

Drivers of Cross-national Variation in Advertising Spending: A Longitudinal Analysis of the Effects of Freedom and Foreign Direct Investment

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Abstract:

We examine the effects of freedom and foreign direct investment on ad spending. We also assess possible differential effects of foreign direct investment (FDI) on ad spending across economies with different income levels. We employed random effect time-series cross-sectional (TSCS) models linear in parameters for fifty economies using annual data from Euromonitor and other sources for the 2000–2013 period. We found that freedom and FDI have significant effects on ad spending. A theoretical contribution of this study to the literature consists in showing that macro-level environmental factors such as political freedom and FDI are crucial for understanding how firms allocate their ad spending to national markets. It also shows that the effect of FDI on ad spending is more salient in low income economies than in high income economies.

Keywords: Ad spending | Economic development | Political freedom | Foreign direct investment

Article:

1. Introduction

Economies worldwide differ greatly in the size of the advertising (ad) spending market. For instance, according to *Euromonitor International*, per capita ad spending in 2013 varied from US\$ 1.60 in Pakistan to US\$ 620.70 in Switzerland. While it is tempting to suggest that a country's income and ad spending are strongly related, factors other than income seem to explain a substantial proportion of the variation in ad spending. We illustrate this point below with a comparison of Saudi Arabia and Portugal. As shown in Table 1, Portugal's per capita ad spending is about three times higher than Saudi Arabia's notwithstanding a much lower income of the former compared to that of the latter. Similar relationships can be observed if we compare corresponding figures for Australia and Saudi Arabia, New Zealand and Saudi Arabia, or South Africa and Turkey.

Table 1. A comparison of per capita ad spending and other indicators in selected economies (2013).

Economy	Per capita ad spending across all media measured at PPP (US\$) (PCADPPP)	Per capita Foreign Direct Investment measured at PPP (US\$) (FDIPCPPP)	Gross domestic product (GDP) per capita at purchasing power parity (US\$) (GDPPPP)	Civil liberties index (1 highest and 7 lowest level of freedom)
Australia	519	2157	42,831	1
New Zealand	326	220	32,807	1
Bahrain	31	814	42,428	6
Saudi Arabia	19	317	52,067	7
Portugal	57	296	25,595	1
South Africa	64	155	12,105	2
Turkey	36	170	18,660	4

Most obviously, at the country level, income is an important determinant of ad spending. This is because a country's "economic wealth" positively influences mass media spending by consumers as well as by advertisers (Chan-Olmsted et al., 2008, p. 198). To be sure, a marketer wants reassurance that its ad spending translates into increased demand, profit and economies of scale (Bagwell and Ramey, 1994; Beard, 2011; Doyle, 1968; Nelson, 1974; Ramrattan and Szenberg, 2006). This means that advertisers are less likely to present their messages for society or consumer groups that are not prepared for their products (Branchik and Chowdhury, 2013). As the above remarks suggest, however, the income–ad spending relation leaves a substantial amount of variation unexplained. This gap can be attributed to the limited attention of researchers to the role of macro-level environmental factors such as political institutions and competition on marketing (Layton and Grossbart, 2006). In light of the above discussion, this article seeks to explain country differences in ad spending that are not explained by the dominant factor: per capita income. More specifically, we focus on freedom and foreign direct investment related factors that account for the cross-country variability in ad spending. In what follows below, the relevant literature is discussed in turn.

The issue of cross-national variation in ad spending is a critical but little-examined problem in international marketing. There exist at least four research gaps. First, while there is some exploratory, qualitative and practitioner-oriented multi-country research on advertising and related marketing activities (e.g., Kitchen and Schultz, 1999; Macleod, 2009a, 2009b; Nelson and Paek, 2007), empirical studies that include a large number of diverse countries are lacking. Second, despite a vast and growing body of literature on related concepts such as integrated marketing communications (IMC) (Kitchen and Schultz, 1999), media industry (Dutta and Roy, 2009) and penetration of various media (Buchner, 1988), there is a lack of research that explicitly focuses on ad spending. Third, while there are convincing arguments that formal and informal institutions influence all economic (North, 1996; Parto, 2005) and marketing (Upadhyaya et al., 2013; Viswanathan et al., 2013) activities, studies dealing with such institutions' impact on ad spending, especially empirical ones, are conspicuously absent from

cross-country studies on advertising. Fourth, while scholars have paid some attention to the effects of factors such as income and FDI on the development of advertising and related industries, they have overlooked the ways in which the magnitudes of the effects of these factors differ across economies with various levels of market development.

The aim of this article is to contribute to filling these research gaps. This paper builds on the ideas of Nobel Laureates, Amartya Sen, Friedrich Hayek and Oliver E. Williamson, suggesting that marketing activities, development and freedom are closely intertwined (e.g., Hayek, 1944; Sen, 1999; Williamson, 1968). We extend these ideas and logic and combine with theories and concepts developed in international marketing and related areas to extend our understanding of the factors that are likely to drive ad spending.

This paper has two objectives. The first is to examine factors that represent development, freedom and market openness such as political freedom and FDI that drive ad spending. The second objective of this study is to assess possible differential effects of FDI on ad spending across economies with different income levels.

In the remainder of this article, we first provide a literature review and develop some hypotheses. Following that is a section on methods. Then, we discuss the results. The final section provides conclusion and implications.

2. Literature review and hypotheses development

2.1. Political freedom and ad spending

An Advertising Executive and Copy Writer noted that advertising is the “essence of democracy” (Carter, 1997). Economies with stable democratic institutions are characterized by a higher media penetration and freedom of the press and of speech and consumers' media literacy, where the efforts to control advertisements are viewed as an infringement on the freedom (Lewis and Jhally, 1998; Martinson, 2005). In authoritarian regimes, on the other hand, there is no unfettered access to media for advertisers. For instance, despite its economic prosperity, Singapore ranks near the bottom on the Reporters without Borders' index of press freedom. In 2006, Singapore banned distribution of Far Eastern Economic Review magazine, arguing that it had not complied with media regulations (Agence France Presse, 2007). In 2008, the country's Media Development Authority fined a TV operator for a commercial that showed lesbians kissing. Likewise, the Chinese athletes participating in the 2008 Olympic Games faced difficulties to gain TV advertising deals. Chinese government officials proposed to ban athletes' engagement in advertising and public relations. In 2005, an athlete, who won gold medals in diving in the 2000 and the 2004 Olympics, was dismissed from the national diving team. He was accused of not asking for permission for engaging in commercial activities. China's regulations introduced in 2002 also threatened to fine or shut down Internet publishers and portals disobeying the state's guidelines. Portals and search engines, which did not follow the guidelines, were banned. Contrast these situations with the U.S., where interest groups such as the American Association of Advertising Agencies have promoted “constitutional protection for commercial speech” and there have been arguments regarding commercial entities' free speech (Baker, 2004). For

instance, firms in the U.S. tobacco industry are capitalizing on the “free speech” arguments to influence public policy related to advertising.

Businesses' ad spending is associated with and facilitated by the spread of western consumer cultures (e.g., Gao, 2013), which is a phenomenon more likely to occur in economies characterized by liberal social and political regimes (Fitchett and Shankar, 2002). Economies ruled by authoritarian regimes, which lack freedom (e.g., Belarus), however, tend to be isolated from the Western market economy and the democratization process (Kuznetsov and Yakavenka, 2005; Miazhevich, 2007). In a study of Islam Karimov's authoritarian regime in the post-Soviet Uzbekistan, March (2003) noted a political hostility toward foreign advertising. The hostile attitude relates to discourses against Western consumer culture, which was perceived as an ideological threat. A court ruling against commercials of Western brands noted: “A squall of mass pseudo-culture is presently raining down on the Republic, which is directed at vulgar needs, an aggression at the base of which lie the interests of production and consumption” (Dzhuraev, 1999, p. 4).

More broadly, marketing activities are promoters of economic democracy (Williamson, 1968). Studies have found that economic freedom and political freedom “typically go hand in hand” and are highly correlated (La Porta et al., 2004). In China, for instance, it is difficult to get advertising licenses, especially for foreign-invested enterprises; and companies can advertise only products within approved business scopes (Stevenson-Yang, 2006). While the ultimate goal of advertising is to persuade potential consumers to buy a product, such a goal is difficult to pursue in authoritarian regimes.

There are various types of capitalism. Capitalism in less sophisticated markets is more likely to be state-directed or oligarchic (Baumöl et al., 2007). State-owned firms place a higher emphasis on political and social goals rather than on market share and profits. Authoritarian regimes tend to view ad spending as “excessive and harmful” (Leff and Farley, 1980, p. 64). Millan and Elliott (2004) observe: “During the decades of central planning prior to 1989, the role of advertising in Bulgaria, as in most of the countries of Eastern Europe, was very limited” (p. 475). Likewise, politically connected oligarchs do not face much competition and thus have less incentive to advertise. Based on above discussion, the following hypothesis is presented:

H1. *Ceteris paribus, freedom (lack of freedom) has a positive effect (negative) on per capita ad spending.*

2.2. Foreign direct investment (FDI) and ad spending

FDI is defined as an investment by foreigners in productive assets. Prior researchers have recognized that FDI plays an important role in driving ad spending. One mechanism that might contribute to the growth in ad spending is through FDI's “positive spillovers on the media sector” (Dutta and Roy, 2009; p. 240). For instance, Hungary's advertising industry developed rapidly after the country opened its market to FDI (Wilson and Amine, 2009). Likewise, the reinstitutionalization of advertising started in China following the 1978 economic and political liberalization, which mainly showcased foreign brands in the beginning, many of which were not even available in the country (Gao, 2013).

From the standpoint of marketing, there is a contrast between local firms and MNCs. While local firms tend to focus on price competition, MNCs spend on expensive ad campaigns and devote more resources to promote their products and establish global brands (Caves, 1982; Ray and Rahman, 2006). This is because globalizing companies with heavy ad spending can create intangible assets such as brand equity that give them a relative advantage over local rivals (Kogut and Singh, 1988; Morck and Yeung, 1991). For MNCs, advertising has been one of the cornerstones to build a uniform global brand image (Duncan and Ramaprasad, 1995).

As another mechanism, Cowling and Tomlinson (2005) suggested that MNCs divert competition away from price toward product/advertising where “retaliatory lags” are longer. For instance, in the automobile industry, Japanese automobile firms (Cowling and Sugden, 1989) and Volkswagen (Kiley, 2007) employed this strategy, which arguably worked (Cowling and Tomlinson, 2005). In this way, a high level of ad spending can elevate entry barriers (Ray and Rahman, 2006).

Although it is easy to see why MNCs possess a stronger propensity to advertise, evidence from international business (Tahir and Larimo, 2004) and technology management (Cheung and Lin, 2004; Hoekman et al., 2005) literatures suggests that they can also operate in the stimulation of ad spending. MNCs' operations in an economy, for instance, also lead to a cross-border transfer of marketing skills and technologies enabling advertising (Tahir and Larimo, 2004). Using provincial data, Cheung and Lin (2004) found demonstration effects of FDI on local companies' innovations in China. Note that demonstration effects arise if the observation of foreign advertisers affects local companies' advertising. Likewise, some channels of technology transfer from MNCs to local firms such as labor turnover and movement of people (Hoekman et al., 2005) are equally applicable for advertising.

For one thing, compared to local firms, developed world-based MNCs possess skills and resources needed for effective advertising (Caves, 1982; Ray and Rahman, 2006; Riordan, 2007). For instance, advertising/sales ratio, which is often used as a proxy to measure firm-specific advantages (Delios and Beamish, 2001) is higher for MNCs compared to local firms. Moreover, when industrialized world-based firms invest abroad, transnational advertising agencies tend to expand to host countries to service their home clients. For instance, global agencies such as Leo Burnett's, Ogilvy & Mather, Bates Asia and Euro serve a number of big Chinese firms (Cheung et al., 2008). Thus:

H2. *Ceteris paribus, per capita FDI inflow has a positive effect on per capita ad spending.*

2.3. FDI and ad spending in economies with different income levels

We start by emphasizing that firms' marketing efforts are directed toward responding to the market needs and wants and solving problems faced by the customers (Kurtzman, 1997). Looking from this perspective, the goals of firms' marketing actions such as advertising are to stimulate primary demands (Bharadwaj et al., 2005; Hanssens, 1980). Their marketing efforts and actions are more likely to be successful and yield the desired outcome if the customers possess ability and willingness to purchase the products.

Foreign companies have a potentially more influential role to play in low income economies than in high income economies. At a broader level of analysis, results from marketing studies conducted in post-socialist economies of Central Europe (Coulter et al., 2003) and China (Dong and Tian, 2009; Gao, 2013) have indicated that Western brands are viewed as instruments and symbols of economic and political freedom, voice, choice and power. These brands have played a crucial role in spreading capitalism and increasing democratic freedoms (Dong and Tian, 2009). Likewise, regarding the factors associated with the stimulation of ad spending such as cross-border transfer of marketing skills and technologies, demonstration effects, labor turnover and movement of people (Hoekman et al., 2005; Tahir and Larimo, 2004), one might expect stronger effects in low income economies than in high income economies.

Next, the “retaliatory lags” discussed in the previous section for advertising is likely to be longer in low income economies. As noted earlier, local firms lack resources and expertise to compete against MNCs' ads (e.g., Ho and Sin, 1986; Wang, 1988). Moreover, in low income economies, MNCs spend less in product innovations (Cowling and Tomlinson, 2005), which may translate to a higher ad spending.

In addition, FDI also indirectly influences ad spending in low income economies. Previous research on Finnish firms in Asian countries indicated that FDI also triggers modern marketing activities by facilitating cross-border transfers of marketing skills and technologies, political transformation, economic and industrial development, and by promoting a market economy (Tahir and Larimo, 2004). It can be argued that such effects are likely to be higher in low income economies, where the MNC-local firm difference in skills and resources are more substantial (Ray and Rahman, 2006). For instance, while local firms in China traditionally heavily relied on tactical advertising (Madden, 2004), they have quickly adopted western business practices and have built up their marketing teams by attracting employees from MNCs (Business Week, 2004). Foreign MNCs thus have a more powerful impact in stimulating the advertising cultures locally in low income economies (Cheung and Lin, 2004).

The advertising/sales ratio, a proxy to measure firm-specific advantages, tends to be higher for MNCs compared to local firms (Caves, 1982; Delios and Beamish, 2001; Ray and Rahman, 2006). The differences between local firms and MNCs, however, are likely to be higher in LDM than in MDM. MNCs and local firms often focus on different market segments in economies in low income economies. Schultz (2006) observed: “There was sophisticated marketing in places like Sao Paulo, Shanghai, Santiago and Bucharest. But at the same time, unsophisticated, almost primitive markets and marketing existed just outside the city centers: BMWs and horse-drawn carts, both competing for the same roadway.” While MNCs such as BMW spend heavily in advertising, the horse-drawn cart manufacturers are likely to advertise considerably less. Local firms and entrepreneurs in low income economies tend to rely more on informal institutions for marketing and other business-related activities (Viswanathan et al., 2013).

Finally, while MNCs mostly operate legitimately in low income economies, family and clan based informal networks, which do not follow the rule of law, account for a significant proportion of the economy (Giatzidis, 2007). Illegitimate businesses tend to avoid media attention and thus prefer to advertise less (Ognianova, 1997). In sum, the level of ad spending in

economies in low income economies is mainly determined by the presence or absence of MNCs. FDI thus tends to be a better predictor and a more important source of variation of ad spending across economies in low income economies than in high income economies.

The above leads to the following:

H3. *The effect of FDI on ad spending is higher in low income economies than in high income economies.*

2.4. Concluding hypothesized relationships

From the above discussions it should be noted that the major hypotheses concerning the drivers of per capita ad spending are: (1) it is positively (negatively) related to freedom (lack of freedom); (2) it is positively related to per capita FDI inflow; and (3) the effect of FDI is higher in low income economies than in high income economies.

3. Method

Our unit of analysis is a national economy. This means that we examine the effects of the independent variables on the dependent variable at the national level rather than at the level of the individual organization. Furthermore, the effects are examined for the sample of all economies, as well as separate samples of high income and low income economies.

3.1. Dependent and independent variables

The dependent variable used in the analyses is per capita ad spending across all media measured at PPP (PCADPPP). The dependent variable and independent variables are explained in Table 2.

Table 2. Dependent, explanatory and control variables used in this study.

Variable	Explanation	Remarks
Gross domestic product (GDP) per capita at purchasing power parity (GDPPPP)	GDP is “the sum of gross value added by all resident producers in the economy plus any product taxes and minus any subsidies not included in the value of the products.” In order to convert into PPP US dollars, relative purchasing power of a country's currency for different goods and services is taken into account.	Euromonitor Passport GMID (Global Market Information Database)
Per capita ad spending across all media measured at PPP (PCADPPP)	The amount spent on advertising across various channels, such as print, TV, radio, cinema, online and outdoor. Usually, the figures exclude agency commission and production costs. In general, the figures are compiled by an independent body with surveys conducted across advertisers, advertising agencies and media owners. The figures are converted into PPP US dollars by using the PPP conversion factors for corresponding year and divided by the population.	Euromonitor Passport GMID (Global Market Information Database)

Per capita Foreign Direct Investment measured at PPP (FDIPCPPP)	Foreign Direct Investment (FDI) inflows are “the net value of inward direct investment made by non-resident investors in the reporting economy, including reinvested earnings and intra-company loans, net of repatriation of capital and repayment of loans.” The figures are converted into PPP US dollars by using the PPP conversion factors for corresponding year and divided by the population.	Euromonitor Passport GMID (Global Market Information Database)
Civil Liberties index (CL)	The civil liberties index measures countries in a reverse scale, the freedom to express, to debate, to assemble, to demonstrate, to form association, and to practice religion. A country is assigned a numerical rating (1 to 7) (1: most free, 7: least free)	Freedom House (2015).

3.2. Data sources

Data related to ad spending, GNPPC and FDIPC were obtained from the online database of *Euromonitor Passport Global Market Information Database (GMID)*. We accessed the data in January 2015. Our sample includes fifty economies as shown in Table 3 for which data on dependent and independent variables were available. Table 4a–c presents descriptive statistics and the correlation matrix for the dependent and independent variables. To test for multicollinearity, we calculated the variance inflation factors (VIF) for all variables. The highest VIF is 1.29, showing no indication of multicollinearity.

Table 3. List of economies used in the analyses.

Australia	Costa Rica	Ireland	Norway	Slovenia
Austria	Czech Republic	Israel	Pakistan	South Africa
Bahrain	Denmark	Italy	Peru	Spain
Belgium	Estonia	Japan	Philippines	Sweden
Brazil	Finland	Latvia	Poland	Switzerland
Bulgaria	France	Lithuania	Portugal	Thailand
Canada	Germany	Malaysia	Qatar	Turkey
Chile	Greece	Mexico	Romania	United Kingdom
China	Hungary	Netherlands	Saudi Arabia	Uruguay
Colombia	India	New Zealand	Singapore	Vietnam

Table 4. (a) Descriptive statistics for all economies (N = 650). (b) Descriptive statistics for the sample of high income economies (N = 364). (c) Descriptive statistics for the sample of low income economies (N = 286).

	Mean	S.D.	Correlation Matrix		
			PCADPPP	FDIPCPPP	CL
(a)					
PCADPPP	153.04	110.07	1		
FDIPCPPP	777.77	1811.02	0.32	1	
CL	2.23	1.58	-0.47	-0.18	1
(b)					
PCADPPP	225.35	91.91	1		

FDIPCPPP	1285.96	2289.57	0.14	1	
CL	1.82	1.53	-0.42	-0.08	1
(c)					
PCADPPP	60.99	40.59	1		
FDIPCPPP	130.97	205.49	0.39	1	
CL	2.77	1.47	-0.34	-0.48	1

It is worth noting that there are five major constraints related to the use of any international secondary data: accuracy, age, reliability, lumping and comparability (Kotabe, 2002). Kotabe (2002) argues that *Euromonitor*, despite its reliance on various sources, addresses the first four constraints. Regarding comparability, this constraint is mainly a consequence of a lack of a common and shared understanding of a concept (e.g., social capital) across countries (Harper, 2002). This problem is compounded by the different languages used in the surveys. Since the data used in this article represent actions rather than attitude, feeling, or intention, and have straightforward operationalizations, international comparability does not seem to be a problem. Prior researchers have used *Euromonitor* data in a number of studies (e.g., Blecher, 2010; Coulter et al., 2003; Kshetri et al., 2007; Kopf et al., 2011; Kshetri and Bebenroth, 2012; Kshetri et al., 2014).

Data on civil liberty index were obtained from the Freedom House's Annual Surveys of Political Rights and Civil Liberties. As is the case with *Euromonitor* data, researchers have used Freedom House's political freedom related data (e.g., Diamond, 1992; Goldsmith, 1999).

3.3. Statistical analysis

3.3.1. Time-series cross-sectional (TSCS) models

We employed TSCS models to analyze the data. We analyzed annual data for fourteen years (2000–2013). TSCS models are designed to overcome the limitations of usual linear models. It is likely that pooled data may violate one or more assumptions of the usual linear model. Fomby et al. (1984, 337) point out several such possibilities. First, the error terms in a pooled model may be “heteroscedastic, autocorrelated, and may exhibit contemporaneous correlation,” which make generalized least squares techniques inappropriate. Second, the parameters of the data-generating process may differ from observation to observation. The reactions of different individuals may be different to changes in explanatory variables and the reactions may also change over time. TSCS models allow for differences in behavior over cross sectional units and also for differences in behavior over time for a given cross section. In this way, such models are likely to be consistent with the way the data were generated (Fomby et al., 1984). Problems related to such models include the selection of the most efficient estimation procedures and testing of hypotheses about the parameters.

We employed TSCS models in the following form:

$$PCADPPP_{it} = \beta_{1it} + \sum_{k=2}^K + \beta_{kitt}x_{kit-1} + \varepsilon_{it} \quad (1)$$

where,

PCADPPP=per capita ad spending

β_{1it} is the dummy variable for the i^{th} country for the t^{th} time period and β_{kit} ($k \geq 2$) are the slopes. X_{kit-1} ($k \geq 2$) is the value of the predictor X_k for the i^{th} country in time $t-1$.

Several factors need to be taken into consideration in selecting the best TSCS model. The first is the choice between fixed and random effect models. For the fixed effect (or dummy variable) model, the intercept term β_{1it} in (1) can be written as

$$\beta_{1it} = \alpha_i + \tau_t \quad (2)$$

where α_i are the country “dummies” and τ_t are the time “dummies.” The dummy variable model, however, eliminates a major portion of the variation among explained as well as explanatory variables if the between-country and between-time period variation is large. Additional problems include a loss in a substantial number of degrees of freedom and a lack of meaningful interpretation of the dummy variables (Maddala, 1971).

These problems can be overcome by treating α_i and τ_t as random in which case only two parameters corresponding to each, the mean and the variance of the α 's (and similarly for τ 's), are estimated instead of $N + T$ parameters in dummy variable models, where N is the number of cross-sections and T is the number of time periods. The procedure of treating α_i and τ_t as random can be rationalized by arguing that the dummy variables do in effect represent some ignorance – just like ε_{it} . Maddala (1971) argues that this type of ignorance, or “specific ignorance,” can be treated in the same manner as ε_{it} . Therefore, the residual can be written as:

$$u_{it} = \alpha_i + \tau_t + \varepsilon_{it} \quad (3)$$

We estimated Eq. (1) using random effects models.

4. Results and discussion

TSCS results are displayed in Table 5. Independent variables have been lagged by one year. As noted earlier, conventional measures of R^2 are inappropriate for TSCS models (SAS Institute Inc, 1999, 1136). We thus did not report R^2 values for the TSCS models. In addition, we estimated OLS models for the 2013 data with PCADPPP as the dependent variable (Table 6).

Table 5. TSCS analysis (2000–2013 data, dependent variable: PCADPPP).

	Tadppp 1	Tadppp 2 High income	Tadppp 3 Low income	Tadppp 4	Tadppp 5 High income	Tadppp 6 Low income
L.FDIPCPPP	−0.000 (0.25)	−0.000 (0.42)	0.018 (3.08)**	−0.001 (1.10)	−0.001 (0.58)	0.000 (0.05)
L.CL	−12.58 (3.65)**	−14.22 (2.47)*	−5.81 (2.72)**	−8.95 (2.59)**	−14.16 (2.46)*	−2.41 (1.09)

L.GDPPCPPP				0.002 (5.32)**	0.001 (0.97)	0.002 (4.27)**
Constant	181.32 (12.74)**	251.82 (14.26)**	74.70 (7.71)**	115.93 (6.42)**	229.88 (7.98)**	39.42 (3.29)**
N	650	364	286	650	364	286

*p < 0.05; **p < 0.01. The numbers in the parentheses are the t-values.

Table 6. OLS results for 2013 data, dependent variable: PCADPPP.

Variable	B _{low}	B _{High}	SE _{low}	SE _{High}	B _{low} – B _{High}	SE(B _{low} – B _{High})	t
FDIPCPPP2013	0.154*	-0.007	0.066	0.021	0.16	0.002	-67.13
CL2013	2.39	-68.17**	3.553	18.854	70.56	184.049	-0.38
GDPPCPPP2013	0.001	0.003	0.001	0.002	-0.002	0.000003	800
Constant	-4.628	227.18	19.91	63.118			
R ²	.502	.354					
N	22	28					

*p < 0.05; **p < 0.01.

Hypothesis 1 predicted that freedom positively affects PCADPPP. The TSCS results (Table 5) provide strong support for H₁. We also tested this hypothesis separately for high income countries (Model 2, Table 5) and low income countries (Model 3, Table 5). We found that lack of freedom has a negative and significant effect on PCADPPP for both groups of economies, supporting hypothesis 1. We also estimated the models with GDPPPPP as a control variable. Similar results have been obtained for all countries and high income countries (Model 4 and 5, Table 5). However, the effect of LACKCL on PCADPPP failed to reach the significance level for low income countries (Model 6, Table 5).

Overall, the negative effect of lack of freedom on ad spending may suggest that less free economies do not provide open support for marketing-related activities such as advertising and promotions. Whereas prior researchers have noted the absence of formal institutions in subsistence contexts (e.g., Viswanathan et al., 2013), our results indicate that the barrier to the growth of ad spending in less free economies seems to be centered around the unfavorable orientation of formal institutions to advertising rather than the lack of such institutions.

A related explanation could be that the levels of advertising effectiveness that can be obtained may vary in economies with different levels of freedom. Put differently, countries with high and low levels of freedom offer different levels of incentives to spend on advertising. Through a mathematical model, Wright (2009) showed that optimal ad spending is positively related to advertising elasticity or advertising effectiveness. Thus another explanation for the higher ad spending in more free countries could be that advertising is likely to be more effective in these countries because businesses and consumers have greater freedom.¹

Hypothesis 2 predicted that FDIPCPPP positively affects PCADPPP. The TSCS results in Table 5 indicate that this hypothesis is supported for low income economies but not in high income economies and not for all economies. Hence, hypothesis 2 is partially supported. We have similar results for the OLS model for the year 2013. However, in models with GDPPPPP as a control variable, the effect of FDIPCPPP on PCADPPP failed to reach the significance level.

A comparison of Model 2 and Model 3 in Table 5 also indicates that the coefficient of FDIPCPPP is higher for low income economies than for high income economies. Moreover, FDIPCPPP has a significant effect on for low income economies but the effect is insignificant for high income economies. Similar results have been obtained in models with GDPPPP as a control variable as well as the OLS model for the year 2013. We also tested hypotheses of equality of OLS regression coefficients for the 2013 data for high and low income countries by using the following test:

$$t = \frac{\beta_{low} - \beta_{high}}{SE(\beta_{low} - \beta_{high})} \quad (4)$$

where, $SE(\beta_{low} - \beta_{high}) = \sqrt{\text{var}(\beta_{low}) + \text{var}(\beta_{high}) - 2\text{cov}(\beta_{low}, \beta_{high})}$ and $\text{cov}(\beta_{low}, \beta_{high}) = 0$

As the results in Table 6 indicate, β_{low} corresponding to FDIPCPPP is significantly greater than β_{High} corresponding to the same variable. Overall the results provide strong support for the hypothesis (H₃) that the effect of FDI on ad spending is higher in low income economies than in high income economies.

5. Conclusion and implications

The parsimonious framework used in this paper captures cross-country differences in ad spending and examines the facilitators and inhibitors of ad spending. We found that economic (FDI) and institutional (freedom) factors are associated with ad spending. This means that the availability of ‘targettable’ consumers, the existence of marketers with strong advertising propensity and regulative environment conducive to advertising and media freedom provide a fertile ground for the growth of ad spending.

We have contributed to the literature by integrating findings from a variety of social science domains including marketing, sociology, economics, media, political science, communication, international business, and development studies to understand the sources of cross-country variation in ad spending. Employing literature from these areas and using a large dataset, we showed that freedom and FDI are linked to ad spending. The theory presented in this paper has extended, refined and validated past research on cross-national advertising in three ways: first, unlike past studies, which were limited to a small set of countries (Kitchen and Schultz, 1999; Kshetri et al., 2007; Macleod, 2009a, 2009b; Nelson and Paek, 2008), we used data from 50 economies with diverse geography, culture, political and regulatory structures to theoretically and empirically investigate factors that contribute to ad spending. In this way, we also responded to the call for empirical cross-national research on advertising (Taylor, 2005).

Another important contribution of this study is to highlight how the relationship between FDI and ad spending is contingent on the level of economic development. For instance, we found that while FDI has a significant effect on ad spending in low income countries, the effect is insignificant in high income countries. Reasoning and justification have been provided for the differential impacts such potentially higher cross-border transfer of marketing skills and

technologies, higher demonstration effects, higher rates of labor turnover and movement and longer retaliatory lags associated with FDI in low income economies than in high income economies.

The findings reported in the paper may have important public policy implications. More than fifty years ago, Fatt (1967, p. 61) noted: “Advertising is not only helping to break down national economic boundaries, but ingrown characteristics and traditions once considered almost changeless.” For instance, corporate communications in the form of ads often provide valuable information and help promote a healthy and a vibrant economy. In addition, ads help support mass media's non-advertising contents, which would help in framing the popular discourse of public sphere and civil society (Baker, 2004).²

Our findings suggest that FDI is positively related to ad spending in low income economies. One way to develop the local advertising industry for a developing economy is thus to provide a favorable climate for FDI. FDI in the advertising sector may have an even bigger impact on the local ad spending. As noted earlier, transnational advertising agencies tend to expand to the host country to serve their home clients (Cheung et al., 2008). The host country can also expect additional benefits such as those associated with the creation of forward and backward linkages, labor mobility and stimulation of knowledge and technology transfer to local firms (Markusen and Venables, 1999). For instance, transnational advertising agencies can serve local customers (forward linkages) and provide employment (backward linkages). Likewise, as in the case in China, local companies can learn western business practices and build up their marketing teams by attracting employees from MNCs.

As reflected by relatively higher per capita ad spending than most economies (Table 1), major Australiasian economies such as Australia and New Zealand have very competitive environment from the standpoint of advertising. This means that advertisers need to come up with sophisticated and creative advertising strategies to target these markets. This environment is different from that in authoritarian regimes such as Bahrain and Saudi Arabia where advertisers may put relatively less emphasis on sophistication and creativity, and advertisements are expected to be less Western looking. The above discussion of advertising in the post-Soviet Uzbekistan supports this view.

5.1. Limitations and future research

Several limitations of this research must be recognized in a balanced discussion of its findings. First, in general, incomplete or missing data have been a major challenge in most data sources related to international marketing including *Euromonitor* (Kotabe, 2002). In the context of this paper, missing data have been a problem mostly for least developed countries. Because of the unavailability of data, the approach used in this paper did not allow us to explore the advertising industries of economies that are at the bottommost of the global economic pyramid. As is the case with most other economic indicators, *Euromonitor* database does not contain ad spending data on many developing economies, especially the least developed ones. A further limitation is that the linearity assumption may not hold true.

An additional limitation is that the dependent and independent variables used are country-level (instead of firm-level) measures. Data aggregated at the country level may hide significant inter-firm variations in ad spending. A related point is that this study does not capture the drivers of intra-country variance (e.g., across economic sectors and regions in a country) in ad spending.

The model and perspective developed here suggests many exciting directions for future research. First, as noted above, in our analysis, we could not include the least developed economies. However, as these economies develop and become more attractive markets, international research firms may collect standard marketing data on these economies. Future research thus will need to include economies at the bottommost of the global economic pyramid such as the least-developed countries designated by the United Nations.

Whereas econometric models are helpful in generalizing, there is very little “room for artful and exciting insights” in such models (DiMaggio, 1995). Additional research is also needed for in-depth analysis of advertising industries in selected economies. Economies with less sophisticated markets, especially those in transition, might be worthwhile targets of study. We recommend analyses of longitudinal patterns of ad spending of an economy by using historical methods (Smith and Lux, 1993) or in a number of economies by using comparative historical analysis (Mahoney, 2004). Historical methods require gathering evidence from multiple sources to identify, explain and interpret the process associated with ad spending and address historical, socio-cultural, attitudinal issues. The associated historical phenomena can be divided into two categories: “things that change” or discontinuous factors and “things that stay the same” or continuous factors (Smith and Lux, 1993, p. 597).

We found that FDI is associated with ad spending and that the relationship between FDI and ad spending are contingent on the level of market development. The FDI effect on ad spending of a host country, however, may also be a function of the nature (e.g., freedom, the level of economic development, ad spending) of source and host countries. In future conceptual and empirical work scholars need to compare and contrast various combinations of source and host countries in terms of such effects.

One extension of the present work is also to use primary quantitative and/or qualitative data collected at the firm-level to investigate how foreign and domestic companies in an economy differ in terms of their orientation towards advertising. Future research might also explore such differences across host and source countries at different levels of economic development and political conditions.

Finally, one issue that was raised in this article but not fully developed was the transfers of skills and technology related to advertising from MNCs to local firms. In this regard, another intriguing avenue for future research is to examine the contexts, mechanisms and processes associated with such transfers and the development of advertising cultures in the local economy.

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