the attractiveness of hosting countries, the degree of economic and politic influence and the economic and social prosperity with the human development. Firms are the first concerned by the opinion of foreigners on their country in international trade. For instance, sometimes firms can change their behavior in response to people's perception and political attitudes. Soft power is a political and economical tool in international relations characterising the competitiveness of a country, its integrity and its attractiveness. Only one paper investigates the influence of soft power but on aggregate trade flows (Rose, 2019) without paying attention to the effects for exporter firms. We know that country images, through foreign people perceptions, affect firms behavior because of several channels such as culture, political values, domestic and foreign policies (Hsieh et *al.*, 2004). In other words, the country image corresponds to an attitude towards a country, that is to say the attitude towards a country's territory, its history and traditions, its domestic economy, public culture, norms and values as well as its political organization (Buhmann, 2016). In our case, this is the first study to apply soft power to exporters behavior in international trade (number of exporters, entrants, exiters, surviving entrants, incumbents and mean exports per exporter).

Very few papers established an empirical linkage between soft power and international trade relations. Based on the BBC-GlobeScan survey results, Rose (2016) demonstrated that a country's exports are greater if it is perceived by the importer to be exerting more positive world influence. Rose (2019) found that trading partners whose leadership is approved abroad lead to an increase in bilateral exports due to the favorable image of the country allowing to attract foreigners and exchange more. Indirectly, Michaels and Zhi (2010) showed that the worsening attitudes between the US and France reduced bilateral trade from 2002-2003 even without the implementation of trade barriers. This situation had a negative impact on business transactions (business travel, income payments) affecting firms behavior at the same time. Morevoer, Umana Dajud (2013) showed that political proximity between trading partners has statistically significant effects on bilateral trade through the similarity of countries' vote in the UN, the forms of government of each country

and the ideological distance between them.

So, the country image through foreigners perception could affect firms behaviors in trade with owners and external pressures and government attitudes. Using aggregate and disaggregated trade data with the Exporter Dynamic Database of World Bank, I estimate the impact of two proxies of soft power on exporters behavior in international trade. First, I assess the effect of the positive and negative world influence of exporter countries, as perceived by the importer countries with BBC-GlobeScan surveys. Second, I evaluate the effect of favorable and unfavorable opinion of importing countries concerning the exporter countries with Pew surveys. I employ a theory-based and robust structural gravity model in panel with PPML three-way fixed effects (Baier et *al.*, 2019 ; Larch et *al.*, 2019).

The paper is structured as follows. Section 2 presents some economic intuitions about soft power and international trade. Section 3 describes the data and empirical approach used. Section 4 analyzes the results and Section 5 concludes.

2. Soft power and international trade: some economic intuitions

It is well know that the US attract a lot of people in the world (tourists, businessmen, politicians) due to its image of technological advancement and open-mindedness. The country image helps to promote exchanges and international business through people's perception. These political and economic influence have outcomes by creating positive impressions among foreign countries. More precisely, if countries have a favorable image, that image can influence and attract people to exchange from these countries. According to Nye (2005), three dimensions mainly characterise soft power:

- Culture is the set of values and practices disseminated through film industry, sport, music and the popularity of its history such as the US, the United Kingdom (UK) and France. The education is also an important component focused on higher education. The quality of universities allows to attract more international students and researchers with strong spillovers effects in terms of intellectual property and R&D. Several papers studied linkages between culture and bilateral trade where common language and culture enhance trust and reduce transactions costs between trading partners. Bergstrand and Egger (2007), Melitz (2008) found the trade promoting effect of a common language on trade, the same positive influence also appears for cultural familiarity in Konya (2006), Guiso et *al.* (2009). Lien and Lo (2017), Akhtaruzzaman et *al.* (2017) showed that cultural institutes such as Confucius institute, Goethe-

Institut significantly improve bilateral trade and FDI, serving as a political and economical tool for a foreign country in host country. Rose and Spiegel (2011) indicated that hosting mega-events of sport leads to promote bilateral exports thanks to an improvement of the country's openness and by the implementation of reforms in terms of liberalisation.

- Political values like freedom, human rights, democracy and equality affect its influence relative to others at home, in international institutions and in foregin policy. In other words, a country can attract or repel others by its influence. Government effectiveness, prosperity and human development are the main outcomes coming from this dimension. All applied studies give strong support to a positive link between democracy and international trade (Mansfield *et al.*, 2000, 2002 ; Milner and Kubota, 2005 ; Duc et *al.*, 2008 ; Yu, 2010). Democratic countries increase bilateral trade through the removal of trade barriers relative to non-democratic countries where a highly democratic country is a more favorable trading partner because of a greater product quality and trust in exchanges.

- Domestic policies illustrated by the attractiveness of a country's business model, capacity of innovation and regulatory framework sustaining competitiveness and business friendliness. Foreign policies with the membership in multilateral and regional organisations but also with diplomatic networks (embassy, diplomatic exchanges) exercised by states through influence and persuasion. The links between trade and foreign policy have been increasingly studied. Indeed, Nitsch (2007) investigated the impact of official state visits on bilateral trade and showed that this tool of foreign policy significantly improves trade for hosting countries. Rose (2007) showed that diplomatic representations have a positive effect on trade due to trade facilitation mechanisms that allow for a reduction in trade transactions. Fuchs and Klann (2013), Lin et *al.* (2019) found that countries receiving the Dalai Lama tend to export less to China. Didier (2018) demonstrated that the One-China-policy has mainly benefited China as its bilateral trade flows have drastically increased relative to those of Taiwan regardless the trading partners considered. In Lederman et *al.* (2010), export promotion agencies lead to increase exports allowing to overcome trade barriers in hosting countries and solving asymmetric information for firms.

3. Empirical approach

3.1. Data

The dependent variables comes from the Exporter Dynamic Database of World Bank[1] covering the micro-characteristics (Table 1) of the exporter sector in both developed and developing countries, i.e. 70 countries (Table 2) from 1997 to 2014. The data are established by the export-level customs data based on annual exporter transactions and they are available at the country-year level, country-product-year, country-destination-year and country-product-destination-year. In this paper I will use samples at the country-destination-year and country-product-destination-year (raw materials and manufactured goods).

The key variables about the soft power are survey results from the BBC-GlobleScan with the Program on International Policy Attitudes (PIPA) at the University of Maryland[2] (Table 3) and the Pew Research Center[3] (Table 3). These two datasets are used by Rose (2019) even if in our case I cannot use the other main survey provided by Gallup concerning the opinion on the leaders of the countries (China, Germany, Russia, the UK and the US) due to the very restricted sample of (developed) countries in the Exporter Dynamic Database.

3.2. A structural gravity model

I will follow the usual practice by estimating expected bilateral trade flows using specifications based on the gravity model. I perform then a theory-consistent structural gravity model by taking into account multilateral resistance terms (Anderson and van Wincoop, 2003 ; Head and Mayer, 2014). Equations 1-2 are based on Anderson and van Wincoop (2003) who refined the work of Anderson (1979) by delivering the following structural gravity system of trade:

$$X_{ijt} = \frac{Y_{it}}{\Omega_{it}} \frac{X_{jt}}{\Phi_{jt}} \phi_{ijt}, \tag{1}$$

where $Y_i = \sum_j X_{ij}$ is the value of total production, $X_j = \sum_i X_{ij}$ is the value of

[1]More details about the database are provided in Cebeci et *al.* (2012). `https://datacatalog.worldbank.org/dataset/exporter-dynamics-database`

[2]Further details are available at `https://globescan.com/insight/?gst=bbcworldservicesurvey`.

[3]Further details are available at `http://www.pewglobal.org/`

expenditure, and Ω_{it} and Φ_{jt} the multilateral resistance terms defined as

$$\Phi_{jt} = \sum_{l} \frac{\phi_{jtl} Y_l}{\Omega_{lt}} \qquad \text{and} \qquad \Omega_{it} = \sum_{l} \frac{\phi_{lit} X_l}{\Phi_{lt}}. \tag{2}$$

Here, bilateral trade X_{ijt} is a function of supply, demand, and bilateral frictions. The supplier term in the structural gravity equation $S_{it} = \frac{Y_{it}}{\Omega_{it}}$ weights total production Y_{it} by the exporter's multilateral resistance Ω_{it}, and the demand term $M_{jt} = \frac{X_{jt}}{\Phi_{jt}}$ weights total expenditure X_j by the importer's multilateral resistance Φ_{jt}. More precisely, Ω_{it} and Φ_{jt} are structural terms developed by Anderson and van Wincoop (2003) as the inward and the outward multilateral resistances, respectively. One of the important application of the gravity model is to estimate the effect of bilateral trade determinants. Most trade models express bilateral accessibility through $0 < \phi_{ij} = \tau_{ij}^{\theta} < 1$, in which θ is the elasticity of trade flows to trade costs, and trade costs τ_{ij} contain the bilateral elements[4] defining the level of frictions to trade between the two partners.

I employ Poisson Pseudo-Maximum Likelihood (PPML) with fixed effects developed by Santos Silva and Tenreyro (2006) and Fally (2015). The log-linear form is unable to handle zero trade flows because the logarithm of zero is undefined. In this respect, PPML is the empirical method most often employed because of its robustness[5] compared with the other estimators which have large biases (Santos Silva and Tenreyro, 2011). Indeed, according to their Monte Carlo simulation, they show that the PPML-estimator is well-behaved and performs well when the data can exhibit over-dispersion and also have excess zeros. Furthermore, in our case I use PPML with three-way fixed effects as suggested by Baier et *al.*, (2019) and Larch et *al.* (2019). They address computational issues with the three-way fixed effects currently recommended in the gravity literature with an iterative PPML estimation procedure facilitating their inclusion. The estimation equation is as follows:

$$Exporter_{ijt} = exp(\beta_1 SoftPower_{ijt} + F_{it} + F_{jt} + F_{ij})\eta_{ijt} \tag{3}$$

where $Exporter_{ijt}$ is exporter micro characteristics of country i from the country j at year t (Table 4). More precisely, this variable includes two sets of data allowing us to assess the main exporters behavior in international trade. First, the mean exports

[4] Among which geographical distance, common language, shared border, currency, and common history.

[5] "... when there is evidence of heteroskedasticity, the Poisson pseudo-maximum-likelihood estimator should be used as a substitute for the standard log linear model (Santos Silva and Tenreyro, 2006).

per exporter. Second, the number of exporters, entrants, exiters, surviving entrants and incumbents. The variable *Soft Power* includes survey results coming from BBC-GlobeScan[6] (percent of positive and negative influence of country i in the world as perceived by the country j at year t) and Pew[7] (percent of favorable and unfavorable opinion of country j on country i at year t). These variables are in log and estimated separately, as employed by Rose (2019)[8]. I suppose that exporting firms behavior may be influenced by the opinion (consumers and businessmen) of trading partners through the image of their country. For instance, a trade-promoting effect appears when trading partners have a good opinion of country allowing a better trust in trade relations with more exchanges because of consumers approval, trade facilitation by the authorities, and reversely.

Following Baldwin and Taglioni (2006), Baier and Bergstrand (2007), Head and Mayer (2014), I also include three sets of fixed effects commonly practiced in the economic literature to have robust[9] results. Unilateral time-variant (GDP, population, GDP per capita) and bilateral time-invariant (distance, common language, contiguity) determinants of trade are absorbed in specifications using these fixed effects due to the collinearity issue between them. Indeed, exporter-time and importer-time fixed effects (F_{it} and F_{jt}) take into account changes in multilateral resistance over time (Equation 2). This approach captures other trade costs across other export and import markets through relative price effects. The exclusion of these terms leads to an omission bias with more unobserved trade barriers. Country-pair fixed effects (F_{ij}) correct the omitted variable bias because the unobserved variables could be correlated with the bilateral characteristics of the dyadic variables.

4. Results

4.1. Soft power and exporters behavior in total trade

For total trade, note that only Brazil, Germany, Iran, Pakistan and South Africa are retained as exporter in the sample due to the availability of variables in the Exporter Dynamic Database with BBC-GlobeScan survey results. With Pew data, only

[6]Survey question (BBC-GlobeScan): "If you think each of the following are having a mainly positive or negative influence in the world?".

[7]Survey question (Pew): "If you have a favorable or unfavorable opinion of ... ?".

[8]The variables of interest can be interpreted as an elasticity of dependent variable with respect to soft power proxies.

[9]I also use a Huber-White estimator to avoid any heteroscedasticity issue and thus to have robust standard errors clustered by country-pair.

Brazil, Germany, Egypt, Spain, Iran, Mexico, Pakistan, Turkey and South Africa are studied as exporter. The results indicate that the opinion about the influence of exporter country in the world (BBC-GlobeScan) has lower significant effect on exporters behavior than favorable and unfavorable opinion of exporter country felt by importing country (Pew).

I found that only the number of surviving entrants is significant relative to the other variables (mean exports per exporter, number of exporters, entrants, exiters and incumbents) with BBC-GlobeScan surveys (Table 5). A 1 % increase in the exporter's positive world influence, as perceived by the importers, is associated with a 0.15 % decrease in the number of surviving entrants in the importing countries. In other words, an improvement of influence of Brazil, Germany, Iran, Pakistan and South Africa in the world has a negative effect on the number of surviving entrants of these countries in the importing countries, on average. I suppose that the presence of Iran and Pakistan in the studied countries could undermine market access in some importing countries unfriendly towards these exporter countries, despite a better country image in the world. In order to test the particular role of these countries in the samples, I report the results obtained exclusively for Iran and Pakistan[10]. Table 6 shows that some counter-intuitive results persist, such as the improvement of country image leads to enhance the number of exiters and the increase in unfavorable opinion leads to improve mean exports per exporter.

The results with Pew surveys are more significant to assess the impact of soft power on exporters behavior in total trade, even if some variables are not significant (number of entrants, surviving entrants and mean exports per exporter). A 1 % increase in favorable opinion of exporter countries (Brazil, Germany, Egypt, Spain, Iran, Mexico, Pakistan, Turkey and South Africa), as perceived by the importers, increase in the number of exporters to 0.27 % in the importing countries. I found evidence that a good country image in importing countries leads to decrease the number of exiters thanks to an increase in favorable opinion (-0.39%). Moreover, an increase in unfavorable opinion of exporter countries increases in the number of exiters to 0.26% in the importing countries. There are the same findings for the number of incumbents with lower coefficients magnitude.

[10]I can not regress when I drop Iran and Pakistan due to the lack of observations, essentially for disaggregated data (Table 8 and Table 10). Note that none counter-intuitive results appear at the products level.

4.2. Soft power and exporters behavior in raw materials trade

For raw materials trade, only Iran, Pakistan and South Africa are retained as exporter in the sample due to the weak availability of variables in the Exporter Dynamic Database with BBC-GlobeScan survey results at this disaggregated level. With Pew data, only Egypt, Spain, Iran, Mexico, Pakistan and South Africa are studied as exporter. It is the same thing for manufactured goods in the next subsection. Once again, the results for BBC-GlobeScan are less significant than Pew surveys due to different countries studied in the respective samples (Table 7).

Indeed, a 1 % increase in the exporter's negative world influence, as perceived by the importers, is associated with a 1.46 % increase in the number of surviving entrants exporting raw materials in the importing countries. Nevertheless, note that the reverse effect is present for the number of incumbents exporting raw materials, i.e. -0.31 %. Due to the restricted countries in this sample, I suppose that the weight of natural ressources in raw materials exports affect the results. As suggested by Roth and Romeo (1992), country images are product specific, that is to say product category dimensions, such as prestige, owe their brand image to a strong country image for these product categories. More precisely, when strong dimensions for a product category is associated with a country's image, this is a match between a product category and country. Moreover, an improvement of the exporter's positive world influence leads to increase in 0.45 % the mean exports per exporter.

The economic magnitude of unfavorable opinion about exporter countries, felt by the importer countries, is higher than the favorable opinion. The number of exporters of raw materials would increase by 1,63 %, the number of exiters would increase by 2 % and the mean exports per exporter would increase by 5.61 %, when unfavorable opinion increases by 1 %. Note that this proxy of soft power is not statistically significant for the number of entrants and incumbents at this level.

4.3. Soft power and exporters behavior in manufactured goods

Very few variables of interest have significant effects for trade in manufactured goods, where no coefficient is statistically significant with Pew survey results (Table 9). Only two variables are significant with BBC-GlobeScan surveys where Iran, Pakistan and South Africa are the main studied exporter countries. A 1 % increase in exporter's negative world influence would increase by 0.09 % the number of exporters

in manufactured goods, against -0.07% when the exporter's positive world influence increases. This first unexpected result can be explained by the fact that a strong positive brand overrides negative country image effect for these countries, such as for petrochimical products. For instance, if a country has more reputable industries or brands this effect can overcome negative country images where firms adapt their behavior (Sun et *al.*, 2016). Then, despite a possible improvement of country image abroad, some partner countries are always hostile towards these countries due to the terrorism context and unilateral pressure of the US through sanctions in the cases of Iran and Pakistan. Furthermore, an improvement of 1 % of exporter's positive world influence would promote by 0.63 % the number of surviving entrants exporting manufactured goods, against -1.26 % when the exporter's negative world influence increases. Country images have a crucial impact on the success of exports because they affect the way people evaluate the quality of products but also affect their willingness to pay (Dichter, 1962 ; Roth and Diamantopoulos, 2009).

5. Conclusion

Does soft power affect exporters behavior in international trade? Yes. I find evidence that the two proxies used by Rose (2019), BBC-GlobeScan and Pew surveys, have significant effects on exporting firms, essentially for developping countries (Iran, Pakistan, Egypt, Mexico and South Africa) at the aggregate level of trade. The results are clearly less significant at the disaggregated level with a more restricted sample of countries. I also suppose that the concept of soft power would concern a very limited number of countries, particularly developed countries and some emerging countries. Nevertheless, some interesting findings could be retained in this paper. First, the country image through people's perception has significant effects on some micro-characteristics of exporters in total trade. Second, mean exports per exporter in raw materials would improve when the positive opinion on exporter countries, as perceived by the importing countries, increases on average. Third, the increase in unfavorable opinion by people in importing countries leads to enhance the number of exporters and exiters exporting raw materials.

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Table 1: Exporter Dynamic Database: some variables

Variables	Description
Exporter	Any firms that exports in year t
Entrant	A firm that does not export in year t-1 but exports in year t
Exiter	A firm that exports in year t-1 but does not export in year t
Incumbent	A firm that exports in both years t-1 and t
Survivor	A firm that does not export in year t-1 but exports in both years t and t+1

Source: World Bank.

Table 2: Exporter Dynamic Database: list of countries 1997-2014

Albania	Belgium	Burkina Faso	Bangladesh	Bulgaria
Brazil	Botswana	Chile	Cameroon	Colombia
Costa Rica	Dominan Republic	Ecuador	Egypt	Spain
Estonia	Guatemala	Iran	Jordan	Kenya
Cambodia	Kuwait	Laos	Lebanon	Morocco
Mexico	Macedonia	Mali	Mauritius	Malawi
Niger	Nicaragua	Norway	New Zealand	Pakistan
Peru	Portugal	Senegal	El Salvador	Sweden
Turkey	Tanzania	Uganda	Yemen	South Africa

Source: World Bank.

Table 3: Soft power survey questions

Source	Exporter (max)	Importer (max)	Period	Observations
BBC-GlobeScan	17	46	2006-2017	3439
Pew	27	64	2002-2017	2056

Source: Rose (2019).

Table 4: Descriptive statistics

Variables	Observations	Mean	Standard errors	Min	Max
Number of exporters	92308	268.79	1249.81	0	66158
Number of entrants	81930	100.79	385.32	0	19024
Number of exiters	74422	101.37	362.05	0	15996
Number of surviving entrants	64606	44.84	179.64	0	11899
Number of incumbents	81899	168.83	868.69	0	50162
Mean exports per exporter	73204	486293.3	2182994	1.21	142000000
BBC Globe Scan surveys					
Positive world influence (%)	557	35.57	20.62	1	89
Negative world influence (%)	557	33.05	20.81	2	88
Pew surveys					
Favorable opinion (%)	340	44.63	21.21	5	91
Unfavorable opinion (%)	340	39.15	21.27	6	86

Note: Statistics for raw materials and manufactured goods are available upon request. The number of observations concerning the proxies of soft power is the number of available data once merged with the Exporter Dynamic Database.

Table 5: Soft power and exporters behavior: effects on total trade

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	0.005	0.002	0.09
	(0.05)	(0.05)	(0.09)
% of negative world influence	-0.004	-0.03	0.01
	(0.02)	(0.03)	(0.08)
Observations	524	481	481
BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence	-0.15c	0.02	-0.25
	(0.08)	(0.05)	(0.19)
% of negative world influence	-0.02	0.01	0.15
	(0.05)	(0.04)	(0.13)
Observations	369	481	524
Pew surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of favorable opinion	0.27b	0.01	-0.39b
	(0.12)	(0.11)	(0.19)
% of unfavorable opinion	-0.0001	-0.05	0.26a
	(0.03)	(0.05)	(0.09)
Observations	233	215	215
Pew surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of favorable opinion	0.10	-0.14c	-0.13
	(0.22)	(0.08)	(0.39)
% of unfavorable opinion	-0.05	0.07a	0.13
	(0.11)	(0.02)	(0.32)
Observations	129	215	233

Note: Robust standard errors clustered by country-pair in parentheses with ^{a}, ^{b} and ^{c} respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time, importer-time and country-pair fixed effects with PPML estimator. Independent variables are in log.

Table 6: Soft power and exporters behavior: effects on total trade for Iran and Pakistan

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	0.04	0.13	0.20[b]
	(0.02)	(0.09)	(0.08)
% of negative world influence	-0.01	-0.12	-0.22
	(0.06)	(0.12)	(0.15)
Observations	188	165	165
BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence	0.10	0.02	0.28
	(0.08)	(0.02)	(0.27)
% of negative world influence	-0.14	-0.03	0.78[a]
	(0.15)	(0.05)	(0.28)
Observations	114	165	188

Note: Robust standard errors clustered by country-pair in parentheses with [a], [b] and [c] respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time, importer-time and country-pair fixed effects with PPML estimator. Independent variables are in log.

Table 7: Soft power and exporters behavior: effects on raw materials trade

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	0.02		-0.07
	(0.06)		(0.11)
% of negative world influence	-0.10		0.08
	(0.11)		(0.20)
Observations	1344		1065

BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence	-0.15	0.14	0.45b
	(0.39)	(0.10)	(0.18)
% of negative world influence	1.46c	-0.31b	-0.34
	(0.75)	(0.14)	(0.25)
Observations	228	1008	835

Pew surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of favorable opinion	-0.86a	0.65	-0.78
	(0.32)	(0.61)	(0.66)
% of unfavorable opinion	1.63a	1.45	2.009c
	(0.62)	(1.32)	(1.16)
Observations	218	160	132

Pew surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of favorable opinion		-0.22	2.43a
		(0.53)	(0.64)
% of unfavorable opinion		1.43	5.61c
		(1.58)	(3.06)
Observations		124	102

Note: Robust standard errors clustered by country-pair-product in parentheses with ^{a}, ^{b} and ^{c} respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time-product, importer-time-product and country-pair-product fixed effects with PPML estimator. Independent variables are in log. Some coefficients have not been estimated due to lack of observations.

Table 8: Soft power and exporters behavior: effects on raw materials trade for Iran and Pakistan

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	-0.01		0.07
	(0.08)		(0.13)
% of negative world influence	-0.41b		0.001
	(0.20)		(0.44)
Observations	758		624

BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence		0.22	0.30
		(0.16)	(0.19)
% of negative world influence		-0.36	-0.94a
		(0.36)	(0.29)
Observations		570	442

Note: Robust standard errors clustered by country-pair-product in parentheses with ^{a}, ^{b} and ^{c} respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time-product, importer-time-product and country-pair-product fixed effects with PPML estimator. Independent variables are in log. Some coefficients have not been estimated due to lack of observations.

Table 9: Soft power and exporters behavior: effects on manufactured goods

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	-0.07a	-0.04	0.008
	(0.02)	(0.03)	(0.03)
% of negative world influence	0.09c	0.02	0.01
	(0.04)	(0.07)	(0.07)
Observations	7188	6887	5835

BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence	0.63b		0.02
	(0.24)		(0.18)
% of negative world influence	-1.26b		-0.06
	(0.49)		(0.37)
Observations	776		4235

Pew surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of favorable opinion	0.18	0.19	0.14
	(0.16)	(0.22)	(0.18)
% of unfavorable opinion	-0.09	0.37	-0.25
	(0.31)	(0.41)	(0.39)
Observations	1034	816	596

Pew surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of favorable opinion		0.07	-0.38
		(0.25)	(0.43)
% of unfavorable opinion		-0.52	0.71
		(0.49)	(0.85)
Observations		440	456

Note: Robust standard errors clustered by country-pair-product in parentheses with ^{a}, ^{b} and ^{c} respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time-product, importer-time-product and country-pair-product fixed effects with PPML estimator. Independent variables are in log. Some coefficients have not been estimated due to lack of observations.

Table 10: Soft power and exporters behavior: effects on manufactured goods for Iran and Pakistan

BBC-Globe scan surveys	**Number of exporters**	**Number of entrants**	**Number of exiters**
% of positive world influence	-0.01	0.04	0.10c
	(0.04)	(0.06)	(0.05)
% of negative world influence	-0.24b	-0.42b	-0.07
	(0.11)	(0.17)	(0.18)
Observations	3768	3584	2804

BBC-Globe scan surveys	**Number of surviving entrants**	**Number of incumbents**	**Mean exports per exporter**
% of positive world influence			0.05
			(0.14)
% of negative world influence			-0.005
			(0.49)
Observations			1844

Note: Robust standard errors clustered by country-pair-product in parentheses with ^{a}, ^{b} and ^{c} respectively significance at the 1%, 5% and 10% levels. All regressions include exporter-time-product, importer-time-product and country-pair-product fixed effects with PPML estimator. Independent variables are in log. Some coefficients have not been estimated due to lack of observations.