# Демонстрационный вариант и методические рекомендации по направлению «Менеджмент»

Профили:

«Маркетинг»

«Маркетинговые коммуникации и реклама в современном бизнесе»

«Стратегическое и корпоративное управление»

«Управление проектами: проектный анализ, инвестиции, технологии реализации» «Управление человеческими ресурсами»

«Экономика впечатлений: менеджмент в индустрии гостеприимства и туризме»

# ДЕМОНСТРАЦИОННЫЙ ВАРИАНТ

# Время выполнения задания – <u>180</u> мин.

Выберите и выполните <u>только один</u> из блоков заданий специальной части в соответствии с выбранной вами программой магистерской подготовки.

#### Блок І. «Маркетинг»

# Прочитайте статью<sup>1</sup> и сделайте ее критический анализ на русском языке.

Marketing research, the set of methods to collect and draw inferences from market-level customer and business information, has been the lifeblood of the field of marketing practice and the focus of much academic research in the past 30-plus years. Simply put, marketing research, the methods that surround it, and the inferences derived from it have put marketing as an academic discipline and as a functional area within the firm "on the map." Although these methods are here to stay, the radical changes resulting from the Internet and user-generated media promise to fundamentally alter the data and collection methods used to perform these methods.

In this study, we propose to harness the growing body of free, unsolicited, user-generated online content for automated market research. Specifically, we describe a novel text-mining algorithm for analyzing online customer reviews to facilitate the analysis of market structure in two ways. First, the VOC, as presented in user-generated comments, provides a simple approach to generating and selecting product attributes for market structure analysis. In contrast, traditional methods rely on a predefined set of product attributes (external analysis) or *ex post* interpretation of derived dimensions from consumer surveys (internal analysis). Second, the preponderance of opinion, as rep- resented in the continuous stream of reviews over time, provides practical input to augment traditional approaches (e.g., surveys, focus groups) for conducting brand sentiment analysis and can be done (unlike traditional methods) continuously, automatically, inexpensively, and in real time.

Our focus on market structure analysis is not by chance but rather due to its centrality in marketing practice and its fit with text mining of user-generated content. Analysis of market structure is a key step in the design and development of new products as well as the repositioning of existing products (Urban and Hauser 1993). Market structure analysis describes the substitution and complementary relationships between the brands (alternatives) that define the market (Elrod et al. 2002). Thus, if automated in a fast, inexpensive way (as described here), it can have a significant impact on marketing research and the decisions that emanate from it.

<sup>&</sup>lt;sup>1</sup> На основе статьи Thomas Y. Lee and Eric T. BradLow Automated marketing research using online customer reviews Journal of Marketing Research Vol. XLVIII (October 2011), 881–894.

In market structure analysis approaches vary by the type of data analyzed (e.g., panel-level scanner data, aggregate sales, consumer survey response) and by the analytic approach (Elrod et al. 2002). Regardless of an internal or external approach, with few exceptions, market structure analysis begins with a pre-determined set of attributes and their underlying dimensions, the same set of survey or transaction sales data, and assumes that "all customers perceive all products the same way and differ only in their evaluation of product attributes" (Elrod et al. 2002, p. 229). In this study, we visualize market structure by applying correspondence analysis (CA) to product attributes mined from the VOC.

# **METHODOLOGY**

Figure 1 summarizes our approach. We review the entire process here in a high-level way because many of these techniques are new to the marketing audience. The process begins with a set of online reviews in a product category over a specified time frame. For example, here, we consider the reviews for all digital cameras available at Epinions.com between July 5, 2004, and January 1, 2008. Figure 1, Step 1, shows three reviews: one each for cameras manufactured by Olympus, Hewlett-Packard (HP), and Fuji. In Step 2, screen scraping software automatically extracts details from each review, including the brand and explicitly labeled lists of pros and cons. Our goal is to group all phrases discussing a common attribute into one or more clusters to reveal what customers are saying about the product space, the level of detail used to describe an attribute, and the specific word choices that customers make. While some review sites do not provide user-authored pro and con summaries (e.g. Amazon.com), many others, including Epinions.com, BizRate, and CNET, do (Hu and Liu 2004). Exploiting the structure provided by pro and con lists enables us to avoid numerous complexities and limitations of automated language processing of prose-like text. This enables us to "automate" our process relative to most extant research.

Then, we separated all the pros and cons into individual phrases, as depicted in Column 1 of the table in Figure 1, Step 3. Preprocessing transforms the phrases from Column 1 into a normalized form. Column 2 depicts one step of pre- processing, namely, the elimination of uninformative stop- words such as articles (*the*) and prepositions (*of*). Next, we rendered each phrase as a word vector. The matrix of word vectors is depicted in the remaining columns of the table in Step 3. Each row is the vector for one phrase. Each vector index represents a word, and the vector value records a weighted, normalized count of the number of times the indexed word appears in the corresponding phrase.

Phrases are automatically grouped together according to their similarity. Similarity is measured as the cosine angular distance between word vectors and is identical to the Hamming distance used in computer science–based research. Step 4 depicts the K-means clustering of the phrases from Step 1. Conceptually, we can think of each cluster as representing a different product attribute. The example shows clusters for "zoom," "battery life," "picture quality," and "memory."

While any number of clustering algorithms is acceptable, we selected K-means for its simplicity and its familiarity to both the text-mining and marketing communities. As we noted previously, the principal contribution of our work is the elicitation of product attributes directly from the customer.

In product design, a product architecture defines the hierarchical decomposition of a product into components (Ulrich and Eppinger 2003). In the same way, Step 5 depicts the hierarchical decomposition of a product attribute into its constituent dimensions (i.e., attribute levels, similar to con-joint analysis). In Step 5a, we show a conceptual decomposition of the digital camera product attribute "memory." In Step 5b, we show an actual decomposition using only the phrases from Step 1. The decomposition is treated as a linear programming assignment problem (Hillier

and Lieberman 2001). The objective is to assign each word in the attribute cluster to an attribute dimension. Each word phrase defines a constraint on the assignment: Any two words that co-occur in the same phrase cannot be assigned to the same attribute dimension. Thus, we know that "smart" and "media" cannot appear as a value for the attribute dimension quantity (4, 8, or 16) or for the attribute dimension of memory unit (MB). Note that not all phrases include a word for every dimension. Intuitively, this is both reasonable and an important aspect of capturing the VOC. We want to know not only what customers say but also the level of detail with which they say it. For the algorithm, phrases that do not include a word for each attribute simply represent a smaller set of co-occurrence constraints than a phrase containing more words.

# ANALYSIS AND EVALUATION

We evaluate the quality and efficacy of analyzing market structure using online product reviews in three ways: First, we ask whether any new information can be discovered from user-generated product reviews not otherwise obtained from existing methods. Second, we measure the importance of attributes discovered from within product reviews. Finally, we use CA to analyze the VOC and ask whether any meaningful managerial insight is gained by visualizing market structure using product reviews. The first two measures support the use of reviews as a complementary method for generating possible attributes for use in market structure analysis. The third measure supports reviews and their corresponding word counts as a complementary method for selecting attributes and deriving pairwise brand distances for visualizing market structure. In this section, we evaluate our approach using all three measures on an actual set of digital camera product reviews.

# Digital Cameras

Our initial data set consists of 8226 online digital camera reviews downloaded from Epinions.com on July 5, 2004. The reviews span 575 products and product bundles that range in price from \$45 to more than \$1,000. Parsing the pro and con lists produces the aforementioned phrase×word matrix that is 14,081 phrases ×3364 words.

# Generating Attributes from Product Reviews

The purpose of mining the text of user-generated online reviews is to complement rather than replace existing methods for analyzing market structure. As a measure of the value within the text, we ask whether reviews reveal product attributes not found using traditional measures, such as those used to create expert buying guides. As a metric, we compute precision (P) (Salton and McGill 1983) as the number of automatically generated attributes and dimensions also used by experts in published buying guides. Conversely, recall (R) counts the number of attributes and levels named in professional buying guides that are automatically discovered in the VOC.

The columns of Table 2 correspond to each of ten expert guides aimed at the same consumer audience and available during the period covered by our reviews. For this study, the guides represent traditional methods for identifying meaningful product attributes. Epinions (A) comprises the attributes and levels by which customers can browse the digital camera product mix at Epinions (in 2005), and Epinions (B) represents a buying guide available on the Epinions website (in 2005). CR02–CR05 represent print buying guides for digital cameras from *Consumer Reports* for 2002–2005. The "Auto" column represents the attributes and dimensions derived automatically from online reviews. Row 1 indicates the average precision, and Row 2 indicates the average recall between the column source and all other reference sources.

Comparing the expert guides with one another reveals that there is no consensus among the experts on what the "important" attributes are. The absence of consistency indicates that analyzing online product reviews is not necessarily a redundant exercise; the VOC reveals interest in specific product attributes that are not identified by experts. If we observed high precision at any level of recall that would indicate polling the VOC is redundant; that is,

consumers do not reveal any information not already captured by existing methods. Low precision and high recall would indicate that, in their reviews, customers mention every possible attribute, which offers no discriminatory power. The data indicate that analyzing reviews yields high recall compared with expert attributes. This means that users report nearly all the attributes that experts do. In pairwise comparisons, the VOC has better recall than any other single expert. In addition, median precision suggests that consumers mention what the experts do but that consumers also mention some additional attributes.

# Importance of Attributes from Product Reviews

Through comparison with expert guides, we find that customers mention unseen attributes. To determine the significance, we conducted a laboratory survey in which participants evaluated the importance of different attributes for the purpose of purchasing a new digital camera. We find that automated analysis of online product reviews can support managerial decision making in at least two ways. First, our approach can identify significant attributes that experts otherwise overlook. Second, the reviews can serve as a filter for other attribute elicitation methods; attributes that experts and also customers identify may have more salience for purposes of product marketing and design.

We constructed a set of product attributes for testing by reconciling the 39 attributes shown in Table 1 with all the attributes identified in the ten reference buying guides listed in Table 2. After we eliminated duplicate attributes, we divided the resulting set of 55 attributes into overlapping thirds to reduce any individual respondent's burden. A few attributes were repeated in each third as an additional validity check. Each participant viewed between 20 and 21 attributes rated their "familiarity with" and the "importance of" each attribute using a 1–7 scale.

Participants were prompted to answer all questions. In particular, they were reminded to answer the second question for each attribute even if they answered [1] for the first question. In Part 2 of the survey, to understand the role that expertise might play, participants provided their selfassessed expertise on digital cameras (1 = "novice," and 7 = "expert"). Finally, participants provided a standard set of demographic variables such as age, gender, and education level. We used these variables as covariates to verify our main findings.

Figure 2 summarizes our main results, plotting the mean familiarity versus mean importance for each of the 55 attributes. We labeled attributes that appeared only in one or more buying guides "Expert Only," symbolized by circles. We labeled attributes that appear in at least one buying guide and also in our automated results "Expert + VOC," identified by squares. Finally, we labeled attributes that emerged only from our automated analysis of reviews "VOC Only," plotted as "X" symbols. As we would expect, the graph indicates a general trend upward and to the right. Users are more familiar with those product attributes that they tend to consider important.

# Selecting Attributes and Visualizing Market Structure Using Product Reviews

By comparing expert guides and consumer surveys, we demonstrate that customer reviews can complement existing methods for generating attributes used in market structure analysis. As a third measure of efficacy, we use attribute counts within customer reviews to select attributes, calculate brand distances, and visualize market structure. A product brand is associated with each online review. Using the automatically generated attribute clusters, we generate a brand by attribute matrix, counting the number of brand occurrences (number of phrases) for each attribute. We row (brand) normalize the matrix by the total number of phrases for that brand (Nagpaul 1999). Then, to turn this into a visual "map," we use CA, a technique for analyzing two- way, two-mode frequency data (Everitt and Dunn 2001), making it more appropriate for this task than the continuously scaled multidimensional scaling procedures commonly used for market structure maps. The CA approach is designed to help generate hypotheses by representing the data in a reduced space as determined by consulting the eigenvalues and the

corresponding scree plot (Greenacre 1992).

To help interpret the dimensions in the reduced space, we use (stepwise) regression of each brand's (x, y) coordinates on the derived attributes. The probability for entry is .05 and probability for removal is .1, though other values were tested and yielded high robustness. To ensure stability of the regression results, we use a rotationally invariant, asymmetric CA (Bond and Michailidis 1997).

To make the dimensions both interpretable and actionable, we follow the "house of quality" (Hauser and Clausing 1988) in relating customer needs, as represented by user-generated reviews, to actionable manufacturer specifications. Specifically, product attributes elicited from online reviews include different granularities ("zoom" vs. "10xoptical zoom") or reflect different levels of technical sophistication ("low-light settings" vs. "ISO settings"). Consulting the set of professional buying guides, we manually mapped our automatically generated attributes onto a coarser but actionable categorization of specifications.

For attribute selection, Figure 3 depicts the brand map in two dimensions based on the initial set of digital camera reviews analyzed for this study alongside the scree plot of the eigenvalues and cumulative percentage of inertia. In this instance, the average percentage explained is 20%, indicating a clear separation between two and three dimensions. More generally, we recognize that the reliability of any such model is dependent on fit as represented by the percentage of inertia captured by those dimensions. At the limit, we imagine that marketing managers might use the two-dimensional figures as a point of departure for interpretation with respect to decision making. For example, we generated the additional F1–F3 and F2–F3 plots and found that the results are consistent with our two-dimensional interpretation.

When interpreting CA maps, it is important to note that the dimensions only reflect relative relationships between brands and the underlying attributes. Being further from the origin does not necessarily imply higher term counts along one dimension or another. Rather, distance from the origin indicates greater deviation from the "average" brand.

We next assess the degree to which the brand map we derived from the VOC, as derived in our research, is consistent with empirical market share and documented brand strategies. Based on 2004 market share numbers from IDC, the top three manufacturers, in descending order, were Kodak, Sony, and Canon. All other brands had share percentages of 10% or less. The corresponding brand map reveals three distinct clusters, with Nikon as a notable outlier. In the mind of the customer, the secondary manufacturers all cluster by one of the three market leaders in a classic imitation strategy.

The positioning is also consistent with documented brand strategy, based on proprietary market research reports from the period. HP and Kodak explicitly attempted to differentiate themselves by emphasizing the camera-to-personal computer and camera-to-printer connection, linking them in the mind of the consumer (Worthington 2003). Among the best-known vendors, Nikon was the brand of professional photographers rather than lay consumers, late in its commitment to digital, and focused on the advanced amateur (Lyra Research 2003). Therefore, it is unsurprising that Nikon would be furthest from the origin (brand average).

At the same time, the brand map derived from the VOC reveals information that complements market share numbers and the proprietary market research reports. Traditional market research might cluster Fuji and Olympus on the basis of their shared commitment to and introduction of the xD-Picture Card memory format (Lyra Research 2003). Likewise, the "Four-Thirds" partnership between Olympus and Kodak to standardize image-sensor size and a removable lens mount might lead us to cluster those two brands (Lyra Research 2003). Instead, we observe that in the mind of the consumer, Olympus is more closely associated with market leader Sony and fellow follower Panasonic. Despite introducing a unique memory format with Olympus at the time, Fuji is paired with market leader Canon and Casio in the mind of the consumer.

One advantage of analyzing market structure on the basis of user-generated product reviews is the ability to quickly repeat the process and analyze changes in market structure over time. To this end, we collected a parallel set of 5567 digital camera reviews from Epinions.com dated between January 1, 2005, and January 28, 2008. The new set of reviews revealed five new attributes replacing five previously formed clusters (see Table 3). Although it is difficult to discern the underlying causes, the changes have face validity. As the customer base becomes increasingly sophisticated and increasingly connected online, the need for instructions and support has shifted toward online self-service. Like-wise, the ubiquity of personal computers and online photo management software may have shifted such functions away from the camera. In keeping with the theme of a more technically sophisticated audience, functions such as ISO settings, multiple-shot modes, and white/color balance are more significant or reflect active campaigns.

Although many attributes remain the same across time periods, changes in both customers and the marketplace may drive (or reflect) brand repositioning over time. To visualize these changes, we use the supplemental points method of CA (Nagpaul 1999). We construct a brand x attribute count matrix for Period 2; applying the transformation weights from the Period 1 decomposition, we map the Period 2 brand positions onto the Period 1 factors. Using supplemental points, we can trace market evolution between two (or more) periods on a common set of factors (axes). Figure 4 overlays Period 2 (year  $\geq$  2005) on the two-dimensional space defined for Period 1 (year < 2005).

Market share numbers for 2006 and 2007 published by the NPD Group and Hon Hai Worldwide show that Kodak, Sony, and Canon remained the three major manufacturers, though by 2007, Canon had emerged as the overall market leader, with Kodak falling to third. Consistent with market share, the Period 2 market structure continues to echo the overall positioning of a market leader with a cluster of imitators around each. However, in Period 2, the clusters exhibit a convergence in which even Nikon has now drawn closer to the three market leaders.

To visualize market structure, the VOC is mapped onto a set of product specifications (Hauser and Clausing 1988). Different users may refer to the same product attribute using different terminology such as "ISO settings" versus "photos in dim lighting." General terms such as "easy to use" need to be translated into actionable features such as "menus," "navigation," "auto settings," and so on. As noted previously, in this research, we followed the "house of quality" (Hauser and Clausing 1988) in manually rolling up different user terms into a common, actionable specification.

However, the manager may discover knowledge within specific consumer word choices. Focusing on F1 and F2 from our original market structure analysis, we analyze the degree of association between the three market leaders (Kodak, Canon, and Sony) and customer word choice on F1 and customer word choice on F2. Word choice in F1 is separated into two classes: the generic terms "ease of use" and "easy to use" and the specifications "navigation" "menus," and so on. Likewise, word choice in F2 is separated into two classes: lay terminology "low-light" photography, "dim-light," and so on, and advanced terminology "ISO settings," "ISO adjustment," and so on. Because we manually map different word choices onto a common factor, it is entirely possible that we are missing additional terminology. For example consumers citing "ease of use" could also be implicitly referring to ergonomic factors such as "grip" or "lightweight." Our analysis here is intended to convey the potential of drilling down on word choice rather than provide an authoritative accounting for a specific product attribute.

A chi-square of 9.087 (p = .011) for F1and a chi-square of 21.409 (p < .0001) for F2 suggest a clear relationship between brand and word choice. We constructed the corresponding 2 by 2 contingency tables and report both the chi- square and the z-statistic from the log (odds ratio) in Tables 4 and 5.

We observe that of the big three players, Kodak is clearly the brand most associated with lay terminology such as "low-light photography" (F2) rather than "ISO" and generic words such as "ease of use" (F1). In contrast, Canon users clearly tend toward more sophisticated terms such as "ISO settings." These findings reinforce market research from the time period, which reports that gender, age, and education level all exhibit strong brand preferences for Kodak and Canon (Lyra Research 2005). For example, older consumers and those most likely to have stopped schooling after high school or a few years of college prefer Kodak. Canon users are typically younger and have at least a college degree.

The visualization characterizes the "must-have" product attributes as defined by Kano's needs hierarchy (Ulrich and Eppinger 2003). Must-haves define basic product requirements. Customers criticize products for their failure on must-haves; they do not praise products for must-haves because these attributes are expected. Consistent with this definition, the figure exhibits the expected brand differentiation based on cons. Positive comments mapped onto the same (F1, F2) dimensions reveal a single cluster of all brands, which share a limited number of pro remarks. Although attributes are not strictly "needs" in Kano's terms, we can think in terms of those attributes that support specific needs.

Using stepwise regression, F1 defines the minimum that *any* digital camera is expected to provide: picture quality, start-up time, lens cover, and shutter lag. These attributes certainly match our intuitive sense of must-haves for digital cameras. In contrast, F2 defines those must-have attributes that distinguish specific product segments within the market space. Specifically, F2 (size, interchangeability of lenses, and the degree of in-camera programmability [e.g., menus, options]) separates the compact, "prosumer," and digital SLR product categories.

The structural map by polarity is most revealing when interpreted in the context of our twoperiod market structure map (Figure 4). Situated at the origin on both pro and con, Canon essentially defines the space. This is consistent with the Canon's position as a leader whose market share grew from Period 1 to Period 2 and is further evidenced by the Period 2 convergence of all groups toward the Canon brand cluster.

Market structure suggests three distinct clusters with leaders and imitators (Figure 4); focusing on polarity helps explains differences in market share. We know that Kodak and HP share a similar market strategy. However, HP clearly lags behind in sales; performance in the musthaves and the relative importance of the particular attribute dimensions help explain this difference. Likewise, imitators Fuji and Casio are closer to leader Canon than Olympus and Panasonic are to leader Sony. This again makes sense considering the overall market convergence toward the Canon, Fuji, and Casio cluster in Period 2.

Nikon, like Canon, is effectively neutral with respect to pros and cons. This is consistent with Nikon's strategy during the study period to produce excellent technology but to focus on a different customer base than the rest. Casio, whose market share numbers were too low to break out by IDC, NPD, or Hon Hai during the study period, is an outlier in the polarity maps.

# **Questions for your consideration**

1. What is the main research question of the article?

2. Which research approaches and (or) methods you consider to be controversial or not quite suitable for this research? Why?

3. What are the limitations of the current research and what recommendations could be given for further research?

4. How the research method described can be used by managers in Russian firms and multinational corporations?

5. What methods of data analysis do you consider suitable for this research?

Figure 1

HEURISTIC DESCRIPTION OF TEXT PROCESSING OF USER-GENERATED PRO-CON LISTS



Table 1 AUTOMATICALLY GENERATED PRODUCT ATTRIBUTES

LCD	Memory/Screen	Shutter (delay, lag)	Optical (zoom, viewfinder)	Floppy (storage media)	Support (service)	Shoot
Red eye	Lens (cap, quality, manufacturer)	Print (size, quality, output)	Slow (start-up, turn on, recovery)	Flash (memory card, photo)	Body (design, construction)	USB
Price	Picture (what, where)	Cover (lens, LCD, battery)	Feel (manufacturer, construction)	Battery (life, use, type)	Movie (audio, visual)	Size
Focus	Edit (in camera)	Disk	Instruction	Photo quality	Menu	Control
Features	Adapter (AC)	MB (memory)	Low light	Picture quality	Resolution	Zoom
Software	Image (quality)	Macro (lens)	Megapixel			

Table 2

#### INTERNAL CONSISTENCY: AVERAGE PRECISION AND RECALL BETWEEN ONE SOURCE AND ALL OTHERS

	Auto	E(A)	DP	Mega	Biz	CNET	E(B)	CR02	CR03	CR04	CR05	Mean
Precision	.37	.69	.33	.57	.41	.27	.48	.24	.26	.27	.37	.42
Recall	.72	.23	.55	.23	.48	.33	.46	.38	.37	.37	.50	.39



Figure 4

EVOLUTION OF MARKET STRUCTURE WITH PERIOD 2 AS SUPPLEMENTARY POINTS

.15

.10

.05

0

-.10 -.10

-.05

So

F2 (35.90%)

Figure 3 MAPPING THE MARKET USING CUSTOMER REVIEWS







Национальный исследовательский университет «Высшая школа экономики»

 Table 3

 CHANGES IN AUTOMATICALLY GENERATED ATTRIBUTES BEFORE AND AFTER 2005

Before 2005	Size	Support (service)	Feel (manufacturer)	Instruction	Edit (in camera)
After 2005	ISO	Modes	Accessories	Easy to use	White/color balance

# Блок II. «Маркетинговые коммуникации и реклама в современном бизнесе»

#### Прочитайте статью<sup>2</sup> и сделайте ее критический анализ на русском языке.

#### THE RISE OF EARNED MEDIA

No other single media platform can boast the speed of user uptake as Facebook. It is estimated that, by 2015, social media will become a mainstream mass-media platform that, in one form or another, will engage one-third of the world's population. This penetration would offer advertisers access to 80 percent of global consumer expenditures—a potential \$29 trillion market (Nuttney, 2010). In light of such predictions, it is understandable that many marketers are including social media in their media mix. They do so, however, with limited understanding of whether social media are more effective than other platforms or of how they can be used most effectively (Nelson-Field and Klose, 2010).

Facebook is the dominant—and fastest-growing—social medium, with more than 900 million active users. For marketers, the Facebook platform offers a different kind of mechanism for communicating with their potential audiences. When it is compared to offline media, Facebook often is reported as a cost-effective way of developing and communicating with actual (and/or potential) customers (comScore, 2011; Millward Brown, 2011; Gibs and Bruich, 2010; Syncapse, 2010).

Advertisers create Facebook Fan pages for their brands and then encourage Facebook users to become "Fans" of these pages by clicking the "like" button on the page. Once a user has "liked" a brand's page in this manner, they may receive brand updates—and the observations of other brand Fans—in their personal newsfeeds.

The number of attracted and maintained Fans typically are key metrics for evaluating the success of Facebook marketing efforts (Millward Brown, 2011; Sterne, 2010). How many Fans a brand has obviously affects the breadth of a brand message, but who these people are—not just how many of them there may be—also is important. Some industry studies have proposed that brand Fans may spend more than non-Fans (Millward Brown, 2011; Syncapse, 2010)—a finding that intuitively would suggest that the Facebook enthusiasts are heavy brand buyers. The concentration of these "valuable" Fans across the entire Fan base, however, is unknown. Furthermore, whether these valuable brand Fans have changed their buying behavior after becoming a Fan also is unknown.

As such, the following four questions were the focus of this research:

- Are Fans of brands on Facebook heavy buyers of the brand?
- What is the concentration of these buyers across the brand Fan base?
- Has the Fan recruitment profile changed? Is the reach broadening?
- Whether the Ehrenberg's model of a brand's customer base became outdated in the age of social media?

# IS TARGETING HEAVY BUYERS A PATH TO GROWTH?

Targeting strategies that focus on reaching (and rewarding) heavy brand buyers have long been popular in advertising practice. For example, an analysis of advertising effectiveness entries showed that this was by far the most popular strategy, although the opposite strategy (targeting light and non-customers) was associated with far higher sales and profit results (Binet and Field, 2009).

The thinking behind such a strategy seems, at least superficially, to be logical: it would seem to make sense to spend more money on customers who are worth more to the brand. That logic is flawed, however, because what matters is not how much customers buy but rather how

<sup>&</sup>lt;sup>2</sup> На основе статьи Karen Nelson-Field, Erica Riebe and Byron Sharp (2012), What's Not to "Like?" Can a Facebook Fan Base Give a Brand the Advertising Reach it Needs? // Journal of Advertising Research, Vol. 52, No. 2, 2012.

they respond to advertising (Wright and Esslemont, 1994; Watts, 2011). Heavy-loyal customers are, of course, by definition worth more to the brand per customer, but it is unlikely that any advertising could stimulate them to buy more than they already do. Customers who already are 100-percent loyal to a brand are unable to give the brand any more of their category buying.

Andrew Ehrenberg's discovery that a brand's customer base is described by a negative binomial distribution (NBD) of buying rates (Ehrenberg, 1959) shows that reaching all types of customers is paramount. The NBD accurately describes the frequency distributions of purchase rates across a population of consumers for a single brand or category (Ehrenberg, 1988; Goodhardt, Ehrenberg, and Chatfield, 1984; Morrison and Schmittlein, 1988; Uncles, Ehrenberg, and Hammond, 1995).

The distribution has been validated in many repeat-purchase markets across hundreds of categories and brands and has become a well-established benchmark of the buying concentration of a brand's customer base (Ehrenberg, 1988; Goodhardt et al., 1984; Morrison and Schmittlein, 1988; Uncles et al., 1995). The NBD denotes that the heterogeneity in purchasing rates ( $\lambda$ ) follows a gamma distribution in that, under most conditions, it reflects a high incidence of light buyers (shoppers who have a low to close-to-zero purchasing rate), fewer medium buyers, and very few heavy buyers (Ehrenberg, 1988).

As a brand grows, it moves from one NBD to another. As it moves, however, it achieves higher penetration and higher average purchase rates. Because of the shape of the distribution, the bulk of change is seen among the brand's very many light (and non-) buyers (McDonald and Ehrenberg, 2003; Stern and Ehrenberg, 2003). Growth-oriented advertising, therefore, needs to reach light (and non-) buyers.

It may be argued that the bulk of work that advertising accomplishes is not to increase market share but to maintain it (Ehrenberg, Barnard, and Scriven, 1998). In this case, the sales effects of advertising are not to increase purchase rates but to prevent sales erosion that would otherwise occur. It, therefore, would seem highly important to reach the heavy customers who do the most buying of the rand; after all, this audience has the highest potential for erosion.

The sales importance of heavy buyers, however, often is overstated. Recent studies have hypothesized that, for grocery brands, the 80/20 adage (the top 20 percent of a brand's customers are responsible for 80 percent of sales) does not apply and that the top 20 percent of customers, in fact, contribute less than 60 percent of sales (Sharp and Romaniuk, 2007; Sharp, 2010). The brand's *lightest* 80 percent of customers, therefore, are important for maintenance and growth; they contribute half of today's sales—an advantage brand managers would prefer to retain. Furthermore, these buyers rarely think of the brand and rarely buy it. They are likely to be lured away by competitors' advertising, particularly if the brand's own advertising efforts fail to reach them.

#### **REACHING LIGHT BUYERS IS NOT OPTIONAL**

The work by Ehrenberg and others in documenting the sources of a brand's sales leads to a succinct rejection of the targeting strategy. As Ehrenberg wrote, his discovery ended "marketing's pipedream of just recruiting heavy buyers" (Ehrenberg, 2005). Instead of targeting heavy brand buyers, communication strategies, it was argued, should seek to communicate with potential buyers from across the entire customer base—including not just light buyers of the brand but non-buyers (so long as they are already engaged in the category), many of whom are not non-buyers at all but rather simply light buyers who did not make a purchase this year but may return next year (Goodhardt and Ehrenberg, 1967; Anschuetz, 2002; Morrison and Schmittlein, 1988).

At this point, it would seem that a case could be made for the conclusion that the ideal medium (or at least mix of media) should reach all category buyers and, hence, find the brand's heaviest and very lightest of buyers. The heavier buyers, however—the more loyal customers—are easier to reach than light buyers because they more easily notice and mentally process the brand's advertising messages (Sharp, 2010). These heavier buyers also receive more

reinforcement from the brand's other marketing efforts, including packaging. The implication is that advertising media that skew toward light buyers are particularly valuable. By contrast, media that skew towards heavier buyers offer something that is easily achieved and therefore less valuable to an advertiser.

And it is from this heavy-user/light-user perspective that the authors have examined the influence of marketing on a brand's Facebook Fans.

# METHODOGY

To analyze the difference between a typical population of shoppers—a group that typically would be NBD-distributed—and the population of a Facebook Fan base, the authors used two data sources:

- Self-reported purchase data from Facebook Fans of two brands from two different repeatpurchase categories (chocolate and soft drinks). These data were collected with a selfcompletion Web-based survey link. One of the data sets was collected via a link on the brand's Fan page, where only Fans of the brand could respond; the other was sourced from a probability-based online panel—where respondents could be Fans of any brand in the category—with analysis restricted to Fans of the one focal brand.
- Actual consumer panel data for the same brands for direct comparison.

To ensure consistency between the comparisons, the authors

- mined a 12-week rolling average, and
- converted these continuous data into the same categorical measures (i.e., grouped into "never"; "once"; "two-three times"; "4 or more times").

For both data sets, the authors classified these purchase categories:

- "non-buyers" ("never");
- "light" ("once");
- "moderate" ("two-three times"); and
- "heavy buyers" ("four or more times in three months").

The use of retrospective self-reported purchasing as the basis of frequency distributions introduced the possibility of respondent error. For example, one 1979 study concluded that the average correct classification rate (across seven brands and three different purchase-related questions) was only 49 percent (Wind and Learner, 1979).

More recent studies have considered purchase intention (Romaniuk, 2004; Wright and MacRae, 2007); product consumption (Stanton and Tucci, 1982); and product usage (Hu, Toh, and Lee, 2000; Ram and Hyung-Shik, 1990). The comparisons between recall and panel data were consistent, with respondents tending to give responses for a typical period rather than the specific period they were questioned about. Those results mean that self-report data potentially can out-perform panel data in correctly classifying consumers into light or heavy buyers. Moreover, because of stochastic variation in purchasing, panel data always will misclassify some normally heavy consumers as light because they bought at less than their usual rate during the particular analysis period (Schmittlein, Cooper, and Morrison, 1993). And some "light" buyers also will be misclassified as "heavy" (for further explanation see Sharp et al., 2012 in this issue).

Some recent research in this area (i.e. Nenycz-Thiel, Romaniuk, Ludwichowski, and Beal, 2012) is more directly relevant to this research because it investigated distributions of heavy to light behavior, whereas most previous research considered only overall averages, ignoring the heterogeneity in respondents' behavior. In that instance, the authors conducted two studies—one in the chocolate category (using purchase recall) and the other at brand level (using television-program viewing). Their results suggested that the main source of error occurred at the light buying/using end, where respondents slightly underestimated infrequent events; there was less

classification error with heavy buyers/users. These findings are consistent with respondents reporting on their typical behavior rather than specific behavior during the questioned period.

Such biases in self-report data, unsurprisingly, did not prevent respondents from correctly identifying whether they were heavy or lighter buyers. Indeed, self-report data may outperform panel data in making correct individual classifications. Both approaches should generate correct distributions of purchase weight—which is the focus of this article.

In recognition of recommendations on how to minimize errors to increase overall survey accuracy (Nenycz-Thiel et al., 2012), the authors applied the following standards in the current research:

#### • *Reduced memory decay through brand/category choice*

Memory decay is a key factor hindering accuracy and can result in under-reporting. Fewer reporting errors occur when the (buying) event is more frequent and, thereby, less reliant on long-term memory (Hu et al., 2000; Lee, Hu, and Toh, 2000; Sudman, 1964). In this research, the authors considered two leading brands from two repeat-purchase categories (chocolate and soft drinks).

#### • Decreased the timeframe to improve recall

To improve recollection and increase the vividness of the event, the authors limited the reporting timeframe to 3 months (typical panel data for the NBD are 12 months; Allison, 1985; Tourangeau, Rips, and Rasinski, 2000).

#### • *Provided context cues to reduce generalizing*

Respondents tend to generalize the responses to reflect an overall behavioral pattern. Such shortcuts can result in over- and underestimation of frequency (Hu et al., 2000; Tourangeau et al., 2000). Context cues can improve accuracy. In the current research, the authors provided respondents with a full list of potential responses. Applying this context cue disallowed the respondents to write in their own number and potentially overestimate frequency (Nenycz-Thiel et al., 2012). Furthermore, the authors asked respondents to report purchase behavior in a "typical" 3 months (before and after becoming a Fan). Ideally, adding this context should have assisted the mental averaging process and reduced exaggeration (Parfitt, 1967).

#### • *Reduced the complexity of the recall task*

One goal of the current study was to simplify the recall task (Parfitt, 1967). The authors simply asked, "In a "typical" three months, how often would you buy this brand? Never? Once? Two or three times? Four or more times?".

These frequency classifications were appropriate for these categories, given the expectation that the distribution of the buying rates in the wider customer base would be NBD-distributed. The authors acknowledge that these classifications may need to be altered for different categories, with longer inter-purchase intervals.

The current study produced consistent findings for both categories examined, and the differences in distributions, in fact, were so stark that any small biases in either the panel or the self-report were inconsequential.

#### RESULTS

The buying concentration of a brand's Facebook Fan base was extremely different from that of a "typical" population of shoppers (i.e., not NBD-distributed). In fact, the authors found two generalizable patterns in describing the average brand's Facebook Fan base:

• Using the classification of buying rates as outlined above to study the distribution of buying rates for a typical chocolate brand (based on 2011 consumer panel data with a 12-week rolling average), the results revealed a typical NBDdistributed customer base, with

high numbers of light (and zero) buyers and fewer medium and heavy buyers (See Figure 1).

• By comparison, the distribution of buying rates for Facebook Fans of the same brand in the chocolate category showed a strikingly different shape (See Figure 2): the Fan base produced a particularly high incidence of heavy buyers (57 percent), and virtually no non-buyers (1 percent).



The Facebook Fan base of this chocolate brand was very skewed to heavy buyers—the opposite of a typically distributed customer base.

The same results appeared in the authors' analysis of the soft-drink category. Figure 3 is an example of a typical soft-drink customer base. Using 2007 consumer panel data with a 12-week rolling average, the typical soft-drink customer base showed a typical NBD-distributed pattern. Consistent with the findings for the chocolate brand, the buying distribution among the softdrink Facebook Fans was very different and was skewed toward heavier buyers (See Figure 4).



The findings were consistent between two different brands in two different categories: the Facebook Fan base was strongly skewed to heavy buyers.

The analyses of both products demonstrate that Facebook is a platform that delivers an audience for advertising that is skewed toward heavier brand buyers (See Table 1). In more detail: the Facebook fan base does not give the marketer access to sufficient numbers of light buyers to maintain communication with a substantial proportion of the customer base, particularly if the desired outcome of communication efforts is to grow the brand (Sharp, 2010). Marketers who want to focus on spending their resources on recruiting and maintaining a Fan base, in essence, are limiting their efforts to the small proportion of the customer base who do not have sufficient capacity to increase their buying of the brand.

# TABLE 1

Buying Concentration (%) across the Facebook Fan Base by

	Sample	Non-Buyers	Light Buyers	Moderate Buyers	Heavy Buyers
Category	n	(0)	(1)	(2–3)	(4+)
Chocolate	1000	1	10	33	56
Soft Drink	520	4	9	24	63
Average		3	10	28	60

Category

Given the use of self-report data in the current study, the authors sought validation by conducting a third study that examined self-report purchasing profiles for a different medium. Again, the authors sourced the data from a probability-based online panel (n = 397). In place of Facebook Fans, however, in the third study, the authors interviewed recent television viewers—specifically, people who had watched the 2012 Super Bowl (U.S. sample weighted to the population).

The Super Bowl was chosen because it delivers the sort of audience the brands under study normally would like to reach. (Had the authors chosen all television viewers, the results might have been skewed unduly toward light users of the brands—an unfair comparison for Facebook.)

The authors asked the same purchase frequency questions of the same two brands in the original Facebook questionnaire. Distribution in the third study clearly skewed to non- and light buyers of the brand (See Figure 5)—consistent with a typically distributed customer base and diametrically opposite to the same brands' Facebook Fan bases (See Figure 6).



The findings of buying concentration from 2012 Super Bowl television audiences were more consistent with a typical population of a brand's buyers. This demonstrates that the Facebook Fan base generates a non NBD-distributed population, not the nature of the claimed data.

In a side-by-side examination of audience concentration for both brands, although the chocolate brand showed a smaller skew to non-buyers than the soft-drink brand, the direction of the distribution still followed an NBD and was starkly different from the Facebook results (See Table 2).

# TABLE 2

Buying Concentration (%) of the 2012 Super Bowl Viewing Audience by Category

	Soft Drink		Chocolate	Chocolate		
	Facebook ( <i>n</i> = 520)	Super Bowl ( <i>n</i> = 397)	Facebook ( <i>n</i> = 1000)	Super Bowl ( <i>n</i> = 397)		
Non-buyers	4	47	1	28		
Light	9	29	10	34		
Moderate	24	11	33	23		
Heavy	63	13	56	15		

# IS THE QUALITY OF THE REACH OF EARNED MEDIA CHANGING?

The act of "liking" brands on Facebook has dramatically increased in popularity in recent years (Cashmore, 2010). In part, this is due to the natural growth of the Facebook platform but also as a result of its increasing cross-functionality with other online media and portability with other digital devices, making access to the Facebook-like button easier. That in turn raises the question of whether brands' Facebook brand Fan bases are becoming more representative of their brands' actual buyer bases. If so, lighter buyers may have been expected to have been Fans of brands for shorter periods (i.e., they signed on as Fans more recently). Similarly, heavy buyers of a brand may have been Fans for a longer period.

There is a slight trend toward this split, with "older" Fans (12–24 months) being more likely to be heavier buyers than "newer" Fans (See Table 3). Even the newer Fan base, however, still was significantly different from the brands' actual buyer base, demonstrating that Facebook continues to attract heavy buyers of the brand.

# TABLE 3

	Length of time subscribed					
Purchase Classification	<6 months	6–12 months	12-24 months	Total		
Non-buyers	4	2	0	2		
Light	10	7	11	9		
Moderate	27	31	26	29		
Heavy	61	60	64	61		
Total				100		

Average Buying Concentration (%)—All Categories

Newer Facebook Fans were highly similar to older Facebook Fans in that they both skewed to heavy brand buyers.

# THE ADVERTISING VALUE OF "EARNED" MEDIA

This current study drew heavily on the extensive work of Andrew Ehrenberg and his colleagues. By discovering the statistical regularities in the buyer behavior of individuals, they have highlighted the important role that light buyers play for all brands (Romaniuk, 2011). And the authors have relied on this insight to clarify one of the disadvantages of "earned" media.

Specifically, the authors found that the buying distribution of a brand's Facebook Fan base is opposite to that of a typical population of category buyers, with a significantly higher incidence of heavy buyers reached with this social-media vehicle.

This finding identifies a clear deficiency of earned media and raises questions about the value of the Facebook platform as a stand-alone earned advertising medium. One could argue that an earned medium such as Facebook is only part of a multimedia mix and that other media with better reach profiles will reach the missing light buyers. The question remains, however: in a mix of media, is it ever a good idea to include a medium that skews so strongly away from light users? Almost any medium can reach some part of the brand-loyal audience. Consequently, advertisers should identify media that can reach beyond their most loyal customers. Media that skew as does the Facebook Fan base are lower-quality media and certainly should command low Cost Per Thousand (CPMs).

There are a number of potential benefits of a Facebook Fan base. Having direct access to heavy buyers may provide a useful research/insight opportunity by providing a forum to listen to customers (and competitor's customers). Furthermore, Facebook may offer the potential for Fans to become active brand advocates, creating new networks that, in fact, include light buyers. The ability of Facebook to leverage such networks of brand Fans (and its relative efficiency) is outside the scope of this research and demands future research.

This current study should caution marketers against using Facebook as a stand-alone medium to drive brand growth. Furthermore, marketers should be wary of over-investing in small relative pockets of heavy buyers if it comes at the expense of overlooking light buyers who may be the primary source of brand growth.

#### **Questions for your consideration**

- 1. What research questions were investigated in the article? What scientific methods were applied to investigate these questions?
- 2. What propositions are well or poorly reasoned in the article? Please, explain your opinion.
- 3. What communication theories and advertising models do you know? Which of them you find relevant for social media advertising campaign analysis and planning?
- 4. What type of advertising strategy in terms of 'type of involvement / type of attitude' would be suitable for brands in soft drinks product category?
- 5. Do you think there are differences between the communication models used in marketing communication campaigns in traditional media as opposed to marketing communications campaigns in Internet and new media? Please, substantiate your point.
- 6. The first chapter of the article has a title "The Rise of Earned Media". What is your understanding of Earned Media? What other types of media (opposed to the concept of earned media) do you know?
- 7. Whether Facebook Fan page has broad or narrow reach? What concepts of advertising reach /frequency do you know?

#### Блок III. «Стратегическое и корпоративное управление»

# Прочитайте статью<sup>3</sup> и сделайте ее критический анализ на русском языке.

#### **1. Introduction**

The purpose of this research is to understand in-depth CEO compensation system of NYSE energy companies. In addition, over the past decade, United States public had raised concerns over bonuses declared to CEOs by their board of directors. The failure to understand the determinants of CEO compensation by the public had led to blame CEOs of rent grabbing; misused of its power towards board; and monopolization of compensation system. Thus, these ever growing concerns bring to the foreground conclusion the need to further study in depth at least one important sector of American economy, namely Financial Services sector, in terms of primary relationship and resulting dynamics between CEO compensation, firm size, accounting firm performance, and corporate governance.

The CEOs and other executives would like to eliminate the risk exposure in their compensation packages by decoupling their pay from performance and linking it to a more stable factor, firm size. This strategy indeed deviates from obtaining the optimum results from principal-agent contracting. In general, previous studies had found a strong relationship between CEO compensation and firm size but the correlation results were ranged from nil to strong positive ratios. The variables used in previous studies as a proxy for firm size were either total sales, total number of employees, or total assets. Therefore, firm size needs to be studied with CEO cash compensation in greater detail such as using both total sales and total number of employees.

The most researched topics in the executive compensation are between CEO compensation and firm performance. Although executive compensation and firm performance had been the subject of debate amongst academic, but there was little consensus on the precise nature of the relationship as such, further researched in greater detail need to be conducted to understand in finer terms the true extent of the relationship between them. As such, this research had unprecedentedly used eight variables to attest with CEO compensation, that is, return on assets (ROA), return on Equity (ROE), earnings per share (EPS), cash flow per share (CFPS), net profit margin (NPM), book value per common stock outstanding (BVCSO), and market value per common stock outstanding (MVCSO).

The relationship between CEO compensation and corporate governance (CEO Power) was not attested extensively in the past, especially in Canada. In fact, only few credible researched papers were written. That is, CEO power only had been the subject of recent focus among researchers, primarily due to the effect of researchers had failed to find the strong relationship between CEO compensation, firm size, and firm performance. The variables used in previous studies as a proxy for corporate governance such as, CEO age; CEO tenure; and CEO turnover, were found to have negligible to weak relationship with CEO compensation. In addition, third party data collection, different population samples such as industry and market, and use of different statistical methods, all had led to a divergence in results. Therefore, corporate governance needs to be studied with CEO compensation on an extensive basis such as using, CEO age, CEO stocks outstanding, CEO stock value, CEO tenure, CEO turnover, management 5 percent ownership, and individuals/institutional 5 percent ownership.

<sup>&</sup>lt;sup>3</sup> Составлено по: Nulla Y.M. CEO Compensation System of New York Stock Exchange Financial Services Companies: An Analysis with Firm Size, Accounting Performance, and Corporate Governance // International Journal of Scientific and Engineering Research, Volume 4, Issue 9 (October 2013).

# 2. Literature Review

### 2.1. CEO Compensation and Firm size

Prasad (1974) believed that executive salaries appear to be far more closely correlated with the scale of operations than its profitability. He also believed that executive compensation is primarily a reward for previous sales performance and is not necessarily an incentive for future sales efforts. McEachern (1975) believed that executives are risk averse. They can reduce or eliminate risk exposure in their compensation package by linking it to a more stable factor, firm size. Gomez-Mejia, Tosi, and Hinkin (1987) believed that firm size is a less risky basis for setting executives' pay than performance, which was subject to many uncontrollable forces outside the managerial sphere of influence. Deckop (1988) believed that a strong sales compensation relationship would suggest that CEOs are given an incentive to maximize size rather than profitability. Tosi and Gomez-Mejia (1994) believed that measurement of firm size is the composite score of standardized values of reported total sales and number of employees. Gomez-Mejia and Barkema (1998) defined the relationship between CEO compensation and firm size as "positive". That is, CEOs in large companies make higher income than CEOs in small companies. This is supported by Finkelstein and Hambrick (1996), who believed that firm size is related to the level of executive compensation. This is further supported by Murphy (1985), who find that holding value of a firm constant, firm whose sales grow by 10% will increase CEO salary or bonus between 2% and 3% Therefore, it shows that size pay relation is causal, and CEOs can increase their pay by increasing firm size, even when increase in size reduces the firm's market value. Shafer (1998) shown that pay sensitivity, which measured as change in CEO wealth per dollar and change in firm value, falls with the square root of firm size. That is, CEO incentives are 10 times higher for a \$10 billion firm than for a \$100 million firm.

# 2.2. CEO Compensation and Firm Performance Linkage

According to previous studies conducted in the United States and the United Kingdom, CEO compensation is believed to be weakly related to firm performance. Loomis (1982) argued that pay is unrelated to performance. Henderson and Fredrickson (1996), and Sanders and Carpenter (1998, 2002) argued that CEO total pay may be unrelated to performance but it related to organizational complexity they manage. Likewise, studies conducted by Murphy (1985), Jensen and Murphy (1990), and Joskow and Rose (1994) find similar conclusions.

Jensen and Murphy (1990) argued that incentive alignment as an explanatory agency construct for CEO pay is weakly supported at best. That is, objective provisions of principal agent contract are not comprehensive enough to effectively create a direct link between CEO pay and performance. They find that pay performance sensitivity for executives is approximately \$3.25 per \$1000 change in shareholder wealth, small for an occupation in which incentive pay is expected to play an important role. This is supported by Tosi, Werner, Katz, and Gomez-Mejia (2000), who find that overall ratio of change in CEO pay and change in financial performance is 0.203, an accounting for about 4% of the variance. This weak relationship is explained by Borman & Motowidlo (1993) and Rosen (1990), who stated that archival performance data focuses only on a small portion of a CEO's job performance requirements as such, it is difficult to achieve a robust conclusion.

According to Jensen and Murphy (1990) who believed that CEO bonuses are strongly tied to an unobservable performance measure. They believed that if bonuses depend on performance measures observable only to the board of directors, they could have provided a significant incentive. They believed that one way to detect the existence of such phantom performance measures are to examine the magnitude of year to year fluctuations in CEO compensation. They believed that such fluctuations signifies CEO pay is unrelated to accounting performance. In addition, they argued that although bonuses represent 50% of CEO salary, such

bonuses are awarded in ways that are not highly sensitive to performance. And the variation in CEO pay can be explained by changes in accounting profits than stock market value. Overall, they believed that pay performance sensitivity remains insignificant.

Jensen and Murphy (1990) find in their study that CEO received an average pay increase of \$31,700 in years when shareholders earned a zero return, and received an average additional 1.35¢ per \$1,000 increase in shareholder wealth. These findings are comparable to those of Murphy (1985 and 1986), Coughlan and Schmidt (1985), and Gibbons and Murphy (1990), who find that pay performance elasticity of approximately 0.1, indicating, salaries and bonuses increased by about 1% for every 10% rise in the value of the firm. In addition, they find an average pay increase of CEOs whose stockholders gains \$400 million is \$37,300, compared to an average pay increase of CEO whose stockholders lose \$400 million is \$26,500. These findings are supported by Jensen and Murphy (1990), who believed that CEO cash compensation should be structured to provide big rewards for outstanding performance and meaningful penalties for poor performance. In addition, they believed that the relationship between CEO cash compensation and firm performance would be less troubling if CEO owned a large percentage of corporate equity. Gilson and Vetsuypens (1993) argued that the association between pay and performance is small in economic terms when performance is measured in terms of changes rather than levels. This is supported by Iyengar (2000) who argued that changes in CEOs compensation are unrelated to changes in firms' performance perhaps due to stockholders in poorly performing firms would like to adopt a cautious wait and see attitude, to assess whether a change in performance is permanent before rewarding senior managers. This is further supported by Antle and Smith (1986), who find no relation between CEO cash compensation and firm performance. However, these statements are contradicted by Jensen and Zimmerman (1985), who stated that evidences are inconsistent with a view that executive compensation is unrelated to firm performance and enriches managers at the expense of shareholders. This is supported by Gibbons and Murphy (1990), who find that CEO pay changes by about 1.6% for each 10% of return on common stock. That is, the CEO pay structure is positively and significantly related to firm performance, as measured by the rate of return on common stock. This is supported by Lambert and Larcker (1987) and Sloan (1993), who find that there is a positive relation between CEO compensation and stock returns. According to Blanchard, Lopez-de-Silanes and Shleifer (1994), Iyengar, Raghavan J. (2000), and Bertrand and Mullainathan (2001), who stated that CEO cash compensation increases when firm profits rise for reasons that have nothing to do with managers' efforts. Murphy (1986) believed that top executives are worth every nickel they get.

### **2.3 CEO Compensation and Corporate Governance (CEO Power)**

According to Jensen and Murphy (1990), voting power of CEO includes CEO and his immediate family stock ownership and the percentage of stocks over which CEO has a sale or shared power to direct the voting. It is believed that CEO's in large firms tend to own less stock and have less compensation based incentives than CEOs in small firms. This is supported by Jensen and Murphy (1990), who find that as a percentage of total corporate value, CEO stock ownership has never been high in large companies. That is, there exists a small and insignificant positive coefficient of ownership interaction variable, which implied that the relation between compensation and performance is independent of an executive's stock holdings. In addition, according to their earlier (1989) study, they find that median CEO of one of nation's 250 largest public companies own shares just over \$2.4 million, less than 0.07% of the company's market value. In addition, they find that 9 out of 10 CEOs own less than 1% of their company's stock, and 1 in 20 CEOs own more than 5% of the company's outstanding stocks. Overall, they find that CEOs receive about 50% of their base pay in the form of bonuses. Their study is based on sampling of 73 manufacturing firms during a 15 year period. This is supported by Cyert, Kang, and Kumar (2002), who find a negative correlation between large stockholders and CEO compensation. That is, doubling percentage ownership of external stakeholders reduces non salary compensation by 12% to 14%. This is contradicted by an earlier study conducted by Mehran (1995), who find a positive relationship between the percentage of total cash (salary and bonus) compensation and the percentage of stocks hold by managers. His study is based on one year collection of data. Ungson and Steers (1984) believed that firms where CEOs have large stock ownership and long tenure, they can largely shape their pay. Similarly, Finkelstein and Hambrick (1988) believed that the relative power of a CEO may affect the height of the hurdles that are set to qualify for contingent pay. In addition, they believed that strong family's position in the firm will increase executive's power. Moreover, they find that CEO compensation and CEO stock ownership are related in an inverted U-shaped manner, compensation highest in situations where CEO stock ownership is characterized as moderate. That is, the point of inflection happened when CEO stock ownership reached about 9 percent in the first 18 years, beyond that, salaries started to decline due to tax preference of incurring capital gains over current income. Bertrand and Mullainathan (2000) find that CEOs at firms lacking five percent (or larger) stock ownership tend to receive more luck based pay, that is, pay associated with profit increases that are entirely generated by external factors rather than by CEOs' efforts. In addition, they also find that firms that have fewer external stakeholders, CEO cash compensation is marginally reduced when option based compensation is increased.

Murphy (1986) stated that CEO performance is influenced by CEO tenure. That is, he believed that increased CEO tenure may promote principal trust of an agent and in turn agent will take actions in the principal's interest. Similarly, Sigler (2011) finds that CEO tenure appears to be an important variable in determining the level of CEO compensation. His examination is based on two hundred and eighty firms listed on the New York Stock Exchange from 2006 to 2009. In addition, Finkelstein and Hambrick (1989) believed that CEO tenure is thought to have a positive link with compensation. That is, pay steadily increase as CEO gains and solidify power over-time. However, they find in their study that such a relationship is not observed between CEO tenure and CEO pay. As such, they then decided to conduct additional testing, cross sectional associations of CEO compensation and CEO tenure, and have found that there is an existence of a curvilinear relationship, a U-shaped pattern. That is, CEO tenure increases pay up to 18 years and then it started to decline gradually. They have provided two possible explanations for this curvilinear relationship. Firstly, they believed that power accrues for a while and then diminishes due to CEO's reduced mobility in the managerial labor market, or due to his evolution into a figurehead with one or two younger high priced executives carry the actual weight of a CEO's job. Secondly, they believed that executives reached a point where they prefer stock over cash compensation. This could occur because of changes in family and

financial circumstances. This supposition is supported when they have examined two sub samples and have found that stock compensation carries a higher proportion of total compensation. As such, they believed that CEO tenure increases a shift in pay mix from cash to stock earnings, support the notion that personal circumstances influence pay. In addition, they believed that long CEO tenure will create opportunity to recruit sympathetic board members for CEOs. In addition, they find that the average tenure of a CEO is significantly lower in externally controlled firms (2.96 years) than management-controlled firms (5.92 years). Thus, they believed that the boards of externally controlled firms may not need to pay from profitability because CEO tenure is dependent on the owner's satisfaction with CEO performance. Their study is based on a sample size of sixty companies. Pfeffer (1981) believed that the creation of a personal mystique which may induce unquestioned deference or loyalty, can be expected to occur when CEO power becomes institutionalized in the organization.

Deckop (1988) argued that CEO age has little effect on CEO compensation. However, Finkelstein and Hambrick (1989) find an inverted U-shaped relationship between CEO age and CEO cash compensation, indicating, CEO cash compensation increases until CEO reached the age of 59 years and then it starts to decline. This is consistent with the view that earnings over time is in line with CEO's need for cash, which tends to drop off as he or she gets older due to no major expenditures to incur such as, house and child rearing expenses. This is supported by McKnight et al. (2000), who find that CEO compensation is positively related to a certain age, but it starts to decline afterward. This is further supported by Weir (2000), who finds that the relationship between CEO age and CEO age are significantly related but have weakened over time, and the relationship between CEO age and CEO bonus appears nonlinear in nature. That is, at about age 53, the proportion of bonus as a percentage of salary begins to decrease at an increase rate. On the other hand, according to Gibbons and Murphy (1992), who finds that CEO age is a well recognized determinant of compensation and have shown to be significantly related to CEO pay.

Jensen and Murphy (1990) find that CEO turnover probabilities are negatively and significantly related to changes in stockholder wealth. In addition, they concluded that the dismissals were simply not an important source of CEO incentives. Gilson and Vetsuypens (1990) examined the nature of compensation packages for financially distressed firms. They found that within a small sample of financially distressed firms, when a turnover occurs, insider replacement CEOs were paid substantially less than their predecessors, but outsider replacement CEOs were paid substantially more. Similarly, Murphy and Oyer (2002) find that outside CEO replacements receive higher compensation than inside CEO replacements. That is, outside replacement CEOs, at median, typically make \$335,360 more than their predecessors while inside CEOs are typically paid only \$126,156 more than their predecessors. Brickley (2003) concluded that firm performance continues to explain very little variation of CEO turnover. Overall, despite literature consisted of excellent theoretical discussions on this topic, yet it lacked consistent empirical studies on the relationship between CEO compensation and CEO turnover.

#### 3. Research Methodology

This research had adopted quantitative research method as it is the method to be used for historical data collection and descriptive studies. The longitudinal study approach had been selected under quantitative research methodology to study corporate financial records from 2005 to 2010. The random sampling method had been selected for this research to obtain total sample population of twenty five companies from NYSE index. For statistical tests, CEO compensation was assigned as dependent variable; firm size was assigned as control variable and independent variable; and CEO performance and corporate governance had been assigned as independent variables. Each subvariables of CEO compensation had been used separately to test with all subindependent variables of firm size, firm performance, and corporate governance. The total of nine models were created to address this research question. The survey method had been adopted

as it is the most appropriate approach to collect historical data. The historical data of sampled companies had been obtained from TMX Group Inc. and CDS Inc. The inferential statisticsbased methodology, which is very instrumental to this quantitative research, had been used to obtain statistical results. The 95 percent confidence level will be assumed for all statistical tests.

# 4. Data Findings and Conclusions

# 4.1. CEO Compensation and Firm Size

# Table 1 (ANOVA)

	Salary	Bonus	Total Com- pensation
Firm Size	F(12,143)=18.111	F(2,128)=3.096	F(2,124)=43.735
	p=.000	p=.000	p=.000
	R <sup>2</sup> =0.202	R <sup>2</sup> =0.046	R <sup>2</sup> =0.430
Accounting Performance	F(8,137)=7.078	F(8,120)=195.156	F(8,112)=146.061
	p=.000	p=.000	p=.000
	R <sup>2</sup> =0.292	R <sup>2</sup> =0.929	R <sup>2</sup> =0.0113
Corporate Governance	F(7,137)=8.52	F <sub>(7,122)</sub> =.705	F(7,111)=5.174
	p=.000	p=.000	p=.000
	R <sup>2</sup> =0.303	R <sup>2</sup> =0.039	R <sup>2</sup> =0.244

The above ANOVA table 1 results were based on linear regression tests. It had shown that there was a relationship between CEO salary, CEO bonus, CEO total compensation, firm size, firm performance, and corporate governance, except for relationship between CEO bonus and corporate governance. The first, second, and third models between CEO salary, CEO bonus, CEO total compensation, and firm size were, .202, .046 and .430 respectively, as such characterized as weak to moderate models. Thus, it had illustrated that firm size had a weak impact on short-term CEO compensation and as such, was more favorable towards long-term CEO compensation structure. The fourth, fifth, and sixth models between CEO salary, CEO bonus, CEO total compensation, and accounting performance were .292, .929, and .913 respectively, as such characterized as moderate to strong models. That is, accounting performance had a moderate effect on CEO salary and strong effect on CEO bonus and total compensation, indicated that rewards were designed and weighted heavily with accounting performance. The seventh, eight, and nine models between CEO salary, CEO bonus, CEO total compensation, and corporate governance were .303, .039, and .244 respectively, as such characterized as weak to moderate models. That is, corporate governance had a moderate effect on CEO salary, however, it had a weak effect on CEO bonus and total compensation.

	Salary	Bonus	Total Com- pensation
Total Sales	0.37	-0.212	0.543
Total Em- ployees	0.207	-0.192	0.268

 Table 2 - Correlations (CEO Compensation vs. Firm Size)

The above table 2 illustrated that the correlation results between CEO salary, bonus, total compensation, and firm size. It had shown that there was a weak to moderate positive correlations existed between CEO salary, total sales, and total employees. That is, the correlation were .370 and .207, respectively. On the other hand, the correlations between CEO bonus, total sales, and total employees were weak negative ratios. That is, they were -.212 and -.192, respectively, indicated that firm size was totally ignored and in fact had a negative effect towards determining CEO bonus. The correlations between CEO total compensation, total sales, and total employees were ranged from weak to good positive ratios. That is, they were .543 and .268, respectively, indicated that CEO total compensation structure had some degree of influence by firm size.

#### **4.2. CEO Compensation and Firm Performance**

mance)			
	Salary	Bonus	Total Com- pensation
Return on Assets	078	0.078	0.027
Return on Equity	0.19	0.144	0.213
Earnings Per Share	-0.012	0.039	0.06
Cash Flow Per Share	0.18	-0.044	0.118
Net Prof- it Margin	0.003	0.29	0.386
Common Stock Out- standing	0.066	0.146	0.226
Book Value of Common Stock	0.217	0.344	0.383
Market Value of Common Stock	0.407	0.818	0.77

Table 3 – Correlations (CEO Compensation vs. Firm Performance)

The above table 3 illustrated the correlation results between CEO salary, bonus, total compensation, and firm performance. It had shown that there was a weak to moderate mixed correlations between CEO salary, return on assets (ROA), return on equity (ROE), earnings per share (EPS), cash flow per share (CFPS), net profit margin (NPM), common stock outstanding (CSO), book value of common Stock (BVCS), and market value of common stock (MVCS). That is, it illustrated that the correlations between them were -.078, .190, -.012, .180, .003, .066, .217, and .407. Thus, it signified that among balance sheets involved items such as return on assets, return on equity, and cash flow per share, influence to CEO salary was characterized as weak negative to weak positive ratios, perhaps due to CEO salary contract gives less importance to assets and related returns. Similarly, in the net earnings related items such as earnings per share, net profit margin, common stock outstanding, book value per common share, and market value per common share, influence to CEO salary was characterized as weak to moderate returns.

It was found that there was a weak negative to strong positive correlations between CEO bonus, return on assets (ROA), return on equity (ROE), earnings per share (EPS), cash flow per share (CFPS), net profit margin (NPM), common stock outstanding (CSO), book value of common stock (BVCS), and market value of common stock (MVCS). That is, it illustrated that the correlations between them were, -.078, .144, .039, -.044, .290, .146, .344, and .818. Thus, it indicated that among the balance sheets involved items such as return on assets, return on equity,

and cash flow per share, the influence to CEO bonus was characterized as weak negative to weak positive ratios. Similarly, in the net earnings related items such as earnings per share, net profit margin, common stock outstanding, book and market values per common share, the influence to CEO bonus was characterized as weak to strong positive ratios. That is, accounting ratios were insignificant except to market price of share, indicated that CEO bonus had been influenced by market activities.

The correlations between CEO total compensation, return on assets (ROA), return on equity (ROE), earnings per share (EPS), cash flow per share (CFPS), net profit margin (NPM), common stock outstanding (CSO), book value of common stock (BVCS), and market value of common stock (MVCS), were characterized as weak to strong positive ratios. That is, it illustrated that the correlations between them were, .027, .213, .060, .118, .386, .226, .383, and .770. Thus, it indicated that among balance sheets involved items such as return on assets, return on equity, and cash flow per share, the influence to CEO total compensation was also characterized as weak to strong positive ratios. Similarly, net earnings related items such as earnings per share, net profit margin, common stocks outstanding, book and market values per common share, had a weak to strong positive ratios. Thus, overall, equity related earnings had a material influence towards CEO compensation.

#### 4.3. CEO Compensation and Corporate Governance

0.249

0.217

0.017

-0.198

0.177

		<b>`</b>	1	
ernance)		-		_
			Total	
	Salary	Bonus	Compen-	
	-		sation	
CEO Age	0.151	-0.017	0.14	
CEO				
Shares	-0.10	-0.054	-0.181	
Out-	-0.10	-0.034	-0.101	

0.056

0.013

-0.047

0.031

0.15

standing CEO

Share Value CEO

Tenure CEO

Turnover MGMT.

5% ownership INDV./I NST. 5%

ownership 0.272

0.026

0.165

0.287

-0.178

Table 4 - Correlations	(CEO	Compensation	vs.	Corporate Gov-
ernance)				

The above table 4 illustrated the correlation results between CEO salary, bonus, total
compensation, and CEO corporate governance. It had shown that there was a weak negative to
weak positive correlations existed between CEO salary, CEO Age, CEO shares outstanding,
CEO shares value, CEO tenure, CEO turnover, 5 percent management ownership, and 5 percent
individual/institutional ownership. That is, correlations between CEO salary and corporate
governance were .151,100, .272, .026, .165, .287, and178, respectively. The positive
correlations were related to CEO age, CEO share value, CEO tenure, CEO turnover, and
management 5 percent ownership, indicated that CEO experience, market share price, duration

of CEO service, and management controlled of the firm, all had some level of influence to board of directors in determining CEO salary. The negative correlations between CEO salary, CEO shares ownership, and individual/institutional 5 percent ownership indicated that level of CEO equity and non-management ownership control were not considered by the board.

The correlations between CEO bonus and corporate governance were -.017, -.054, -.056, -.013, -.047, .031, and -.150, respectively. That is, the correlations were ranged from weak negative to weak positive ratios, except to CEO shares outstanding, indicated that non-accounting performance factors or CEO contract completely ignored corporate governance factors. That is, the board again ignored experience level of CEO, duration of CEO's service, CEO stocks ownership and value, and ownership structure, towards determining CEO bonus. The correlations between CEO total compensation and corporate governance were .140, -.181, .249, .217, .017, -.198, and .177, respectively. That is, the correlations between CEO total compensation, CEO turnover, and 5 percent individual/institutional ownership were found to be weakly positive. On the other hand, the correlations between CEO total compensation, CEO shares outstanding, and 5 percent management ownership had weak negative ratios. Overall, corporate governance had a weak influence on CEO compensation mainly due to strong influence of firm size and accounting firm performance.

#### 5. Conclusion

Overall, there was a relationship existed between CEO salary, CEO bonus, CEO total compensation, firm size, accounting firm performance, and corporate governance. The correlations between CEO salary, CEO bonus, CEO total compensation, and firm size were ranged from weak negative to strong ratios. The correlations between CEO salary, CEO bonus, CEO total compensation, and accounting performance were ranged from weak negative to strong positive ratios. The correlations between CEO salary, CEO bonus, CEO total compensation, and accounting performance were ranged from weak negative to strong positive ratios. The correlations between CEO salary, CEO bonus, CEO total compensation, and corporate governance, were ranged from weak negative to weak positive ratios.

#### Вопросы для размышления

- 1. Изучению, каких основных проблем посвящена статья, и какова роль настоящего исследования?
- 2. Насколько корректна приведенная методология исследования, каковы границы ее применимости в изучении данной проблемы?
- 3. Согласны ли вы с выводами и объяснением полученных результатов?
- 4. Как эта проблема выглядит в российской действительности?
- 5. Как бы вы построили исследование этой проблемы в России? Какие гипотезы можно сформулировать в этой области?

# Блок IV. «Управление проектами: проектный анализ, инвестиции, технологии реализации»

# Прочитайте статью<sup>4</sup> и сделайте ее критический анализ на русском языке.

#### Introduction

The article pursues two objectives: first, to investigate if project management practices, tools, and techniques are used in groups or clusters; and second, to investigate if and how practice varies among different types of projects. There are many ways to group or categorize project management practices. For example, PMBOK Guide (PMI, 2008) presents practices, tools, and techniques grouped in Knowledge Areas and Process Groups.

Is there a single best way to classify project management tools into Knowledge Areas? The idea of grouping the tools in such a way, was developed by teams working on previous versions of the PMBOK Guide as a way of classifying elements of project management knowledge for presentation in the document. This article aims to empirically identify a structure that underlies the actual practice of project management by investigating patterns in the use of project management practices, tools, and techniques. Practitioners most likely use their tools in groups. The study of their collective practice suggests that practitioners use toolsets according to some rationale, for special functions or specific purposes. The objective of the present research is to empirically explore the existence of these specialized toolsets as they are used by the community of project management practitioners. The article compares the levels of toolset use between project types, illustrating how the toolsets can be useful in providing an overall high-level view for the study of practice in a condensed format.

Regarding the second goal of the article, to investigate if and how practice varies among different types of projects, there is a general recognition that project management is practiced differently in various contexts.

The variations among different types of projects are among the most significant found in the overall study. For this reason, the authors have chosen to present the comparisons among four types of projects. The research questions are:

• Are project management practices, tools, and techniques used in clusters or groups?

• Does the level of use vary by project type?

# **Literature Review**

Within the project management literature, research on practices focuses primarily on small and specific groups of practices. Several studies compare a larger number of practices, but most often in a specific context. This research on practice does not allow for comparative evaluation of the relative use of the whole body of practices. There have been few studies examining differences in project management practice between industries, project types, and contexts.

The study by Papke-Shields et al. (2010) is of particular interest because it not only examines a wide range of practices and their contextual variation, but also the grouping of practices into the *PMBOK*<sup>®</sup> *Guide* (PMI, 2008) Knowledge Areas. The approach taken in the article uses principal component analysis (PCA) to identify groupings that are found in practice. The two approaches are complementary. However, the approach adopted here allows for the identification of groupings that are used in practice that may or may not correspond to the conceptual groupings found in predefined Knowledge Areas. If groupings are found that are similar to predefined categories, this can constitute a validation. If other groupings are found, this opens up opportunities for development outside of the predefined categories that may be closer to real practice.

<sup>&</sup>lt;sup>4</sup> На основе статьи Besner C., Hobbs B. An Empirical Identification of Project Management Toolsets and a Comparison Among Project Types. // *Project Management Journal*, V.43, No5, p. 24-46 (2012).

# Methodology

# The Survey Instrument

The research is based on a survey, which collects data on four categories of variables:

1. Respondent demographics (position, education, experience, etc.).

2. Organizational context (geographic region, size, industry, project management maturity, etc.).

3. Project characteristics (size, complexity, etc.).

4. Project practice (extent of use of project management specific practices, tools, and techniques).

The questions relative to the first three categories of variables are very straightforward. The measure of project management practice is discussed in the following subsection. The questions on respondent demographics are used primarily to ensure that respondents are in fact experienced project practitioners. Project practice is investigated through the analysis of the fourth category of variables—project practice. Contextual variation in practice is investigated through the analysis of variations in practice relative to organizational and project characteristics.

# The Measure of Project Practice

The description of practice is provided by survey data on the intensity of use of 108 wellknown project-specific tools and techniques. The assumption is that by indicating which tools and techniques they actually use in their day-to- day work, project management practitioners provide a description of their practice — what they actually do when they manage projects.

A total of 108 practices, tools, and techniques specific to project management have been preselected by the authors based on the criteria that the practices be (1) project-specific, (2) well-known, and (3) specific practices as opposed to general processes. Later in the research the list of practices, tools, and techniques was used for the toolsets' creation and their level of usage estimation (see Appendix A – bold - for the toolsets' names and ordinary type – for the tools). For each tool or technique, the respondents answered the following question using a 5-point Likert scale:

• How extensively do you use this tool or technique?

# The Dataset

Data has been collected from 2,339 practitioners worldwide through a web-based questionnaire, in three phases, in 2004, 2007, and 2009, respectively. Of the 108 practices, tools, and techniques, 18 are only part of phase 1, leaving 90 tools common to phases 2 and 3. Subsamples by phase are used when appropriate. Globally, results were found to be very stable from one phase to the other. The respondents were mostly between 30 and 50 years old (71.6%). Their current primary role and the average number of years of experience in this role were as follows: team member (9%; 8 years); project manager (50%; 8 years); program manager/director (31%; 5 years); and other (12%; 6 years).

The respondents presented next industries: business and financial services (15% of the sample), engineering and construction (14%), information technology and telecommunication (44%), computer software and data processing project (9%); and a variety of other project types (18%). The unit of analysis in the first part is "extensiveness of use of 108 tools" and in the second part is "extent of use of 19 toolsets".

# Identification of the Groups of Practices, Tools and Techniques, or "Toolsets"

Each of the 108 tools, techniques, and practices identified in this research is not used in complete isolation from all the others. In practice, the use of many tools is linked one to the other to form groups of tools that are referred to in this research as "toolsets." When one tool of the set is used, the other tools of the set have a greater chance of being used at the same time or in the same context.

For example, a work break- down structure (WBS) is mostly used at the beginning of a project and could be part of the "initial planning" toolset, but it could also be used at the end of a project to verify whether all project content was duly delivered. Grouping tools into toolsets in

such a fashion that each tool is part of only one toolset produces a simplified representation of reality, but such a model based on toolsets that are specific and distinct greatly simplifies the representation and the interpretation of project management practice. Another important consideration is that as many tools as possible be included in the toolsets; leaving few "orphan tools" not included in any toolset. A procedure was developed and applied to the data to identify toolsets. Following the description of the toolset identification procedure, the characteristics of the resulting toolsets are examined and discussed.

PCA, a classic data reduction technique, and a panel of 45 experts, were employed together with researchers' judgment in the identification of 19 toolsets. The results of PCA were enhanced in a multistep process to include as many tools as possible, including those that were only part of phase 1.

The number of components to extract was determined using the "eigenvalues greater than one" Kaiser Criterion (Fields, 2000). The original PCA produced 14 groups, accounting for 63% of the total variance. Factor loading was set to 0.5 but was on some occasions lowered to 0.46 in order to include more items when interpretation of the enriched component appeared clearly comprehensible. Both orthogonal rotation (varimax) and non-orthogonal rotation (oblimin) were tested, and the exact same set of factors was found. This result substantiates the robustness of the groupings.

The 14 toolsets identified by PCA incorporate 60 of the 90 tools. Therefore, 30 tools were left as orphans (i.e., not incorporated in a toolset by PCA). The use of PCA allowed the identification of 14 useful unrelated toolsets but left 37% of the variance unexplained, leading to an incomplete representation of practice. Considering the objective to reduce the data without losing valuable information, diversity, and completeness of actual practice, an effort was made to incorporate these orphans in the 14 toolsets already identified or to group them in new toolsets.

### **Toolset Enhancement Process**

A panel of 45 experts, was invited to propose groups of tools from the list of 90 tools. The directive was to make groups based on how their uses were correlated and not make conceptual groupings on another basis.

1. Each member of the panel of experts was asked to group the tools, with no restriction on the number of toolsets or the number of items per toolset.

2. The frequency with which the experts grouped each pair of tools together was computed. Agreement between the experts was defined to be more than 10 experts suggesting the same pair. The result was mapped on a matrix of 90 rows by 90 columns.

3. The pairs of tools identifiable from the PCA results were mapped on a similar matrix. The superimposition of the matrices produced an interesting match of clouds of pairs.

4. All the orphans from the PCA that were matched by expert agreement with a tool composing one of the 14 toolsets were identified. These were treated as suggestions by the experts for enhancing the 14 toolsets identified through the PCA.

5. Each "expert suggestion" was tested by calculating a new Cronbach's alpha (an indicator, which shows the level of "expert suggestion" reliability) for the enhanced toolset. If the alpha increased following the inclusion of the orphan item, this item was incorporated into the toolset; if not, the item was left as an orphan. Six tools (items) were added in this way to one or another of the 14 toolsets.

6. The enhancement of the 14 original toolsets left 24 orphans (30–6). A second PCA procedure was applied on the orphans alone. Researchers' judgment together with the PCA results led to the creation of four additional toolsets. One of these new toolsets was combined with one of the 14 original toolsets (baseline change management). This resulted in the identification of a total of 17 toolsets.

7. 4 tools were left as orphans, the last two formed the 15th toolset of the original PCA, but was rejected because of the lack of their reliability.

8. The final set of 17 toolsets is complemented by two additional toolsets, the 18th and 19th, that could only be identified a posteriori (the data related to them was only collected during the first phase of the research: the 18th toolset is associated with cost estimation; the 19th toolset is associated with quality management). Nine tools from phase one was left as orphans.

# The Toolsets Identified

The composition of each toolset can be found in Appendix A. The toolsets identified acceptable reliability. The data covers the entire range of the 5-point scale on which it is measured. The means and the standard deviations are shown in Table 1. The skewness and kurtosis measures are all between minus 1 and plus 1, which are very good values, confirming normality.

Toolsets	Name	Use Level	Standard Deviation	
1	Risk management	2.71	1.07	10
2	Basic project management software	2.95	1.04	3
3	Advanced project management software	1.91	0.91	19
4	Multiproject management	2.32	0.94	13
5	Databases	2.10	1.06	16
6	Initial planning	3.27	0.85	1
7	Bidding and fixed-price contract	2.72	1.05	5
8	Business case definition	2.94	0.86	4
9	Business benefits measures	2.12	0.99	15
10	Baseline change management	2.76	0.86	7
11	Network planning	2.13	0.95	14
12	Financial evaluation	2.71	1.16	8
13	Team management	2.37	0.79	12
14	Variable-price contract	1.96	0.90	18
15	Project closure	2.95	0.96	2
16	Monitoring progress	2.81	0.87	6
17	Project analysis	2.68	0.82	11
18	Cost estimation	2.42	0.92	17
19	Quality	2.09	0.89	9

The toolset model includes most of the 108 tools; only 13 "orphans" are left out of the model. The output of the initial PCA produced 14 uncorrelated toolsets, but as a consequence to the subsequent enhancement process, the toolsets are no longer independent. Table 2 shows the 12 pairs of toolsets correlated above 0.60; they are reproduced under and above the diagonal. In practice, several toolsets are linked one with the other. The first 4 toolsets in Table 2 are highly interconnected conceptually and practically, and are correlated one with the other.

	Baseline	Duciant	Tu:tial	Duo guo ga	Diale	h.r.	T	
Toolsets	Change Management	Project Closure	Initial Planning	Progress Monitoring	Risk Project	Manageme Analysis	Planning	Progress Monitori
Baseline change		0.65	0.67	0.73	0.6	0.61		
Project closure	0.65		0.67	0.61	0.61		0.61	
Initial planning	0.67	0.67		0.6		0.63		
Progress	0.73	0.61	0.6					0.64
Risk management	0.6	0.61						
Project analysis	0.61		0.63					
Databases		0.61						
Team man-ment				0.64				
Table 2: Correlations between toolsets >0.60.								

# **The Toolset Descriptions**

The combination of the toolsets content, resulted from the first steps then was formed as a basis for the next task fulfillment: estimation of each toolset average level of use and its elements in particular (Appendix A). Presenting items according to their level of use allows a better understanding of the extensiveness of practice, because they can vary a great deal.

# Comparing Toolsets With the Content of the PMBOK® Guide

As far as one of the most widely spread project management standards is PMBok, so there is necessity to compare the level of use of project management tools regards knowledge areas and toolsets (see table 3).

Research Results		PMBOK® Guide				
Toolsets         Us		<b>Knowledge</b> Areas	<b>Process Groups</b>	Treatment		
Initial planning	3.27	Several	Initiating	Extensive		
Project closure	2.95		Closing	Extensive		
Basic PM software functionality	2.95	Time and Cost	Planning and Controlling	Extensive		
Business case definition	2.94	Integration	Initiating	Summary		
Bid and fixed-price contracts	2.81	Procurement		Extensive		
Progress monitoring	2.76	Time and Cost	Monitoring and Controlling	Extensive		
Baseline change management	2.72	Scope, Time, and Cost	Monitoring and Controlling	Extensive		
Financial evaluation	2.71		Initiating	Summary		
Project analysis	2.71		Initiating	Summary		
Risk management	2.68	Risk		Extensive		
Cost estimation	2.42	Cost	Planning	Extensive		
Team management	2.37	Human resource		Extensive		
Multiproject management	2.32	Out of scope	Out of scope	Out of		
Network planning	2.13	Time	Planning	Extensive		
Business benefits measures	2.12		Initiating and Controlling	Summary		
Databases	2.10	Risk and Cost		Summary		
Quality	2.09	Quality		Extensive		
Variable-price contract	1.96	Procurement		Extensive		

Advanced PM software	1.91	Time and Cost	Planning and Controlling	Extensive			
Table 3: A comparison of the toolsets with the content of the PMBOK® Guide.							

In Table 3, the toolsets are presented in decreasing order of extent of use. A summary attempt has been made to evaluate the relative importance of the tools from each toolset within the PMBOK Guide by estimating the extent of treatment.

We should say that the evaluations are of too general a nature to support recommendations, but these results should provide some food for thought for those involved in producing and updating project management standards.

#### **Comparing Practice Between Project Types**

Nowadays, few studies have taken a broad perspective when comparing practice between project types of different industries. The next step of our research is to define the significant differences among (a) the contexts in which different types of projects are fulfilled (see table 4) and (b) among toolsets used by project type.

The significant differences in practice among the project types are revealed. The toolsets are listed in decreasing order of extent of use in the entire sample in the table 5. The first column of each project type gives the rank of the toolsets for the particular type; the column with the plus, minus, or equal sign indicates the differences in use.

Project Types		Business and Financial Services	Engineering & Construction	IT & Telecom	Software Dev-ment				
Contextual Variables	N	188	176	569	12				
Organizations in the private sector		=	=	=	=				
International projects		_	=	=	+**				
Internal business		+*	_	=	=				
Organizational size		*	_*	+***	=				
Project size		_	+**	=	_***				
Level of project definition		=	+**	=	=				
Degree of complexity		=	+*	=	***				
Degree of innovation		=	_	=	=				
Degree of similarity of projects		=	=	=	=				
Projectized structure		=	+*	=	=				
Project part of program		=	_*	=	=				
Participation in Initiation/concept phase		=	_	=	=				
Number of phases in which the practitioner is involved		=	 **	=	+***				
Maturity		=	=	=	=				
* $0.100 > p > 0.049$ . ** $0.05 > p > 0.01$ . *** $p < 0.01$ . <b>Table 4:</b> Significant differences in the contexts in which different types of projects are found.									
Project Types		Businessand Financial Services	Difference	Engineering & Construction	Difference	IT & Telecom Project	Difference	Software Development	Difference
--	-------	--------------------------------------	---------------	-------------------------------	------------	----------------------------	------------	-------------------------	------------
Tookets	N	18	8	17	6		569	12	0
Initial planning	1	1	=	2	_**	1	$+^{***}$	1	Ш
Project ending	2	3	=	3	=	3	$+^*$	3	=
Basic PM software functionality	3	5	_**	4	=	2	+***	2	=
Business case definition	4	2	+**	10	_***	4	+*	4	=
Bid and fixed-price contracts	5	9	_***	1	+***	7	=	7	=
Progress monitoring	6	6	=	6	=	5	=	6	=
Baseline change management	7	10	_***	5	=	6	+**	9	=
Financial evaluation	8	4	=	9	=	10	=	5	_**
Project analysis	9	7	=	8	=	9	=	10	=
Riskmanagement	10	8	=	11	=	8	$+^{**}$	8	Ш
Costestimation	11	12	=	7	+***	12	=	N⁄A	N/A
Team management	12	11	=	16	_****	11	+**	12	=
Multiproject management	13	13	=	13	=	13	=	13	=
Network planning	14	16	_**	14	+**	14	=	15	Ш
Business benefits measures	15	14	=	18	=	15	=	17	=
Databases	16	15	=	15	+***	17	=	14	=
Quality	17	17	_*	12	+***	16	=	N⁄A	N/A
Variable-price contract	18	18	_*	17	+***	19	=	11	_*
Advanced PM software use	19	19	=	19	_*	18	=	16	Ш
*0.100>p>0.049. **0.05>p>0.01. ****p<0.01.									
Table 5: Diffe	rence	s of toolset use by	yprojecttype.						

## Conclusion

The description of practice is provided by survey data on the intensity of use of 108 well-known project-specific tools and techniques. The assumption is that by indicating which tools they actually use, project management practitioners provide a description of their practice. The specificity of the present research is that the description of practice here is based on quantitative data, whereas most other investigations of project as practice are based on qualitative data. The received results can contribute to the enrichment of the descriptions of practice emerging from the qualitative stream of research.

This article addresses two research questions:

1. Are project management practices, tools, and techniques used in clusters or groups?

2. Does the level of use vary by project type?

Regards the first question, the results indicated that practices, tools, and techniques are used in clusters or groups, referred to as "toolsets" in this article. This result has implications for both managers and researchers. The task of those responsible for the management of project management practice in an organization is greatly simplified because instead of managing more than a hundred individual practices, they can manage practices in a much smaller number of groups. This facilitates activities related to training and competency development and to the selection, development and continuous improvement of project management practice. Toolsets are used in many different contexts, each with its particular management problems, for which project management practices have been adapted.

From a research point of view, the identification of clusters of practices provides an insight into the dynamics of project management as it is practiced in reality. This opens up opportunities for future research into the evolution of practice within organizations by asking how clusters of practice emerge and develop over time.

The answer for the second question is received through the identification of significant differences in the extent of use of toolsets among practitioners working on different types of projects. The results show significantly different and contrasting patterns of practice among the four types of projects examined here.

The results have implications for both managers and researchers. For practitioners the results provide detailed information on the ways in which practice varies from one type of project to another. This information allows them to make informed choices adapted to their context.

For researchers, the results here contribute to the contingent approach to project management. It is widely accepted that practice varied contextually. This research provides both a validation of this approach and much more detail than was previously available.

From a methodological perspective, the results point to the need to develop methodologies to deal with the multidimensional nature of contextual variation.

The results presented in this article are exploratory. As is often the case with exploratory research, the results open up many avenues for future research. In addition, the results of exploratory studies such as this require replication.

	Average Us	se	Average Use
Toolset: Risk management	2.68	Toolset: Databases	2.10
Risk management documents	2.91	Database of historical data	2.23
Ranking of risks	2.84	Database for cost estimating	2.17
Contingency plans	2.77	Database of lessons learned	2.08
Assignment of risk ownership	2.70	Database of risks	1.91
Graphic presentation of risk information	2.17		
		Toolset: Initial planning	3.27
Toolset: Basic PM software functionality	2.95	Kick-off meeting	3.74
Gantt chart	3.59	Milestone planning	3.47
PM software for task scheduling	3.52Scc	ppe statement	3.40
PM software for monitoring of schedule	3.06	Work breakdown structure	3.32

# Appendix A: List of Toolsets With Their Content

PM software for resource scheduling	3.0
PM software for monitoring of cost	2.:
PM software for resource leveling	2.:
PM software for multiproject scheduling	2
Toolset: Advanced PM software functionality	1.9
PM software for multiproject resource	2.2
PM software Internet access	2.
PM software for issue management	2.0
PM software for project portfolio analysis	1.8
PM software linked with ERP	1.0
PM software for scenario analysis	1.:
Appendix A: (continued)	
Toolset: Multiproject management	2
Program master plan	2.0
Project priority ranking	2.:
Project portfolio analysis	2.2
Organizational capacity analysis	2.2
Multi-criteria project selection	2.2
Graphic presentation of portfolio	1.9
Toolset: Business benefits measures	2.12
Financial business benefits metrics	2.22
Medium-term post evaluation of success	2.18
Nonfinancial business benefits metrics	1.97
Toolset: Baseline change management	2.72
Change request	3.48
Baseline plan	3.16
Change control board	2.87
Rebaselining	2.69
Configuration review	2.40
Management reserve	2.39
Recovery schedule	2.06
Toolset: Network planning	2.13
Critical path method and analysis	2.63
Network diagram	2.25
Probabilistic duration estimate (PERT	1.85
Critical chain method and analysis	1.78
Toolset: Financial evaluation	2.71
Cost/benefit analysis	2.83
ROI, VAN, IRR, or payback	2.58

2	22	Client acceptance form	3.06
	12	Toolset: Project closure	2.95
	1.98		
	2.25		
	2.26	Updated business case at gates	2.37
	2.28	Project mission statement	2.70
	2.54	Business case	3.07
	2.60	Business opportunity/problem definition	3.11
	2.32	Needs analysis	3.12
		Assigned project sponsor	3.29
	1.57		
	1.65		
	1.84	Contractual commitment data	2.26
	2.00	Bid/seller evaluation	2.60
	2.19	Bid documents	2.86
	2.21	Fixed-price contract	3.06
	1.91	Contract documents	3.29
		Toolset: Bidding and fixed-price contract	2.81
	2.36		
	2.51	Communication plan	2.92
	2.56	Responsibility assignment matrix	3.01
	3.0	Project charter	3.04

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2.22	Client acceptance form	3.06
2.18	Project closure documents	3.06
.97	Lesson learned/post-mortem	2.93
	Customer satisfaction surveys	2.92
2.72	Quality plan	2.78
8.48	Toolset: Progress monitoring	2.76
.16	Progress report	3.86
2.87	Stage gate reviews	2.76
2.69	Project scorecard/dashboard	2.67
2.40	Monitoring critical success factors	2.64
2.39	Trend report	2.39
2.06	Earned value	2.25
2.13	Toolset: Project analysis	2.71
2.63	Requirements analysis	3.47
2.25	Feasibility study	2.71
.85	Stakeholder analysis	2.62
.78	Value analysis	2.04
2.71		
2.83	Toolset: Cost estimation	2.42

3.04

# Национальный исследовательский университет «Высшая школа экономики»

Bottom-up estimating

Toolset: Team management	2.37	Top-down estimating	3.02
Self-directed work teams	2.66	PM software for cost estimating	2.18
Team-building event	2.63	Parametric estimating	2.04
Project website	2.38	Life cycle cost (LCC)	1.98
Project war room	2.24	Toolset: Quality	2.09
PM community of practice	2.18	Quality inspection	3.16
Team development plan	2.16	Control charts	1.81
		Cause and effect diagram	1.74
Toolset: Variable-price contract	1.96	Pareto diagram	1.70
Contract penalties	2.24	Cost-plus contract	2.17
		Gain-share contract	1.49

## Вопросы для размышления

- 1. В чем заключается проблема, цель и методология исследования статьи? Имеет ли данная статья практическую значимость?
- 2. Проанализируйте результаты оценки уровня использования наборов инструментов, выявленных в статье (см. приложение А)? На ваш взгляд, какие из инструментов являются наиболее востребованными и почему?
- 3. В чем, по вашему мнению, состоят различия в применении проектного инструментария в зависимости от типов проектов, контекста, условий реализации и отраслей экономики?
- 4. Если бы вы гипотетически участвовали в каком-либо проекте, то какие инструменты, выявленные в статье, были бы для вашего проекта наиболее полезны и почему?
- 5. Приведите примеры нескольких проектов (три или четыре), при реализации которых, предпочтения в выборе проектного инструментария могли бы быть отданы тем или иным группам инструментов в зависимости от типа проектов (критерии типов проектов выбираются самостоятельно автором). Обоснуйте ваш выбор.

## Блок V. «Управление человеческими ресурсами»

# Прочитайте статью<sup>5</sup> и сделайте ее критический анализ на русском языке.

## Introduction

Research in the area of knowledge management indicates that the ability to create and transfer knowledge internally is one of the main competitive advantages of multinational corporations (MNCs). The MNC is considered to be a 'differentiated network', where knowledge is created in various parts of the MNC and transferred to several inter-related units (Hedlund, 1986; Bartlett and Ghoshal, 1989). Conceptualizing the MNC as a differentiated network has inspired a recent stream of research on the creation, assimilation, and diffusion of internal MNC knowledge emphasizing the role of subsidiaries in these processes (Holm and Pedersen, 2000).

It has been proposed in the knowledge transfer literature that the absorptive capacity of the receiving unit is the most significant determinant of internal knowledge transfer in MNCs (Gupta and Govindarajan, 2000). Subsidiaries differ in their absorptive capacity, and this affects the level of internal knowledge transfer from other MNC units. The literature, however, offers multiple methods to conceptualize and operationalize absorptive capacity, often not capturing the various facets of absorptive capacity. Moreover, little attention has been paid to the question of whether organizations can enhance the creation and development of absorptive capacity. Clearly, with a few exemptions, the characteristics of knowledge transfer and absorptive capacity have not been treated as endogenous to organizational processes and arrangements (Foss and Pedersen, 2002). This is true in spite of the commonly accepted idea that organizational learning is closely linked to how an organization manages its human resources (e.g., Lado and Wilson, 1994). For instance, limited investments in training and development may result in low levels of employee knowledge and skills, thereby inhibiting learning. In their study of relative absorptive capacity and interorganizational learning, Lane and Lubatkin (1998) assert that both compensation practices and organizational structures are positively associated with absorptive capacity as well as interorganizational learning. However, our knowledge of how human resource management (HRM) influences the absorptive capacity of a subsidiary and internal MNC knowledge transfer is still very rudimentary.

The contribution of this paper is twofold. First, we contribute to the conceptualization of absorptive capacity by emphasizing employees' motivation as well as employees' ability as the important aspects of absorptive capacity. Second, while many other studies have focused on the importance of absorptive capacity for knowledge transfer (e.g., Lyles and Salk, 1996; Lane and Lubatkin, 1998; Lane et al., 2001), we extend these studies by exploring the types of organizational mechanisms that increase absorptive capacity. Our approach differs from the previously mentioned studies, as we do not just explore the impact of absorptive capacity as an endogenous part of the model. The paper is structured as follows: in the next section, we review the literature on MNC knowledge transfer and absorptive capacity. Based on the literature review, we develop hypotheses on: (1) the relationship between different aspects of absorptive capacity and motivation – and the level of knowledge transfer and (2) HRM practices and employees' ability and motivation. Finally, we explain the methodology employed, followed by a discussion of the results and implications of the study.

# Knowledge transfer within MNCs

<sup>&</sup>lt;sup>5</sup> На основе статьи Minbaeva, D., Pedersen, T., Björkman, I., Fey, C. F., & Park, H. J. (2003). MNC knowledge transfer, subsidiary absorptive capacity, and HRM. Journal of International Business Studies, 34(6), 586-599.

The interest in knowledge within MNCs, its sources and transfer, has been expanding (e.g., Gupta and Govindarajan, 2000). MNCs are no longer seen as repositories of their national imprint but rather as instruments whereby knowledge is transferred across subsidiaries, contributing to knowledge development (Holm and Pedersen, 2000). A common theme in this line of research is that MNCs can develop knowledge in one location but exploit it in other locations, implying the internal transfer of knowledge by MNCs. Thus, the competitive advantage that MNCs enjoy is contingent upon thei ability to facilitate and manage intersubsidiar transfer of knowledge. Hedlund (1986) and Bartlett and Ghoshal (1989), for example, focused on how to organize and structure MNCs in order to facilitate the internal flow and transfer of knowledge in MNCs.

Szulanski (1996) emphasized that 'the movement of knowledge within the organization is a distinct experience, not a gradual process of dissemination' (p. 28). In his view, knowledge transfer is a process of dyadic exchanges of knowledge between the source and recipient units consisting of four stages: initiation, implementation, ramp-up and integration. While the first two stages comprise all events that lead to the decision to transfer and the actual flow of knowledge from the source to the recipient, the latter two stages begin when the recipient starts utilizing the transferred knowledge. Clearly, pure transmission of knowledge from the source to the recipient has no useful value if the recipient does not use the new knowledge. The key element in knowledge transfer is not the underlying (original) knowledge, but rather the extent to which the receiver acquires potentially useful knowledge and utilizes this knowledge in own operations. Knowledge transfer may lead to some change in the recipient's behavior or the development of some new idea that leads to new behavior (Davenport and Prusak, 1998). This is in line with the definition of organization learning often put forth in the literature, where organizational learning involves a change in organizational outcomes (see Fiol and Lyles (1985) for an overview of this literature). Accordingly, we define knowledge transfer between organizational units as a process that covers several stages starting from identifying the knowledge over the actual process of transferring the knowledge to its final utilization by the receiving unit. In the context of MNC, the other units are the headquarters and other subsidiaries in the corporation, while the receiving unit is the focal subsidiary.

Knowledge transfer is not a random process and organizations can institute various internal policies, structures, and processes to facilitate learning (Inkpen, 1998). More recently, much of the empirical research on intra-company knowledge transfer has been focusing on different factors that hinder or stimulate knowledge transfer (see Chapter 5 in Argote (1999) for a detailed review). Ghoshal and Bartlett (1988) concluded that communications between organizational units facilitate knowledge flows within MNC. Simonin (1999) suggested that knowledge ambiguity plays a critical role as mediator between explanatory variables (e.g., tacitness, prior experience, complexity, cultural distance, and organizational distance) and transfer outcomes. These effects were moderated by the capacity of the firm to support learning. Gupta and Govindarajan (2000) observed that the knowledge inflows into a subsidiary are positively associated with the richness of transmission channels, motivation to acquire knowledge, and capacity to absorb incoming knowledge.

Szulanski (1996) studied the impediments to the transfer using a slightly different approach. He applied all sets of factors together in an eclectic model to measure their relative impact on knowledge transfer (internal stickiness). His findings suggest that along with causal ambiguity and relationships between source and recipient units, the recipients' lack of absorptive capacity is the most important impediment to knowledge transfer within the firm. The role of absorptive capacity of the receiving unit also stands out as the most significant determinant of knowledge transfer in a number of other studies (e.g., Lane and Lubatkin, 1998; Gupta and Govindarajan, 2000).

## Absorptive capacity

In their seminal work, Cohen and Levinthal (1990) defined absorptive capacity as the 'ability to recognize the value of new external information, assimilate it, and apply it to commercial ends' (p. 128). Cohen and Levinthal (1990) assumed that a firm's absorptive capacity tends to develop cumulatively, is path dependent and builds on existing knowledge: 'absorptive capacity is more likely to be developed and maintained as a byproduct of routine activity when the knowledge domain that the firm wishes to exploit is closely related to its current knowledge base' (p. 150).

Building on the concept of absorptive capacity, Lyles and Salk (1996) included international joint ventures' (IJV) capacity to learn as an independent variable to analyze knowledge acquisition from a foreign parent. Their results indicate that the 'capacity to learn, mainly the flexibility, and creativity' (p. 896), is a significant indicator of knowledge acquisition from the foreign partner. Taking Lyles and Salk's conclusion as a starting point, Lane et al. (2001) refined the absorptive capacity definition offered by Cohen and Levinthal. They propose that 'the first two components, the ability to understand external knowledge and the ability to assimilate it, are interdependent yet distinct from the third component, the ability to apply the knowledge' (p. 1156).

Lane and Lubatkin (1998) further reconceptualized the concept and proposed that absorptive capacity is a dyad-level construct – denoted relative absorptive capacity – rather than a firm level construct. Lane and Lubatkin (1998) and later Lane et al. (2001) found support for the concept of relative absorptive capacity. In fact, Lane and Lubatkin (1998) tested the traditional measure of absorptive capacity of R&D as a share of sales (e.g., applied by Cohen and Levinthal, 1990) against their own measures of relative absorptive capacity (three bibliometricbased measures of knowledge and five knowledge-processing-similarity variables). They found that the traditional measure of R&D spending explained only 4% of the variance in interorganizational learning, while the knowledge similarity variables explained another 17% and the five knowledge-processing-similarity variables explained an additional 55%. A number of significant conclusions can be drawn from these studies. First, absorptive capacity should be understood in its context indicating that in some instances absorptive capacity should be treated as a dyad-level construct rather than as a firm-level construct. Second, traditional measures of absorptive capacity (e.g., R&D spending) may be inappropriate as they only partly capture the dvadic construct. Thus, relative absorptive capacity is 'more important to interorganizational learning than the commonly used measure of absolute absorptive capacity' (Lane and Lubatkin, 1998, 473) There is, however, a limitation to the generalizability of Lane and Lubatkin's conclusion. Both studies - Lane and Lubatkin (1998) and Lane et al. (2001) - were conducted within the context of IJVs where two independent companies were involved in the process of knowledge transfer. In this study, the knowledge transfer takes place between organizational units within the same firm, where the organizational structures, systems, practices, etc. are expected to be more similar than between independent companies. Thus, the relative absorptive capacity is of minor importance in the context of internal MNC knowledge transfer.

In a recent article, Zahra and George (2002) summarized representative empirical studies on absorptive capacity. According to Zahra and George (2002), absorptive capacity has four dimensions – acquisition, assimilation, transformation, and exploitation – where the first two dimensions form potential absorptive capacity, the latter two – realized absorptive capacity. They argue that more attention should be devoted to studying the realized absorptive capacity which emphasizes the firm's capacity to leverage the knowledge that has been previously absorbed (Zahra and George, 2002). As put forward by Zahra and George (2002) 'firms can acquire and assimilate knowledge but might not have the capability to transform and exploit the knowledge for profit generation' (p. 191). Zahra and George (2002) criticized the existing studies for applying measures (like R&D intensity, number of scientists working in R&D departments, etc.) that 'have been rudimentary and do not fully reflect the richness of the

construct' (p. 199). Such an approach neglects the role of individuals in the organization, which is crucial for knowledge utilization and exploitation.

The aim of this paper is to add to the existing literature on absorptive capacity in two important directions: (1) the concept: in terms of the conceptualization and measurement of absorptive capacity, we follow the path of recent contributions (e.g., Zahra and George, 2002) and aim our efforts at studying the firm's capacity to utilize and exploit previously acquired knowledge. We identify employees' ability and motivation as the key aspects of the firm's absorptive capacity that in turn facilitates internal knowledge transfer; and (2) the development: we consider different organizational practices which may contribute to the development of absorptive capacity that is not often examined in the literature. In particular, we identify specific HRM practices that managers might implement to develop the absorptive capacity of their organizations.

#### The concept

A firm's absorptive capacity is an organization-level construct that resides with its employees. The absorptive capacity has two elements: prior knowledge and intensity of effort (Cohen and Levinthal, 1990; Kim, 2001). 'Prior knowledge base refers to existing individual units of knowledge available within the organization' (Kim, 2001, 271). Thus, employees' ability, their educational background, and acquired job-related skills may represent the 'prior related knowledge' which the organization needs to assimilate and use (Cohen and Levinthal, 1990). However, in addition to the prior related knowledge, there should be a certain level of 'organizational aspiration' which is characterized by the organization's innovation efforts (Cohen and Levinthal, 1990). As proposed by Kim (2001), 'the intensity of effort refers to the amount of energy expended by organizational members to solve problems' (p. 271).

Employees' intensity of effort is well studied in the cognitive process theories such as the expectancy- valence theory of work motivation (see Vroom, 1964). Motivated employees want to contribute to organizational effectiveness. Even though the organization may consist of individuals with high abilities to learn, 'its ability to utilize the absorbed knowledge will be low if employees' motivation is low or absent' (Baldwin et al., 1991, 52). The ability/can do factor usually denotes 'a potential for performing some task which may or may not be utilized' (Vroom, 1964, 198), while the motivation/will do factor reflects drive. The prior knowledge base (or employees' ability) and intensity of efforts made by the organization (or employees' motivation) is related to the concept of potential and realized absorptive capacity, since potential absorptive capacity is expected to have a high content of employees' motivation.

The behavioral science literature suggests that both employees' ability and motivation are of importance for organizational behavior. To achieve a high performance at any level, both the ability and motivation to perform effectively are needed (Baldwin, 1959). Empirical evidence supports an interactive, not additive, effect of ability and motivation on performance (e.g., French, 1957; Fleishman, 1958; Heider, 1958; O'Reilly and Chatman, 1994). Applying the concept of an interaction effect of ability and motivation on the issue of knowledge transfer, we expect that a higher rating in knowledge utilization will be achieved, if knowledge receivers have both the ability and motivation to absorb new external knowledge.

Thus, we propose the following hypothesis:

*Hypothesis 1. The interaction between employees' ability and motivation will increase the level of knowledge transfer to the subsidiary.* 

## The development

Existing literature has paid little attention to how absorptive capacity is created and developed in the firm, rather taking for granted that this process does occur. To understand the sources of a firm's absorptive capacity, Cohen and Levinthal focused on 'the structure of

communication between the external environment and the organization, as well as among the subunits of the organization, and also on the character and distribution of expertise within the organization' (p. 132). These factors emphasize environmental scanning and changes in R&D investments but pay very little attention to other internal organizational arrangements and their role in absorptive capacity creation and development. For example, little is known about how managerial practices may increase absorptive capacity and help diffuse knowledge inside the firm. The few studies that have included organizational characteristics (e.g., Lane and Lubatkin, 1998; Gupta and Govindarajan, 2000) call for further research on 'the learning capacities of organizational units,' 'organizational mechanisms to facilitate knowledge transfer,' etc. Based on our definition of absorptive capacity as being related to both employees' ability and motivation, we intend to treat the development of absorptive capacity endogenously by identifying the organizational mechanisms (HRM practices), which shape the organization's absorptive capacity.

## **HRM practices**

In his influential study of the impact of 'high performance work practices' on organizational turnover, productivity and corporate financial performance, Huselid (1995) factoranalyzed a number of HRM practices into two categories: those mainly influencing employees' abilities and those impacting employees' motivation. Huselid (1995) emphasized the interactive effect of HRM practices that influence ability and motivation. Similar results have been obtained by researchers who have clustered HRM practices into 'bundles' examining practices which influence the employees' ability and those that impact employees' motivation (e.g., Arthur, 1994; Ichniowski et al., 1997; Delaney and Huselid, 1996).

As emphasized by Huselid (1995), HRM practices influence employees' skills and competencies through the acquisition and development of a firm's human capital. The competitive advantage knowledge. In addition, performance appraisal (or performance management) systems provide employees with feedback on their performance and competencies and provide direction for enhancing their competencies to meet the needs of the firm. An integrated part of most performance appraisal systems is also the establishment of objectives and targets for the self-development and training of employees. There is also extensive evidence that investment in employees' training enhances the human capital of the firm, generally leading to a positive relationship between employee training and organizational performance (e.g., Delaney and Huselid, 1996; Koch and McGrath, 1996). Thus, we propose:

Hypothesis 2. Competence/performance appraisal and training are positively related to employee abilities.

'The effectiveness of even highly skilled employees will be limited if they are not motivated to perform' (Huselid, 1995, 637). In this context, several HRM practices may influence individual performance by providing incentives that elicit appropriate behaviors. Such incentive systems may include performance-based compensation and the use of internal promotion systems that focus on employee merit and help employees to overcome invisible barriers to their career growth (Huselid, 1995). Most studies have included performance-based compensation as a component of high performance HRM practices (e.g., Arthur, 1994; Huselid, 1995; MacDuffie, 1995; Delery and Doty, 1996).

While from an expectancy theory point of view it is the existence of a clear linkage between individual effort and reward that matters, from an equity theory (and organizational justice) perspective the main question is whether employees perceive that they receive the rewards that they are entitled to based on their contribution to the organization. Both perspectives would lead us to expect a positive relationship between performance-based compensation systems and employee effort. Promoting employees from within the firm is likely to provide a strong motivation for employees to work harder in order to be promoted (Pfeffer, 1994; Lepak and Snell, 1999). In addition, a philosophy of internal promotion indicates that a

firm has decided to invest in its employees and is thus committed to them. Previous research has shown that employees are more motivated when they are informed about the firm. Sharing of information on, for example, of the firm is dependent on the existence of human resources with relevant competence profiles. An analysis of the competencies needed for different positions – together with an analysis of the firm's current pool of employee competencies – helps the organization hire people with the desired skills and strategy and company performance conveys to the employees that they are trusted. Further, it is important that employees are informed so that they can use the knowledge that resides in the firm to its fullest potential (Pfeffer, 1998). As a result, extensive intra-organizational communication is also likely to contribute to employees' motivation. Based on the arguments presented above, we propose.

Hypothesis 3. Performance-based compensation, merit-based promotion and internal communication are positively related to employees' motivation.

The conceptual model is presented in Figure 1.



Figure 1 Conceptual model.

#### Data and method

This paper examines foreign-owned subsidiaries located in three host countries: Finland, Russia, and USA. These countries are different, for example, in terms of history, culture, and management style, making it a perfect sample for testing whether the proposed hypotheses on intra-organizational transfer of knowledge apply across the different contexts. The subsidiaries sampled have their MNC HQs located in five home countries: Sweden, Germany, Japan, USA, and Finland. We chose these countries because they were among the more active investors in Russia and Finland while still representing a reasonably diverse sample including countries from each of the triad regions of North America, Europe, and Asia.

Lists of subsidiaries of firms with headquarters in Japan, Germany, Sweden, and Finland operating in the USA were obtained from the foreign commercial sections of the respective embassies in the USA. In all, 320 subsidiaries were randomly selected from the lists and HRM managers or General Managers of the subsidiaries were contacted via telephone and asked if they would participate in the study. Of these, 28 did not meet the age or size sampling criteria. This resulted in a base sampling of 292 firms in the USA. These 292 firms were sent a questionnaire and non-respondents were contacted up to three times at 2-week increments resulting in 79 responses or a 27% response rate. In Finland, 188 firms were contacted which met the size and age sampling requirements and a similar procedure to that employed in the USA to obtain 62 responses or a 33% response rate. In Russia, however, where there is little tradition of completing questionnaires and much worry about disclosing information, interviews were set up with the managers during which time managers were asked to complete the questionnaires. In a few cases, at the manager's request, the questionnaire was left with the manager and collected

a few days later. In Russia 100 of the 357 contacted firms, which met the size and age sampling conditions, took part in the study (a 28% response rate).

The resulting data set consists of 62 subsidiaries operating in Finland, 100 subsidiaries operating in Russia, and 79 subsidiaries operating in the USA for a total of 241 participating subsidiaries. However, due to missing data, only 168 observations were used in our data analysis (55 subsidiaries in Finland, 81 in Russia, and 32 in USA). On average, the subsidiaries were existence for 15 years with 173 employees of which seven were expatriates. Further, on average, each MNC had subsidiaries in 40 different countries.

In all, 70% of our respondents were general managers or deputy general managers and 30% of our respondents were HR managers. No significant differences in responses were found between these subgroups and thus following Guest (1997) the questionnaires were combined into one data set for analysis. In total, 26% of the respondents were under 30 years old, 33% were between 30 and 39, 32% were between 40 and 49, and 9% over 50 years old.

A careful process was used to develop the questionnaire for this study. The items/scales used in the study drew on established research (Gardner et al., 2001; Huselid, 1995; Wright et al., 1998; Zander, 1991). In addition, five experts were asked to review the questionnaire and provide feedback. The questionnaire was then administered to 10 managers (not part of the sampling frame) to obtain their feedback before development of the final questionnaire. The questionnaire was administered in English in the USA and Finland and respondents in Russia had the option of using an English or Russian version. The Russian version was validated for accuracy using a translation backtranslation procedure.

Following Podsakoff and Organ (1986), we used the Harman's one-factor test to examine the extent of common method bias in our data. A principal component factor analysis reveals there are 10 factors with an eigenvalue 41, which together account for 69% of the total variance. The presence of several distinct factors combined with the relatively low amount of variance explained by the first factor and second factor (only 15 and 12%) indicates that the data do not suffer from common method variance (Podsakoff and Organ, 1986).

#### Measures

All data used in the analysis were from the administered questionnaire and all variables were standardized prior to the development of indices.

*Transfer of knowledge.* We define the level of knowledge transfer based on the level of knowledge utilization by the recipients assuming both acquisition and use of new knowledge. Accordingly, the subsidiaries were asked to what extent they utilize knowledge from the parent company and from other MNC units. The questions used a five-point Likert-type scale, where 1 indicates no use of knowledge and 5 indicates substantial use of knowledge (alpha=0.64).

*Employees' ability.* This construct captures employees' potential and ability. It is not a measure of an individual ability, but a measure of the overall ability of subsidiary's employees. This construct was measured by asking respondents to assess the quality of the subsidiary's employees relative to that of its competitors in: overall ability, job-related skills, and educational level. Respondents indicated this on seven-point Likert-type scales ranging from 1='far below average' to 7='far above average' (alpha=0.77).

*Employees' motivation.* This construct consists of five items. In the same vein, this is a measure of the overall motivation of a subsidiary's employees and not the individual motivation. Two items asked respondents to assess the quality of the subsidiary's employees relative to those of its competitors on motivation and work effort using seven-point Likert-type scales (ranging from 1='far below average' to 7='far above average'). Three items were measured using a five-point scale (ranging from 1=strongly disagree to 5=strongly agree), where respondents were asked to indicate: (1) whether the employees behave in ways that help company performance; (2) whether employees contribute in a positive way to company performance; and (3) whether the subsidiary, compared with the parent company, has a highly motivated group of employees (alpha=0.75).

*Training.* The extent to which subsidiaries apply training is measured through two items capturing the number of days of formal training managerial and nonmanagerial employees, respectively, receive annually (alpha=0.83).

*Competence/performance appraisal.* An index examining the extent to which competence/ performance appraisal is used in the subsidiary is used. One item measures the proportion of the workforce that regularly receives a formal evaluation of their performance (in per cent), another measures the proportion of jobs where a formal job analysis has been conducted (in percent), and the final item measures the proportion of new jobs for which a formal analysis of the desired personal skills/competencies/characteristics is carried out prior to making a selection decision (in percent) (alpha=0.66).

*Merit-based promotion.* The importance of internal promotion schemes is measured by an index comprised of three five-point Likert-type scale items. The first item measures whether qualified employees have the opportunity to be promoted to positions of greater pay and/or responsibility within the subsidiary (1=no opportunities and 5=many opportunities), the second item measures whether the subsidiary places a great deal of importance on merit for promotion decisions (1=not at all and 5=to a large extent), and the third item measures the extent to which upperlevel vacancies are filled from within (1=not at all and 5=to a large extent) (alpha=0.63).

**Performance-based compensation.** This three-item scale captures the extent to which compensation is performance-based. One item measures the proportion of employees who have the opportunity to earn individual, group or company-wide bonuses (percent), and two items ask the respondents to indicate whether the company uses performance-based compensation (1=not at all and 5=to a large extent) and whether the compensation systems are closely connected to the financial results of the subsidiary (1=not at all and 5=to a large extent) (alpha=0.61).

*Internal communication.* The extent to which exchange of information is promoted within the organization is measured through a scale comprised of three items (all on five-point scales). The items capture communication flows between: (1) employees in different departments, (2) non-managerial employees and managerial employees, and (3) the HR department and the top management team (1=not at all and 5=to a large extent) (alpha=0.72).

#### **Control variables**

*Subsidiary age*. Subsidiary age was included as a control variable since older subsidiaries tend to be more autonomous and thus more innovative (e.g., Foss and Pedersen, 2002). More innovative subsidiaries might be less dependent on knowledge from other parts of the MNC. On the other hand, more innovative subsidiaries may also be more interesting as knowledge exchange partners for other MNC units. Subsidiary age is measured as the number of years the subsidiary has operated in the host country.

*Subsidiary size*: Following the same logic as the subsidiary age variable, larger subsidiaries may acquire less knowledge from other MNC units than smaller subsidiaries because they are able to generate more knowledge themselves. Subsidiary size is measured as the logarithm of the total number of employees in the subsidiary.

**Relative size of subsidiary compared to the rest of the corporation**: This variable measures the strategic importance of the subsidiary. Following Birkinshaw and Hood (1998) and Holm and Pedersen (2000), it is expected that the larger the relative size of the subsidiary compared to the rest of the corporation, the stronger strategic position the subsidiary will gain in the MNC. A stronger strategic position allows better access to knowledge and other resources in other parts of the MNC. Relative size is measured as the number of employees in the subsidiary divided by the total number of employees in the MNC.

*Share of expatriates*: Expatriates are used in MNCs as vehicles for knowledge transfer from other MNC units to the focal subsidiary where the higher number of expatriates in a subsidiary, the more knowledge may be transferred (Downes and Thomas, 2000; Bonache and Brewster, 2001). Therefore, we controlled for the relative number (in per cent) of expatriates in the subsidiary.

*Strategic mission*: As pointed out by Lyles and Salk (1996), a clear understanding and sharing of the mission statement facilitates knowledge transfer since employees understand what knowledge is important. In order to control for this variable, we asked the respondents to indicate to what extent the subsidiary has a clear strategic mission that is well communicated and understood at every level throughout the organization. The respondents indicated this on a 5-point Likert-type scale (1=not not at all to 5=very much.).

*Cultural relatedness*: Lane and Lubatkin (1998) argue that absorptive capacity is a dyadlevel construct dependent on the similarities/differences of both source and recipient firms in terms of knowledge bases, organizational structures and compensation practices, and dominant logic. We control for the cultural relatedness between the home country of the MNC and the host country of the subsidiary by applying the Kogut and Singhindex based on Hofstede's four dimensions of cultural difference (Kogut and Singh, 1988).

*Home and host country*: We expect that difference in local environments – economic, political, technological and socio-cultural – affect the process of knowledge transfer. Therefore, we control for the home country of the MNC (Finland, Germany, Japan, Sweden, and USA) as well as the host country of the subsidiary (Finland, Russia, and USA).

*Industry*: Following Gupta and Govindarajan (2000), we control for industry characteristics since some industries are more global and apply a higher level of knowledge transfer among MNC units. We group the subsidiaries into six industries: Metal & Electronics, Food, Pulp & Paper, Chemicals, Financial service, Wholesale & Retail, and Hotel & Transportation.

## Results

The three hypotheses may be summarized in three basic equations:

1. Employees' ability=Competence/Performance appraisal + Training +Error.

2. Employees' motivation=Merit-based Promotion +P erformance-based compensation + Internal Communication + Error.

3. Transfer of knowledge = Employees' ability + Employees' motivation + Employees' ability\*Employees' motivation + Controls + Error However, as the above equations represent decisions that are interdependent, the use of single equation models may yield biased results and obscure interesting theoretical possibilities. It is also possible that the joint optimization of all decisions involved may lead to the suboptimization of one or more individual decisions. Statistically, the interdependence is indicated by the high correlation between the error terms of the three equations. The appropriate model to estimate these decisions is a three-stage least square model that circumvents the problem of interdependence by using instrument variables (the exogenous variables) to obtain predicted values of the endogenous variables (in our case, knowledge transfer, employees' ability, and employees' motivation). As the scales of the variables varied considerably, all variables were standardized (mean=0 and standard deviation=1) before analysis.

As expected, there is a relatively high correlation between the three host country dummies (-0.34, 0.28, and -0.67) and between the cultural relatedness variable and the country dummies (both host and home-country dummies). This can largely be explained by the way these measures are constructed. However, none of the other correlation coefficients indicated the possibility of multicollinearity (i.e., r > 0.5), (Hair et al., 1995). Moreover, running the models with some of the correlated variables omitted had no effect on the explanatory power of the main variables. Therefore, we concluded that the results are very stable in terms of the different specifications of the model (see Table 3).

	Employees' ability	Employees' motivation	Transfer of knowledge
Intercept	-0.1 -(0.07)	-0.01 (-0.07)	-0.01 (-0.09)
Training	0.18 (0.07)***		
Performance	0.1		
appraisal	(0.06)+		
Promotion		0.08	
		(-0.07)	
Performance-based		0.21	
compensation		(0.07)***	
Communication		0.29	
		(0.07)***	
Ability			0.91
			(-0.73)
Motivation			0.31
			(-0.44)
Ability*motivation			0.33
			(0.12)***
Controls			
Age of subsidiary			0.03(0.12)
subsidiary size			0.07(0.12)
Share of expratiates			-0.11(0.12)
Relative size of subsidiary			-0.02(0.11)
Strategic mission			-0.11(0.14)
Cultural relatedness			0.02(0.29)
Home-country dummies (four)			yes <sup>a</sup>
Host-country dummies (two)			yes <sup>a</sup>
Industry dummies			yes <sup>a</sup>
(five)			
F-value	5.34***	18.00***	1.84*
R <sup>2</sup>	0.06	0.25	0.22
N	167	167	167

Table 3 The three-stage least squares estimation of a simultaneous equation model

\*\*\*, \*\*, \* and +, significant at 0.1, 1, 5 and 10%, respectively.

<sup>a</sup>Indicate that dummies for home country (four) and host country (two) and industries (five) are included in the model, although, the 11 parameters is not shown in the table.

difference in the effects of these two variables on employees' ability.

Hypothesis 3 examined the relationship between merit-based promotion, performancebased compensation, and internal communication (HR practices) and employees' motivation. Only two variables had a significant positive relationship lending some support for the hypothesis (see column 2; Table 3). The two variables – performance-based compensation and internal communication – are highly significant (P<0.001) determinants of employees' motivation. An improvement in employees' motivation is more associated with the use of performance-based compensation and information sharing within the organization rather than with merit-based promotions.

#### Национальный исследовательский университет «Высшая школа экономики»

Overall, the results indicate that the model including all three equations works well, explaining almost one third of the observed variation in the knowledge transfer (weighted  $R^2=0.32$ ). This  $R^2$  statistic has been corrected for the fact that the regression sum of squares and the error sum of squares do not sum to the total corrected sum of squares in methods using instrument variables where first-stage predicted values are substituted for endogenous regressors. Therefore, the overall  $R^2$  value might be larger than the  $R^2$  values for each of the three equations. The system weighted  $R^2$  value is the best measure of the overall goodness of fit of the model. We turn now to the tests of our explanatory hypotheses.

Hypothesis 2 posited a positive relationship between competence / performance appraisal and training (HR practices) and subsidiary employees' ability. This hypothesis is largely supported (see column 1; Table 3). Training has a significantly relationship with employees' ability (P<0.01). The effect of performance appraisal on employees' ability is marginally significant (P<0.10). This indicates that investments in HRM practices (e.g., training) directly aim at developing and upgrading the skills of the workforce have a stronger effect on employees' ability than the indirect (long-term) practice of competence and performance appraisal. Since the variables have been standardized, the two parameters 0.18 and 0.10. respectively, also indicate a substantial

Hypothesis 1 is concerned with two aspects of subsidiary absorptive capacity, ability and motivation, and their interaction effects as a facilitator of knowledge transfer in MNCs. While the main effects of both employees' ability and employees' motivation are positive but non-significant, the interaction effect between these two variables is highly significant (P<0.001; see column 3; Table 3). This indicates that neither employees' ability nor motivation by themselves is sufficient to facilitate knowledge transfer. The significant interaction of motivation and ability shows that in order to facilitate knowledge transfer both aspects of absorptive capacity – ability and motivation of employees' – are needed. It turns out that none of the control variables in the model are significant.

## **Concluding comments**

This paper addresses the relationship between MNC subsidiary HRM practices, absorptive capacity, and knowledge transfer. We found overall support for the argument that the absorptive capacity of the subsidiary facilitates transfer of knowledge from other parts of the MNC. The greater the absorptive capacity, the higher the level of knowledge transfer. Moreover, and perhaps the most important finding of this study, we find that both aspects of absorptive capacity (ability and motivation) need to be present in order to optimally facilitate the absorption of knowledge transfer. These results fall in line with recent contributions like Zahra and George (2002) who distinguish between potential absorptive capacity (with an expected high content of employees' ability) and realized absorptive capacity (with an expected high content of the ability aspect o absorptive capacity, our results indicate that ability is necessary but not sufficient.

There exists a large and growing body of research on the relationship between HRM and organizational performance (see Becker and Gerhart, 1996; Guest, 1997; Becker and Huselid, 1998). In particular, previous research has bundled different HRM practices into two main categories: those determining employees' ability and those determining employees' motivation. However, we diverge from previous work on HRM and firm performance by integrating the research on knowledge transfer within the MNC. The results of our study indicate that investments in employees' ability and motivation through the extensive use of HRM practices contribute to MNC knowledge transfer. Employees' ability and motivation constitutes the firm's absorptive capacity, which is seldom treated as an endogenous variable in the literature. While pre previous studies have paid little attention to how absorptive capacity is created and developed in the firm, the implication of our results is that managers can improve the absorptive capacity of their organizations by applying specific HRM practices oriented towards employees' ability (training and performance appraisal) and employees' motivation (performance-based compensation and internal communication).

Future research should collect data from multiple respondents to minimize the risk of common method bias. The validity of the current data on employees' ability and motivation was limited due to the use of only one respondent per subsidiary, a weakness in most international research. Future research should also examine the possibility of a lagged effect of investments in HRM on employees' competencies and motivation, and knowledge transfer. Finally, examining other factors of knowledge transfer such as the relationship between the parties involved, the sender's characteristics, and the characteristics of the knowledge transferred can extend the present model. While this study makes important contributions to our understanding of the relationship between HRM, employees' ability and motivation, and knowledge transfer in the MNC, clearly, additional research is needed to further develop the field of knowledge management.

## Вопросы для размышления

- 1. Каковы основные проблемы, рассматриваемые в статье?
- 2. Какие из приведенных в статье исследовательских методов и выводов по результатам исследования представляются вам спорными, недостаточно обоснованными? Почему?
- 3. Каковы ограничения проведенного исследования?
- 4. Каковы направления использования HR-менеджерами результатов этого исследования?
- 5. Являются ли рассмотренные в статье проблемы актуальными для российских организаций?

# Блок VI. Профиль «Экономика впечатлений: менеджмент в индустрии гостеприимства и туризме»

# Прочитайте статью<sup>6</sup> и сделайте ее критический анализ на русском языке.

Marketers in the hotel industry strive to perform up to customers' expectation and deliver an exceptional service. Therefore, they constantly seek to gain insights on service quality through investigation on customers' experience, such as on what customers like and what they dislike (Crotts et al., 2008). Nevertheless, a customers' experience is an experiential product that involves the intricacy and resiliency of subjectivity. Furthermore, the task of creating a great experience is even more daunting at a global stage as many hotels enter foreign markets and find themselves in whole new cultures. Consequently, understanding what constitutes a valuable customer experience becomes a question to be tackled for firms seeking to be successful in the global market.

The present study explored customer delight in a lodging experience. The topic of customer service and customer experience is highly relevant in the hotel industry and therefore warrants further empirical study. The objective of this study was to examine the phenomenon of customer delight from a cross-cultural perspective. Specifically, it aims to explore the factors that drive a delightful experience and to uncover the difference existing across various travelers.

## **Customer delight**

## Key drivers of customer delight

Customer delight has been defined from three different perspectives in the current literature. One definition stresses the confirmation–disconfirmation paradigm. The next group of research stresses the emotional components. Finally, the last school of thought emphasizes human needs.

Existing literature commonly addressed that the construct of delight bears two characteristics: (a) delight occurs as a result of memorable, positive reproducible events. As opposed to satisfaction, delight lingers for a longer period of time, and (b) delight is more strongly associated with customer loyalty and intent to repeat purchase. Compared to merely satisfied customers, delighted customers tend to be more loyal and more likely to be retained.

Key drivers of customer delight have been defined as service attributes that contribute to a delightful experience (Crotts et al., 2008). Such factors have major impact on customer evaluation and behavior which include satisfaction and repeat purchase intention. Some customer delight drivers might be context-specific rather than universal. From the perspective of customer experience management, it is strategically meaningful to explore what these key drivers are as evaluation with different components of an experience may have remarkably different impacts on the overall evaluation. In a guest's mind, one under-performed area may not be the deal-breaker to the lodging experience. Rather, the entire experience can be spoiled if the perceived key areas do not perform well. Despite the association of delight drivers with customer experience, very few studies have actually dedicated to empirically examine this phenomenon and no study to the author's knowledge has explored it in a hotel setting.

Among existing empirical evidence, the study by Crotts et al. (2008) investigated key delight drivers in the context of a food and wine festival. Using data collected from 310 participants, the authors identified "diversity of wines and food tasting" and "quality of the food samples" as two major factors that contribute to participants' delight. Also noteworthy is that, although respondents mentioned negative impressions of the festival such as "lack of seating" and "too crowded", they still rated the overall experience as positive and demonstrated revisit

<sup>&</sup>lt;sup>6</sup> На основе статьи Torres., E.N., Fu, X., Lehto, X. Examining key drivers of customer delight in a hotel experience: A cross-cultural perspective // International Journal of Hospitality Management, Vol. 36, 2014, pp. 255–262.

intention. Thus, delight generated from key driver areas is proven to be persuasive enough to counteract negative feelings and dictate the overall evaluation. Torres and Kline (2013) conducted content analysis of letters of guest feedback. As part of their results, they present a typology for customer delight. Accordingly, the following themes were presented: charismatic delight (associated with employee friendliness personality), fulfillment delight (associated with the fulfillment of higher-level needs such as that of self-esteem), problem resolution delight (resulting from the effective solution of a guest problem, especially when it was not the hotel's responsibility), professional delight (resulting from employee professionalism), and comparative delight (emerging from the realization that a hotel is superior to that of competitors).

Seeking a deeper understanding of the experience economy, Hosany and Witham (2010) studied the experience of cruise travelers from three different nationalities. They discovered that esthetics had the highest impact on the guests' appraisal of the cruise experience, followed by the dimension of entertainment, and escapism. Their study proposed that pleasant experiences will positively impact satisfaction, and this in turn will affect a traveler's intention to spread positive word-of-mouth.

#### The influence of culture

One of the most important theories regarding the role of national culture in management comes from Hofstede (1993). In order to clearly delineate the cultural differences, Hofstede (1993) proposed five dimensions, including power distance, individualism/collectivism, masculinity/femininity, uncertainty avoidance, and long-term/short-term orientation, which have become a well-cited framework for many studies on service experience.

To understand the impact of culture in customer satisfaction, Crotts and Erdmann (2000) studied international tourists after their visit to the United States, utilizing the masculinity/femininity dimension developed by Hofstede (1993). High masculinity cultures tend to emphasize competition and assertiveness, whereas cultures of high femininity tend to stress concern for other and interpersonal relations. The researchers discovered that guests from high masculinity cultures were more likely to be critical of various aspects of their experience such as airport facilities. In contrast, those from national cultures with low masculinity (i.e. high femininity) tended to offer more positive evaluations of their experience. In terms of loyalty, travelers from high masculinity cultures displayed greater defector tendencies, while those who traveled from high femininity cultures were more likely to be loyal (Crotts and Erdmann, 2000).

Another study by Tsaur et al. (2005) examined the service quality dimensions of SERVQUAL (Parasuraman et al., 1988) in relation to the cross-cultural impact. In the dimensions of tangibles, reliability, and empathy, tourists from the English heritage cultures tended to perceive better service quality, more so than their Asian and other European counterparts, while in the dimensions of responsiveness and assurance, the Anglo-Saxon group perceived better quality than the Asians.

#### The impact of customer delight

For years, customer satisfaction has been used as the benchmark of success in managing customer relationships. In recent years, customer delight has been studied as the new standard of managing guest relations. Some researchers have proposed that as the level of satisfaction increases, loyalty among customers increases. In light of this, it has been revealed that very satisfied customers were more likely to be loyal than customers who said they were satisfied (Kumar et al., 2001). Customer delight has also been found to have a stronger impact on affective loyalty when compared to customer satisfaction (Kim, 2011). Finn (2005) argued that previous studies that sought to understand the relationship between satisfaction and loyalty have produced mixed results due to the possibility of a non-linear relationship. He proposed that at extreme levels of satisfaction or arguably delight, the relationship to loyalty is potentially stronger (Finn, 2005).

If customer delight improves customer loyalty, then business results should follow. In fact, Patterson (1997) argued that companies with loyal customers can succeed with prices 7% higher than their competitors. Nevertheless, providing excellent service is not always cheap. Rust and Oliver (2000) acknowledged the importance of customer delight, but also realized the potential costs. Accordingly, they created a mathematical model has been proposed to explain the circumstances by which delighting customers may result in more profit for a firm (Rust and Oliver, 2000). Given the existing literature in the field of customer delight and seeking to expand the body of work, the following research questions are proposed:

• Are there similarities and differences in the elements that trigger delight across cultures?

• What can service providers to provide an experience that would delight all their guests?

#### Methods

In order to investigate the key drivers of customer delight, the researchers conducted interviews with hotel guests. More specifically, the present research combined qualitative openended questions with close-ended questions that can be quantified. Before conducting interviews, the researchers developed a protocol based on the instrument developed by Crotts et al. (2008), which used four questions to capture the key drivers of customer delight. They are Q1: What are the three things you enjoyed most about your visit? Q2: What are the three things you enjoyed least about your visit? Q3: I thoroughly enjoyed my visit (on a scale from "strongly disagree" to "strongly agree") and Q4: The probability that I will visit again next/year is (on a scale from 0% to 100%). In addition to these questions, the researchers also asked questions regarding some of the customer delight typology identified by Torres and Kline (2013), namely friendliness, professionalism, fulfillment of esteem needs, and problem resolution. The full interview protocol can be seen in Appendix A. It is noteworthy to state that the instrument is not an exact replication of the methodology used by Crotts et al. (2008); rather, it draws key questions from the study with regards to customer delight.

The present research sought to obtain descriptions of factors that contribute to a delightful experience. The researcher's intent was not to give a sweeping generalization of the difference between guests of different cultures, but to provide insights into the phenomenon under investigation. The interviews were conducted in an upscale hotel in the Central Florida area during a period starting on January 2013 and ending on March 2013. Guests of different cultures were approached for qualitative interviews. A total of 228 interviews were conducted during this period (for more results on respondent demographics, please see the results section). At this point, saturation point was reached. Prior to the interviews the researchers obtained permission from the hotel's management as well as the university's Internal Review Board (IRB).

The data was recorded in the form of written notes and shortly thereafter transcribed. The interview transcripts were coded independently by three trained coders. The first rater coded all 240 letters. The second and third raters' coding assignment was as follows: (a) all the European letters, (b) all the Latin American letters, (c) all the Canadian letters, (d) a random sample of the American letters (a sample of the U.S. letters was used due to their larger size). All raters had expertise in the area of customer delight. A codebook (see Appendix B) was developed as a result. Following the development of the codebook, letters were coded using a process of content analysis. According to Iverson (2000, p. 32), content analysis has many advantages, among which its primary strength lies in its ability to analyze and interpret people's account of an event without taking away its power or eloquence. Usually involving multiple steps, content analysis is a process which starts with the development of categories and then follows with the coding of the content and ends with narrative demonstration or statistical analysis of the data. This method is considered to be especially suitable for enhancing knowledge of a real-world phenomenon that has not received deserved attention.

The data analysis followed both an inductive and a deductive process. The codebook was initially developed based on the review of related literature. For example, Torres and Kline

(2013) in their research developed a codebook for content analysis. This study used a modified version of such codebook. Additionally, as the coders read the letters; new themes emerged. Consequently, the codebook was modified to contain all of the relevant themes from the letters of feedback, as well as the information from the relevant literature. In light of this, the process both utilized information from the literature and also utilized the transcripts themselves to draw additional themes and patterns. The codebook can be found in Appendix B.

Following the independent coding of all three raters, an assessment of reliability took place. Inter-rater reliability was calculated using the percentage of agreements and kappa value. Based on the initial coding, the raters agreed on 82% of all the codes during the first round of coding. Then all three reviewers met and analyzed the areas of agreement and disagreement, ultimately making final coding decisions. During the second round of coding, raters agreed on 90.1% of coding instances. The assessment of reliability showed substantial agreement among the raters, as demonstrated by a kappa value of .727. In other words, the study attained an acceptable level of agreement with an acceptable kappa value.

#### Results

#### **Respondent profile**

During the course of the present research, guests were interviewed in the public areas of an upscale hotel in the central Florida area. From the total amount of letters (n = 228), 140 respondents were from the United States; 38 were from Northern Europe, namely Germany; 19 were from Latin America, namely Brazil; 19 were from Canadians, and 12 were from other countries. A total of 52% of guests were male, and 48% were female. The interview protocol (Appendix A) inquired among other things, about a guest's delightful experiences. If the guest did not have a delightful experience at the research hotel, they were asked to recall a delightful experience in another hotel. Among the interviewed guests, 58% commented about a delightful experience in the study hotel, whereas the remaining 42% conveyed a story about other hotels they had previously experienced. Among those who recalled their experience at the study hotel, 68% stated that it was their first stay in property, 17% indicated it was their 2nd to 5th time, and 14% had stayed at the hotel for 6 or more times.

#### **Content analysis results**

American guests. The researchers analyzed the interview transcripts using the codebook (Appendix B). During the coding process, it was apparent that guest from different countries exhibited different patterns of preference in terms of the desired amenities, style of service, and importance assigned to various divisions within the hotel. The first set of interviews was that of the United States. The frequency and percentage of occurrence of each code can be found in Table 1. Guest from this country placed great importance on service that is both accommodating and flexible (54%), friendliness of the service providers (53%), professionalism (41%) and the satisfaction of needs, especially those of self-esteem (40%). All of these codes combined paint a picture of a guest places great emphasis on the inter-personal aspects of the service experience. More so, guests from the United States assigned great value to the satisfaction of individual needs, namely through experiences that would make them feel valued, special, and treated as an individual. The most frequently mentioned department was the front office (31%) followed by housekeeping (24%). The top amenity desired by American guests was a superior room (26%). Another noticeable pattern among American customers is the great value placed on complementary items, extra services, and upgrades. This in turn might be indicative of a culture that places great emphasis on value and in which sales promotion is a customary form of marketing.

	United States, n=140		Northern Europe, n=38		South America, n=19		Canada, n=19	
Code	Frequency	Percentage	Frequency	Percentage	Frequency	Percentage	Frequency	Percentage
1. Room	36	25.7%	14	36.8%	4	21.1%	5	26%
2. Lobby	2	1.4%	0	0%	0	0%	0	0%
3. Entertainment facilities (i.e. pool)	16	11.4%	6	15.8%	2	10.5%	0	0%
4. Facilities (i.e. gym)	4	2.9%	2	5.3%	0	21.1%	0	0%
5. Overall superior facilities	21	15.0%	9	23.7%	4	0%	4	21%
22. Amenities – others	28	20.0%	2	5.3%	0	0%	2	11%
23. Complimentary items and upgrades	26	18.6%	3	7.9%	1	5.3%	2	11%
6. Surprise	9	6.4%	1	2.6%	0	0%	6	32%
7. Friendliness	74	52.9%	24	63.2%	12	63.2%	15	79%
8. Problem resolution	37	26.4%	16	42.1%	1	5.3%	8	42%
9. Professionalism	58	41.4%	16	42.1%	9	47.4%	11	58%
10. Needs fulfillment	56	40.0%	13	34.2%	3	15.8%	8	42%
11. Accommodating/flexible	75	53.6%	17	44.7%	4	21.1%	6	32%
12. Personalized service	22	15.7%	1	2.6%	1	5.3%	3	16%
13. Efficiency/timeliness	29	20.7%	6	15.8%	7	36.8%	6	32%
14. Front office	43	30.7%	8	21.1%	0	0%	4	21%
15. Housekeeping/cleanliness	33	23.6%	5	13.2%	2	10.5%	7	37%
16. Room service – culinary	3	2.1%	2	5.3%	5	26.3%	0	0%
17. Room service – service	4	2.9%	3	7.9%	4	21.1%	0	0%
<ol> <li>18. Restaurants and lounges</li> <li>– culinary</li> </ol>	13	9.3%	3	7.9%	10	52.6%	2	11%
<ol> <li>Restaurants and lounges</li> <li>service</li> </ol>	21	15.0%	6	15.8%	1	5.3%	1	5%
20. Guest services (i.e. concierge, bell)	18	12.9%	1	2.6%	0	0%	7	37%
21. Banquets	1	0.7%	0	0%	0	0%	0	0%

#### Table 1. Coding of interviews

Northern European guests. During the course of the study, the researchers interviewed several European guests (n = 38). Most of these guests were visiting from Germany. The frequency of codes from the content analysis of these interviews can be found in Table 1. Guests from this region placed great importance on friendliness (63%), service that is accommodating and flexible (45%), problem resolution (42%) and professionalism (42%). With more accounts of problem resolution than any other cultural group, Northern Europeans seemed to: (a) notice problems with rooms and service more often, and (b) place great emphasis on finding practical solutions to any issues they encounter. Northern Europeans also placed more emphasis on the hotel room (37%) than guests from any other region. The most cited service department was the front office (21%) followed by restaurant service (16%).

South American guests. Guests from South America were also interviewed during the study. Most of the guests from this region came from the country of Brazil. Some of the most frequently mentioned codes were friendliness (63%), professionalism (47%), and efficiency (37%). In fact, South Americans seemed to value efficiency more than any other group interviewed. A possible explanation for this phenomenon could be a contrast effect. North American culture has been typically characterized for their stricter adherence to deadlines, and punctuality. This in turn may be reflected in the service of the hotel, which may be outside of the

norm for South American customers, who might be accustomed to a slower phase of service. A key finding of this study is that Latin American guests seemed to recall more delightful experiences regarding food and beverage. In fact, 53% of all South Americans expressed their delight with food from the hotel's restaurants, and 26% expressed delightful experiences regarding the food received at their rooms. This is more than any other cultural group studied during the present research. See Table 1 for a complete listing of the codes, frequencies, and percentages for the South American guest group.

*Canadian guests.* Canadian guests were the subject of several research interviews. Some of the most frequently mentioned codes for this group include: friendliness (79%), professionalism (58%), and problem resolution (42%). Although friendliness was one of the unifying delight characteristics for the various cultural groups, Canadians seemed to be more delighted for this particular reason. Furthermore, Canadians recalled more delightful experiences associated with a pleasant surprise (32%). The element of surprise has been a source of debate among customer delight scholars. Nevertheless, this research shows that some cultural groups are more likely to value service experiences that provide a positive surprise than others. This group also seemed to place the greater emphasis on room cleanliness (37%). See Table 1 for a complete list of codes, frequencies, and percentages for Canadian hotel guests.

#### **Discussion and conclusions**

Welcoming all guests is the calling shared by those who work in the hotel industry. The execution of such duty is complex in nature, as guests from different cultures appear to have different preferences and expectations from hoteliers. Guests from the United States place great emphasis on service that is flexible, fulfills their esteem needs, and that is friendly and professional. American guests also seem to emphasize the value aspect of the service experience, as they referred to complimentary amenities, upgrades, and services more than any other nationality in the present research. The results are in agreement with the work of Ma et al. (2013) which proposed that delight can be elicited when guests perceive the experience as important to their personal well-being or special needs. Furthermore, Schneider and Bowen (1999) had proposed that the satisfaction of esteem needs is important means to generate customer delight. The present study restates the importance of this factor, while at the same time suggests that the fulfillment of esteem needs might be stronger for citizens of the United States of America. Hoteliers in the United States might be tempted to provide the same style of service that their American guests seem to enjoy, however, they will likely receive different results from international guests. A complementary amenity of upgrade might be the ultimate expression of a hotel's desire to please the guests from an American perspective; however it might not be such a critical delight factor to a guest from Brazil. By the same token a hotel in Brazil who receives multiple guests from the United States can learn that providing a complimentary item or upgrade, no matter how small, can go a long way toward pleasing their American guests.

Guests from Northern Europe placed great emphasis on friendliness and problem resolution. Furthermore, Northern Europeans placed more emphasis on any other cultural group on finding practical solutions to problems they experienced during their stay. They were also the most delighted with their hotel rooms. While this cultural group stressed the intangibles aspects of the service experience, they were also more prone to those aspects which emphasize practicality and utility of the hotel core product and service. In support of this, research by Hosany and Witham (2010) suggested that esthetic elements were the key toward the creation of an experience.

Latin American guests highlighted both tangible and intangible aspects of their experience. Friendliness and professionalism were two of the top reasons for their delight with the hotel. However, they were also the cultural group that placed the more emphasis on the food. Both restaurant and room service food were of major importance to South American guests, who seemed to recall a delightful experience involving this aspect more than any other cultural group. Hotels seeking to attract this segment of travelers might do well in providing quality food

offerings. An interesting finding of this research is that South Americans were delighted by the efficiency and timeliness of service. Traditionally, Latin American culture has been perceived as a culture in which deadlines and the concept of time in general tend to be more flexible. It might be that having visited hotels in North America, they notice a contrast effect when compared to the countries they visit from. In the previous research by Ma et al. (2013), goal congruence was suggested as a factor that elicited customer delight. Therefore, the specific goals and expectations of these particular guests with regards to friendliness, and food might lead them to highlight such aspects of the service experience more so than other international guests.

Canadian guests placed more emphasis on friendliness, cleanliness, and the element of surprise than any other cultural group. Surprise has been a contentious subject among customer delight researchers. The present research study suggests that surprise might be more present in the members of certain cultures and nationalities. The current study highlights many of the differences that exist among the various cultures. However, it is noteworthy to highlight that some aspects of service are more universal in nature. All cultural groups seemed to place great emphasis on friendliness. This particular path toward achieving customer delight is the one that is most likely to be understood by hotels, and thus the one that hotels must strive to accomplish. As hoteliers seek to expand their customer base, it is critical to know the likes and preferences of various cultural groups.

While the present study provides great insight as to the various elements that comprise customer delight from a cross-cultural perspective, it is also noteworthy to state that some limitations exist. The current study employed the technique of personal interview for data collection. While the interviews yielded substantive insights for the phenomenon of customer delight, future research can explore this topic from a quantitative perspective. This study highlights the preferences of guests from four cultural groups. However, more research can explore other cultural groups not explored in this paper. Furthermore, future research can explore other individual differences such as age and gender and their effects on customer delight. The present study explored one segment of the hospitality industry: upscale hotels. Future studies can research customer delight in other settings such as theme parks, events, and foodservice.

Every hotelier would like to see their guests delighted. However, what delights a guest from one culture might not delight all the other guests. In a previous study, Hofstede (1993) challenged the widespread applicability of management theories. While most studies of customer delight explore one particular culture, this particular paper contributes to the theory of customer delight by suggesting that some variations in the key drivers of customer delight exists based on the consumer's national culture. Therefore, it is important to appropriately target various guest groups and cater the service and amenity to their preferences. A series of universal factors of service, such as friendliness are likely to appeal to all guests. Therefore, it is critical that hoteliers pay attention to these above all, and then target specific changes to their service strategy and product offerings to delight guests from particular cultural groups. The calling of all those involved in the service experience is to enhance it such that guests are not only satisfied, but delighted. Scholars and practitioners constantly seek to fulfill the duty of creating a memorable experience. By understanding the effects of culture, everyone can ensure that guests – that is all guests – emerge from the hotel experience truly and completely delighted.

## Appendix A. Customer delight interview protocol

Country of origin – Where are you visiting from?

(1) Which service/amenity were you using when you had the delightful experience that you can describe to me?

(2) Could you please describe the circumstances leading up to the delightful experience? What happened during the experience? What specific details do you recall that made this experience particularly memorable and positive for you?

(3) How many times before this delightful experience had you stayed/visited this?

(4) Was there a moment when the hotel staff acknowledged and fulfilled your needs? Please describe briefly.

(5) Was there a moment when the hotel solved a problem with the stay? Describe.

(6) Was there a situation where you experienced an outstanding level of professionalism from the staff? Please describe briefly.

(7) Where you surprised during your experience? Why or why not?

Please indicate your agreement with the following statements (behavioral intentions) on a 1–7 scale, where 1 is strongly disagree and 7 is strongly agree

(8) Would you stay/visit again in the future? 1 2 3 4 5 6 7

(9) Would you spread positive things to others about this experience? 1 2 3 4 5 6 7

(10) Would you recommend this ... to others? 1 2 3 4 5 6 7

# Appendix B. Codebook

Product mix and amenities	Service	Service department or divisions
1. Room	6. Surprise	14. Front office
2. Lobby	7. Friendliness	15. Housekeeping/cleanliness
3. Pool and leisure facilities	8. Problem resolution	16. Room service – culinary
4. Facilities – gym, and other public spaces	9. Professionalism	17. Room service – service
5. Overall superior facilities	10. Needs satisfied	18. Restaurants and lounges – culinary
22. Amenities – other	11. Accommodating/flexible	19. Restaurants and lounges – service
23. Complementary amenities/upgrades/services	12. Personalized service	20. Guest services (i.e. concierge, bell staff, etc.)
	13. Efficiency/timeliness	21. Banquets
		22. Amenities – others

#### Вопросы для размышления

1. Фраза из статьи (стр. 3): «the following research questions are proposed:

• Are there similarities and differences in the elements that trigger delight across cultures?

• What can service providers to provide an experience that would delight all their guests?».

Если Вы считаете, что данные исследовательские вопросы не раскрыты в полной мере, предложите уточнение использованной авторами методологии.

2. Как правило, научные статьи содержат параграф "Limitations", однако, в данной статье он отсутствует. Какие "Limitations" Вы можете отметить у настоящего исследования?

3. Каким образом результаты данного исследования могут быть использованы российскими отельерами при разработке и реализации стратегии?

4. Какие направления продолжения исследования Вы можете предложить? Укажите соответствующие методологию, методы сбора и анализа данных.

# МЕТОДИЧЕСКИЕ РЕКОМЕНДАЦИИ

Олимпиада по направлению «Менеджмент» проводится в рамках отдельных магистерских программ (профилей): «Маркетинг», «Маркетинговые коммуникации и реклама в современном бизнесе», «Стратегическое и корпоративное управление», «Управление проектами: проектный анализ, инвестиции, технологии реализации», «Управление человеческими ресурсами», «Экономика впечатлений: менеджмент в индустрии гостеприимства и туризме».

Участник олимпиады сообщает о своем намерении выполнять работу по профилю конкретной магистерской программы в момент электронной регистрации.

Участникам олимпиады предлагается для выполнения одно письменное творческое задание. На выполнение творческого задания отводится 3 (три) астрономических часа (180 минут). Творческое задание оценивается по 100-балльной шкале.

Творческое задание представляет собой *научную статью на английском языке* по профилю конкретной магистерской программы с вопросами для размышления.

В ходе выполнения творческого задания участник олимпиады должен прочитать предложенную научную статью (в том числе, намеренно содержащую спорные суждения, точки зрения, неточные выводы и т.п.) и, на основании сформулированных к статье вопросов для размышления, сделать ее критический анализ, дать свое обоснованное и аргументированное оценочное суждение в письменном виде на русском языке.

Важно помнить, что сформулированные к статье вопросы для размышления не являются вопросами-заданиями, на которые участнику олимпиады необходимо ответить. Они именно определяют, но *не ограничивают*, направления для размышления в рамках критического анализа материала и проблем статьи.

Выполнение творческого задания предполагает использование понятий, теорий и концепций, входящих в Раздел 2 «ОБЩЕПРОФЕССИОНАЛЬНЫЕ И ТЕОРЕТИЧЕСКИЕ вступительного *ДИСЦИПЛИНЫ»* Программы экзамена по менеджменту ДЛЯ поступающих В магистратуру факультета НИУ ВШЭ менеджмента (http://www.hse.ru/data/2014/02/25/1330074564/Менеджмент программа.pdf).

При подготовке к олимпиаде *особое внимание* следует уделить изучению дисциплин, соответствующих профилю выбранной участником олимпиады магистерской программы (см. таблицу).

Профиль магистерской программы	Дисциплины, соответствующие профилю магистерской программы	Основная <sup>7</sup> литература
Маркетинг	Маркетинг	<ol> <li>Котлер Ф., Армстронг Г., Вонг В., Сондерс Дж. Основы маркетинга. – М.: «ИД Вильямс», 2012.</li> <li>Ламбен Ж., Чумпитас Р., Шулинг И. Менеджмент, ориентированный на рынок. – СПб: Питер, 2011.</li> <li>Малхотра Н. Маркетинговые исследования. Практическое руководство. – М.: «Вильямс», 2007.</li> </ol>

<sup>&</sup>lt;sup>7</sup> Список дополнительной литературы см. в разделах по соответствующим дисциплинам в Программе вступительного экзамена по менеджменту для поступающих в магистратуру факультета менеджмента НИУ ВШЭ (<u>http://www.hse.ru/data/2014/02/25/1330074564/Менеджмент\_программa.pdf</u>).

Маркетинговые коммуникации и реклама в современном бизнесе Стратегическое и	Маркетинговые коммуникации Стратегическое	<ol> <li>Аренс В.Ф., Вейголд М.Ф., Аренс К. Современная реклама. – М.: «Эксмо», 2011.</li> <li>Перси Л., Элиот Р. Стратегическое планирование рекламных кампаний. – М.: ИД «Гребенников», 2008.</li> <li>Музыкант В.Л. Маркетинговые основы управления коммуникациями. – М.: Эксмо, 2009.</li> <li>Котлер Ф., Армстронг Г., Вонг В., Сондерс Д. Основы маркетинга. – М.: ИД «Вильямс», 2012. – главы 9, 15-18.</li> <li>Пособие по корпоративному</li> </ol>
корпоративное управление	управление Основы корпоративного управления	<ul> <li>управлению: в 6 т. – М.: Альпина Бизнес Букс, 2004.</li> <li>2. Томпсон А.Амл., Стрикленд А.Дж. III. Стратегический менеджмент. Концепции и ситуации для анализа.</li> <li>12-е издание. – М.: Вильямс, 2007.</li> <li>3. Аакер Д.А. Стратегическое рыночное управление. – СПб: Питер, 2011.</li> <li>4. Ансофф И. Стратегический менеджмент. – СПб: Питер, 2009.</li> <li>5. Коллис Д.Дж., Монтгомери С.А. Корпоративная стратегия. Ресурсный подход. – М.: ЗАО «Олимп-Бизнес», 2007.</li> <li>6. Минцберг Г., Альстранд Б., Лампель Ж. Стратегическое сафари.</li> <li>Экскурсия по дебрям стратегического менеджмента. – М. Альпина Паблишер, 2012.</li> <li>7. Гурков И.Б. Стратегия и структура корпорации. – М.: «Дело», 2008.</li> <li>8. Ambrosini, V., Johnson, G., Scholes, K. (Eds.) Exploring techniques for analysis and evaluation of strategic management. London: Prentice Hall Europe, 1998.</li> <li>9. Sanchez, R., Heene, A., Thomas, H. (Eds.) Dynamics of competence-based competition. London: Elsevier, 1996.</li> <li>10. Porter, M.E. Competitive strategy. New York: Free Press, 1980.</li> </ul>
Управление проектами: проектный анализ, инвестиции, технологии реализации	Управление проектами	<ol> <li>Алешин А.В., Аньшин В.М.,</li> <li>Багратиони К.А. и др. Управление проектами: фундаментальный курс: учебник / Под ред. В.М. Аньшина,</li> <li>О.Н. Ильиной. – М.: Издательский дом Высшей школы экономики, 2013.</li> </ol>

		<ul> <li>2. Мазур И.И., Шапиро В.Д., Ольдерогге Н.Г., Полковников А.В. Управление проектами. – М.: Омега-Л, 2009.</li> <li>3. Милошевич Д. Набор инструментов для управления проектами. – М.: ДМК Пресс, 2006.</li> <li>4. Управление проектами. Основы профессиональных знаний. Национальные требования к компетентности специалистов (National Competence Baseline, NCB SOVNET 3.0). Ассоциация управления проектами COBHET, 2010.</li> <li>5. A Guide to the Project Management Body of Knowledge (PMBOK® Guide) – Fifth Edition (RUSSIAN). Project Management Institute, 2014.</li> </ul>
Управление человеческими ресурсами	Теория организаций Управление персоналом Организационное поведение	<ol> <li>Дафт Р. Теория организации. – М.: Юнити, 2006.</li> <li>Армстронг М. Практика управления человеческими ресурсами. – СПб: Питер, 2012.</li> <li>Кибанов А.Я. Основы управления персоналом: Учебник. – М.: ИНФРА- М, 2012.</li> <li>Роббинз С.П. Основы организационного поведения. – М.: Вильямс, 2006.</li> <li>Лютенс Ф. Организационное поведение. – М.: ИНФРА-М, 1999.</li> </ol>
Экономика впечатлений: менеджмент в индустрии гостеприимства и туризме	Исторические основы менеджмента, функции менеджмента, подходы в менеджменте Маркетинг	1. Дафт Р. Менеджмент. – СПб: Питер, 2012. 2. Котлер Ф., Армстронг Г., Вонг В., Сондерс Д. Основы маркетинга. – М.: ИД «Вильямс», 2012. 3. Материалы, размещённые на страницах магистерской программы «Экономика впечатлений менеджмент в индустрии гостеприимства и туризма» в социальных сетях: а) https://www.facebook.com/pages/Experie nce-Economy-Hospitality-and-Tourism- Management-HSE- Moscow/498129256910790?ref=bookma tks 6) http://vk.com/club50339975

Однако для получения высших оценок за олимпиадное задание *рекомендуется не* ограничиваться изучением только профильных дисциплин.

Например, успешно справиться с олимпиадным заданием, в котором рассматриваются проблемы маркетинговых коммуникаций (дисциплина профиля магистерской программы «Маркетинговые коммуникации и реклама в современном бизнесе»), будет невозможно без знания основ маркетинга (дисциплина профиля магистерской программы «Маркетинг»), а с заданием, в котором рассматриваются вопросы стратегии и политики управления человеческими ресурсами (дисциплина профиля магистерской программы «Управление человеческими ресурсами»), – без знания основ стратегического управления (дисциплина профиля магистерской программы «Управление человеческими ресурсами»), – без знания основ стратегического управления (дисциплина профиля магистерской программы «Стратегическое и корпоративное управление») и т.д.

*Ответ* (критический анализ научной статьи) должен быть хорошо структурированным, логически последовательным и аргументированным.

При выполнении творческого задания участники олимпиады должны продемонстрировать только не понимание текста статьи, широту знаний соответствующих понятий, теорий, концепций, практических подходов, методов и технологий, но и глубину их понимания, умение грамотно оперировать ими, анализировать их взаимосвязь, а также логически связанно и аргументировано излагать свою точку зрения, делать выводы, давать критическую оценку.

Важными характеристиками «отличного» ответа на творческое задание должны являться умение излагать свои мысли в тексте в стилистике научных работ, а также владение методами научной аргументации. Приветствуются ссылки на монографии, профессиональные источники и литературу, их цитирование, а также практические примеры.

Для освоения специальной англоязычной терминологии по менеджменту см. Сычева Л.В. Словарь менеджера (Manager's vocabulary): пособие для изучающих «деловой английский». – М.: Издательство ГУ-ВШЭ, 2003.

Также рекомендуется посмотреть научные статьи в англоязычных печатных и электронных изданиях, соответствующих профилю выбранной участником олимпиады магистерской программы. Базы данных зарубежной периодики см. на <u>http://library.hse.ru/e-resources/e-resources.htm#journals</u>.

Во время выполнения олимпиадного задания участникам разрешается пользоваться англо-русским словарем (но *только печатным изданием*, а не электронным).