Do low-brow tastes demonstrate stronger categorical differentiation?

A study of fiction readership in Russia¹

Mikhail Sokolov

European university at Saint Petersburg

Nadezhda Sokolova

European university at Saint Petersburg

¹ **Corresponding author:** Mikhail Sokolov, European University at Saint Petersburg, 6/1 Gagarinskaya street, 191187 St. Petersburg, Russia, phone. +7(812)386-7640, e-mail: msokolov@eu.spb.ru

The authors are deeply indebted to Konstantin Linno, the head of Electronic resources division of the Russian National Library who assisted in downloading the database. We are also grateful to Alexandra Makeeva, Maria Safonova, Tatyana Tretyakova, Anzhelika Tsivinskaya and three anonymous reviewers for their comments and suggestions and to Kirsty Kay for proofreading the text. The study was supported by a research grant from European University at Saint Petersburg.

© <2018>. This manuscript version is made available under the CC-BY-NC-ND 4.0 license
<http://creativecommons.org/licenses/by-nc-nd/4.0/>

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Abstract

In his paper establishing the foundations of omnivorousness theory, Richard Peterson suggested that the system of tastes is organised as a pyramid “with one elite taste at the top and more and more alternative forms at about the same level as one moves down the pyramid toward its base”, with tastes at the bottom “mark[ing] the status boundaries between taste groups defined by age, gender, race, region, religion, lifestyle” (1992, p.254). Whereas high-status individuals are likely to consume a few genres at all levels of the taste pyramid, low-status ones tend to patronise only one genre situated at the bottom. One of the predictions following from this model concerning the omnivorousness of privileged groups has been tested in numerous studies, but the thesis of low-brow tastes having stronger structural embeddedness has been researched much less extensively. If Peterson is correct, we should find that the consumption of high-brow objects strongly correlates with status characteristics such as education where the consumption of low- and middle-brow does not; by the same token, the consumption of low-brow objects would correlate with gender, age, ethnicity, or other groupings where the consumption of high-brow objects does not. In this paper, we use a dataset from a St Petersburg public library system to analyse 1 900 000 book choices of over 170 000 readers to find out whether these predictions hold. We find that there is indeed a strong negative correlation between the attractiveness of authors for predominantly educated readers and the gender and age specificity of their audience. We discuss three possible theoretical explanations of this finding which can be discerned from the literature: (1) “group” and (2) “grid” interpretations, using the terms from Mary Douglas’s cultural theory, and (3) the opposition between relaxational and self-cultivating usages of culture. We argue that the particular differentiation pattern speaks against the “group interpretation” prevalent in other literature.

Keywords: cultural consumption, literary tastes, Big Data, Mary Douglas, Richard Peterson, Russian culture

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

1. Introduction

In what became one of the most influential articles in the sociology of culture, Richard Peterson described the organisation of the system of tastes in the following terms:

...the taste hierarchy does not so much represent a slim column of taste genres one on top of the other as it does a pyramid with one elite taste at the top and more and more alternative forms at about the same level as one moves down the pyramid toward its base. Thus as one approaches the bottom, musical taste can serve not only to horizontally mark the status level but also to vertically mark the status boundaries between taste groups defined by age, gender, race, region, religion, lifestyle, etc. that are at roughly the same stratum level. (Peterson, 1992, p.254)

Peterson proceeds to state that there exists an inverted pyramid of consumption, with socially privileged groups consuming art belonging to many genres at all levels of cultural refinement (or “brow” levels,) and non-elite groups consuming only one, low-brow, genre. This proposition, known as the “omnivorousness thesis”, has been tested in numerous studies (Peterson, 2005; Katz-Gerro, 2011). There have been far fewer attempts, however, to prove that the system of tastes is indeed organised as a non-inverted pyramid: with tastes at the bottom (but not at the top) of the pyramid correlated with other societal division, such as “age, gender, race, religion, lifestyle, etc.”. If Peterson is correct, we would find that the consumption of high-brow objects strongly correlates with class characteristics, such as education, but the consumption of low- and middle-brow does not;² on the contrary, the consumption of low-brow objects correlates with gender, age, or other groupings, where the consumption of high-brow objects does not.

Variations of this thesis have occasionally been mentioned in scholarly publications, starting with the now-classical work by Bethany Bryson (1996). A recent article by Omar Lizardo and Sarah Skiles suggests that “among persons who belong to low-status groups, symbolic exclusion

² Note the difference with Bourdieu: if the “homology thesis” is correct, consumption of all objects could be predicted from the position within the class hierarchy an individual occupies. If Peterson is right, however, only upper class positions could be accurately predicted from consumption of high-brow genres, as low-brow genres are consumed by both high- and low-status individuals.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

is more likely to play a role in identity-constitution processes via social differentiation from horizontally proximate groups defined by race, gender, religion, and other axes of categorical differentiation” (2012, p.85–86). But while the fact that lower-status groups indeed tended to express more dislikes has been replicated in a few studies,³ there has been, to our knowledge, no demonstration that boundaries of low-brow genre audiences are better correlated than high-brow with other “axes of categorical differentiation”. The aim of our study is thus to establish whether Peterson and others were correct in assuming more correlation between demographic characters and low-brow, rather than high-brow tastes. Such a demonstration is desirable in itself as it would prove that Peterson’s elegant pyramidal model is empirically valid. It is also desirable, however, for the theoretical repercussions such a demonstration would produce.

The aims of this paper are thus twofold. First, it seeks to prove the existence of an empirical phenomenon. Second, it discusses the possible theoretical interpretations of this phenomenon. The paper first presents empirical evidence and then proceeds to theoretical interpretations of this evidence.. Our reason for organizing it in this way was that we wanted to be transparent about the exploratory character of this analysis and to recognize that the theoretical considerations emerged as post-hoc interpretations of our findings, rather than driving our study from the beginning. Our analysis’ starting point was the discovery of a statistical pattern in a database that falls under the category of Big Data—a sizable electronic dataset covering choices of above 170 000 readers that was generated not for research, but for practical purposes (Manovich, 2011). We then moved on to look for theoretical explanations for our observations. Such a data-driven approach have both advantages and disadvantages. On the one hand, the sheer size of database allows for testing propositions that often cannot be tested with data generated for research purposes (such as in the results of traditional surveys). On the other hand, they often do not provide all the evidence necessary to choose one interpretation of findings over others. As a result of this, we could not choose among the three possible interpretations of our evidence or reject any of them completely. Nevertheless, in the theoretical section we argue that of the three interpretations that can be offered, the one holding the most currency in the sociology of cultural consumption seems the least plausible in the light of our data. Whichever interpretation is correct, our findings can serve as an argument

³ Lizardo and Skiles (2016) argue that this pattern is probably on the decline as evidence of “categorical tolerance” is present even among non-elite groups.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

in favour of theorizing that a fundamental asymmetry in relation to culture exists between elite and non-elite groups.

2. The study

There are two possible approaches to finding out if categorical differentiation along demographic (gender and age) lines is stronger in the case of low-brow, rather than high-brow, cultural offerings: one takes individuals as units of analysis, the other one uses artistic objects, figures, or genres. In this paper we used both approaches. Testing a hypothesis at the individual level is a more customary way of treating the subject, as most studies in the sociology of culture rely on questionnaire surveys in which many subjects are involved. The limitation of this approach is that relatively few questions can be asked about an individual's preferences in a survey —usually concerning a familiarity with, or liking of major artistic genres. In this study, we used an alternative source of administrative data, which, in addition to a traditional individual-based approach, allowed us to take artistic figures as units of analysis and the structures of their audiences as variables.

2.1. *The dataset*

We used an electronic dataset that compiles and stores information on books borrowed by all users of the network of St Petersburg municipal libraries in 2015, as well as on selected attributes of the readers. Each book has an electronic number, and when a reader uses her library card a new record with the reader's ID and chosen book emerges in the database. The system was launched in 2000 but only installed at the majority of city libraries over the course of 2014. While applying for a library card, users sign an agreement allowing usage of their data for “research and education purposes”. An anonymised version of the database with personal identifiers of readers removed is available for researchers, courtesy of the administration of the city's library system.

During the registration of a new reader, a librarian fills in a form information on the gender, year of birth, education completed, general employment status (using the categories pre-school, school pupil, student at vocational school, university student, manual worker, non-manual worker, unemployed, retired) and occupation of a reader. We limited our sample to the choices made by adult readers (those who were born in 1995 or earlier, and thus turned 20 or older in

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

2015), as for the younger group we had to face the possibility that their choices were heavily influenced by the requirements of educational syllabi. It is important to note that one needs to have a valid residence registration in St Petersburg to be eligible for accessing most of the library facilities; our sample is thus by definition limited to permanent St Petersburg residents. We used information only about borrowed books, not including those which were consulted in reading rooms.⁴

We included in our analysis only books in the Russian language (which, anyway, comprised above 99% of books borrowed) and only those classified as “fiction” in the library catalogue. For the purpose of this study we choose an author, rather than a specific book or a specific edition of book, as the unit of analysis. All bibliographic records specifying the author’s name were reduced to this single denominator. Records without identifiable authors (collections of poems, magazines or fairy tales) were reduced to the first words of the title; thus in our database there were a few literary periodicals such as “Mysteries and adventures” (*Chudesa i priklyuchenija*).

Overall, we identified 23 838 unique authors in the database. Their books were borrowed 1 908 251 times by 170 312 readers. Removing younger library users decreased the number of records to 1 342 520 with 104 654 unique readers and 22 298 authors. Of this impressive amount of records, however, more than half (57%) featured only books by the 500 most popular authors.⁵ We used these authors as the units of further analysis. For each of the 500 authors we calculated proportions of individuals belonging to different age cohorts, education, gender and occupation categories in their audiences. The number of readers of each author allowed us to study structures of their audiences directly, thus avoiding the usual criticisms (Atkinson, 2011) raised against ascribing brow-level to broad genre categories, such as “classical music” or “mystery stories”.⁶

While immune to some criticisms, there are others that could be raised against this study, typical among those usually raised against Big Data in general (Boyd and Crawford, 2012). The

⁴ The city library network has branches in all districts as well as several central locations holding specialized collections. Differences between readership in different districts, not discussed here, provides an exciting insight in the character of territorial segregation in Russia.

⁵ The book by the least popular of them, Edward Kochergin, was borrowed 456 times.

⁶ One can argue that a specific book, rather than its author, is a proper unit of such analysis, as an author can write a variety of books belonging to different genres situated at different brow-levels. While this is obviously true, analysis of audiences of particular books proved to be complicated, as different writings by the same author were often published in various combinations under unspecific titles, such as “selected works” (that was particularly characteristic of short stories), and translated books were sometimes published under different titles. We thus used authors as units, assuming that, generally, audiences of different outputs of the same author coincide.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

most important of these criticisms relates to our usage of the library database. Library data may be distorted in two different ways. First, visiting the municipal network of public libraries is far from a universal practice in St Petersburg, and it could be that their users provide us with a distorted picture of the tastes of the city population, even less of the country in general. Second, while Saint Petersburg library users as such are not different from general national readers, books they borrow in libraries may provide a biased sample of all books they read because libraries' supplies are not meeting readers' demand. Thus, being chronically underfunded, libraries are unable to buy more expensive editions⁷

To analyse the relation of library users to the general population of book readers, in a representative survey of the city population above eighteen years of age in April–May, 2017 (N=2100: the survey is described elsewhere Sokolov & Kazantsev, 2017), we included the question: “How often have you borrowed books at the city public library system during the last 12 months”, with the answer categories “never”, “once”, “two times”, “three times”, “four to six times”, “seven to nine times”, “10 times or more”. Overall, 9.8% of those surveyed reported visiting a public library at least once in the previous year. The probability of becoming a reader was indeed influenced by various social attributes, with women's odds of visiting a library 2.2 times greater than those of men, and those with higher education 2.1 times greater than those with secondary or incomplete secondary, and 2.0 times greater than those with vocational education (see below, paragraph 2.2.1. comment on the organisation of the Russian education system). The probability of becoming a library user significantly decreases with age, although the coefficient lessens and becomes insignificant if we exclude readers of student age (18–23). Income was insignificant. Important to note is that, with the exception of age, essentially the same proportions characterise the city population of book readers as a whole. Thus in our survey, women and those with higher education reported spending a median of four hours a week reading fiction, while men and those with secondary or vocational education reported two hours. The only significant discrepancy between library usage and general reading activity concerned age—in the survey, we found slight growth with age, with those under the age of 39 spending a median of two hours a week reading fiction, and those above 40 spending three hours, which was not evident from our library data (see Dubin and Zorkaya, 2005 for a nationwide study providing essentially the same picture). Overall, however, it seems that public library users are not crucially different from non-users as far as their major social parameters

⁷ We thank one of the anonymous reviewers for this observation.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

are concerned.⁸ It may be that some relative random factors, such as living next door to a library, play a major role in one's chance of becoming a user.

One might argue that our survey misses subtler social distinctions that cut across major social categories. Library users might be a specific subcategory of readers different from, for example, those who predominantly read electronic books or who buy books in bookstores. Or, even if library users are similar in their preferences to the general population of readers, they may use libraries for borrowing books that comprise only a part of their reading lists, as other books are not available from this source.⁹ To investigate this possibility, we compared the lists of the most popular authors in our database with (a) those derived from the statistics of the Russian Book Chamber on the number of copies of the most popular authors published in Russia, and (b) with download statistics at some of the most popular e-book sites. The Russian Book Chamber annually publishes lists of the 20 fiction writers whose books were printed in the greatest numbers of copies.¹⁰ Of the 20 authors hitting the top in 2015 11 are also present in our list of 20 authors whose books are borrowed in the largest numbers in the libraries, and all but two are among the 50 most in-demand authors. Online shadow libraries, popular in Russia, which offer e-books for download for little or no fee (usually in gross violation of the copyright laws), offer another source of statistics. Here we could expect the greatest divergence, as e-books are disproportionately preferred by younger readers. However, we again find a reasonable degree of overlap.¹¹

Moreover, if we take only books that were borrowed in libraries by the youngest category of users, who are likely to patronise the shadow libraries, the overlap will further increase. Among the books that were significantly more likely to be downloaded than to be borrowed, one mostly finds fantasy and sci-fi books (such as those by Stephen King, George R. R. Martin or Terry Pratchett). In spite of this, the top authors of this category have easily found their way in

⁸ The survey data generally fitted reasonably well with the data from our database: thus, taking into account the demographic structure, the prediction would be that among library users above 20 years the gender ratio would be 3.36:1. In our dataset, the relation is 3.51:1.

⁹ For the most thorough study of Russian libraries, see Gudkov and Dubin, 2005.

¹⁰ Available from <http://www.bookchamber.ru/statistics.html>, retrieved 29 April 2018

¹¹ We took top-20 lists for 5 large electronic libraries providing statistics of downloads—bookz.ru, tululu.org, iknigi.net, ereading.net, lib.rus.ec and calculated the amount of books that were also present in our list of authors. Thus, 9 books from the top of bookz.ru were also in the top of our library list, and 7 more in the top-50. For tululu.org, the count was 4 books in the top-20 and 5 more in the top-50, for ereading.club—5 in the top-20 and 4 more in the top-50, for inkigi.net—5 in the top-20 and 3 more in the top-50, for lib.rus.ec—3 in the top 20 and 6 in the top-50. Only 3 authors present in the top of any of the shadow libraries were absent in our list of 500 authors, all of them Russian fantasy or sci-fi writers.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

the list of those frequently borrowed in public libraries, which provided enough data for us to be able to study their audiences. Overall, it seems that our database offers a relatively undistorted picture of general fiction readership in Russia as far as attributes of readers are concerned, and although some categories of authors are probably underrepresented, we can still study those consumption patterns of which they are a part.

We need to mention one further possible source of error in our data that was mentioned by the librarians we talked to in order to get background information for this study: the fact that those borrowing books are not necessarily the actual readers, but are sometimes family members who ordered books for others in their household. While this inevitably adds some error to our estimations, it is probably relatively random and does not affect our statistical conclusions.

2.2. Measures

If Peterson's model discussed above is correct, we can expect strong correlations between demographic parameters and consumption of certain genres of low-brow literature, with similar correlations for high-brow genres being weaker or insignificant. Oppositely, the reading of high-brow but not low-brow authors can be expected to exhibit a stronger correlation with markers of higher status, such as education. Several approaches to testing this proposition are possible. First, we could directly test the expectation that authors with the highly educated audiences also have the least demographically segmented ones, and, vice versa, the most demographically specific have the least educated readers. Second, we could estimate the effects of education and demographic parameters on the probabilities of reading high- and low-brow authors. The attractive side of the first approach is that it spares the researcher from the need to measure brow-level or the legitimacy of a particular author. Indeed, measuring brow-level or legitimacy of a particular item or genre poses a remarkable difficulty. One finds in the literature on arts consumption two alternative metrics. One of them, used widely in the works of Alan Warde and his various colleagues, uses a ratio of those in the audience of a genre or particular item who possess a university diploma to those who do not (Warde, Wright and Gayo-Cal, 2007, p.150; Warde and Gayo-Cal, 2009, p.123; Warde 2011; but also Bryson, 1996; Leguina, 2015, p.30;). This approach is attractive as it uses easily measurable attributes and produces well-distributed continuous variables. Conceptually, however, it makes some strong assumptions about having predominantly university educated audiences being synonymous

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

with legitimacy. Moreover, using the status of audiences to evaluate legitimacy makes saying that high-status groups prefer high-brow or legitimate art an example of circular reasoning. In any case, using education composition as a measure of brow-level practically returns us to our first approach: demonstrating that the education of an author's audience is negatively related to its demographic specificity.

Another approach is suggested by Paul DiMaggio and Toqir Mukhtar (2004), who point to institutional attributes of highly legitimate art, such as "a tendency for evaluation to place greater priority on responses of critics and artists than on responses of the general public, [being] represented in college and university curricula, likely to receive subvention from private patrons, foundations, or government agencies based on the perceived aesthetic value of their product, and often produced and distributed by non-profit organisations" (2004, p. 175). Taking into account the multiplicity of forms of valorization, however, one can conclude that evaluation legitimacy of a particular author is a formidable task.

In this study, we followed both approaches hoping that the results of the study would be more reliable. First, we calculated the educational composition of an author's audience and then analysed its relations with demographic composition. Second, we grouped our authors into genre communities according to their probability of being borrowed together, classified these communities according to their degree of legitimacy using various institutional criteria, and then studied the ways demographic and education influenced the probability of borrowing books belonging to these genres.

2.2.1. Education composition

Share university educated is conventionally measured as percentage of audience with a university diploma (Warde, Wright and Gayo-Cal, 2007, p.150; Warde and Gayo-Cal, 2009, p.123; Warde 2011, p.150; Leguina, 2015, p.30;). We changed the measure slightly, however, to account for the particularities of the Russian education system and for the limitations of data. Since the Soviet era, children enter school at six years of age. The major divergence between education trajectories takes place after ninth grade, at the age of 15, when a student receives a diploma of incomplete secondary education (Bessudnov, Kurakin & Malik, 2017). Some graduates then leave secondary school for vocational or trade schools, which mostly prepare their students for manual labour professions. Those who remain in secondary school do so for a

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

further two years, until the age of 17, and receive a complete secondary education diploma. Presently, the vast majority of those who studied for 11 years enter university and obtain a higher education degree. In previous generations, both incomplete and complete secondary education were regarded as legitimate educational tracks in their own right, the former leading to unqualified manual occupations, the latter to various lower-skilled clerical jobs. Later, however, both became exceedingly rare and almost exclusively characteristic of individuals within older cohorts.¹²

They appear in the library cards, however, much more often than in the general population due to the deficiencies of library data. Theoretically, information in a reader's library card is subject to annual review, but in all likelihood such updates do not happen; we found a sizable segment of readers who, according to their cards, were secondary school pupils and over 20 years old (which is impossible according to existing norms). We thus excluded data on incomplete and complete secondary education, which sometimes signalled a former stage of one's educational biography. We then calculated the percentage of those with completed higher education among those who reported as having either vocational or higher education.

The measure using only the information on vocational and higher education is substantively valid as it shows the relative presence of individuals who at a certain stage of their careers made a conscious choice in favour of either vocational training associated with career tracks leading to qualified manual occupation, or higher education which is legally required as a qualification for a vast majority of professional and supervisory jobs.¹³ It thus allows identifying authors having sizable amount of readers among working and lower service occupations.

2.2.2. Gender specificity

A binary category for gender was used in the database for all readers. From it we derived two indices.

¹² In the 2010 national census, 17.91% of St Petersburg inhabitants above 15 years old reported having only secondary or incomplete secondary. Among those above 17 years (the usual age of completion of secondary school) the amount was 14.9%, of them 5.1% having incomplete secondary (nearly without exception being those of retirement age), and 9.8% complete secondary.

¹³ Some individuals obtain vocational and, later, higher education, usually in order to be promoted from manual to lower supervisory jobs, but library cards fix only the highest educational achievement, and they were thus qualified as having higher education.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Z-score-measure—we calculated the distance between the share of men and women in the audience of a particular author in standard deviations from the average (which was 79.9% female, 20.1% male). The measure was not perfect as the average was closer to the all-women pole, and the distribution somewhat skewed, so that the highest values were disproportionately assigned to authors preferred by male readers.

Rank-measure—to compensate for this, we calculated another measure based on distance from the median composition (which was 82.7% female, 17.3% male). All books were situated in a continuum between those having most women among their readers to those having most men. Then a rank from 250 to 1 was assigned to each of them, based on their distance from the median, with 1 being the closest and 250 the farthest. Each rank was thus assigned to a pair of authors, one from each tail, with 250 standing for the greatest distance (authors being most gender-specific) to 1 (authors being least gender-specific).

2.2.3. Age specificity

Age variance—we calculated age variance within the audience of each of the 500 authors

Generational concentration—as an alternative measure, we calculated a Herfindal-Hirschmann index, characterising the concentration of an author's audience in particular five-year generations. We used the formula $\sum(X/S*100)^2$, with X standing for number of readers belonging to a particular five-year generation, and S—the grand total of all readers.

2.3. *Natural genre grouping and legitimacy measures*—In addition to statistics on book audiences, we also relied on a grouping of books obtained by a Louvain algorithm detecting communities in network structures (the original technic is described in Blondel, et al. 2008). We created a unimodal network from a bimodal network fixing events of borrowing the books of a particular author by a particular reader. In the unimodal network, authors were connected with the weight of tie equal to the number of times they were borrowed together (see Vlegels & Lievens, 2017, for an example of a similar approach and discussion of its advantages over traditional MCA and cluster analysis).¹⁴ For the purpose of our analysis we needed a grouping

¹⁴ We excluded isolates and deleted all loops (Multi-Level Coarsening and Multi-Level Refinement procedures in Pajek were used as this program has tools for analysis of big and weighted networks). As a result of the reduction, the number of vertices decreased from 22 299 to 22 124. At the next stage, we experimented with different resolution parameter (using default values for Maximum Number of Iterations in each Restart, Maximum Number of Levels in each Iteration and Maximum Number of Repetitions – 20,20,50) to partition the network into clusters

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

that would produce the maximum amount of clusters of comparable size and allowing statistical analysis. The optimal decision was obtained at resolution 1.3 that produced 57 clusters, of which the largest seven comprised 97.85% of all authors, including 494 from our top-500 list. The solution had a modularity of 0.22, showing that the divisions between clusters were far from clear-cut; nevertheless, the communities themselves seem generally meaningful. Importantly, this grouping was not dependent on any of the readers' attributes, but only on the probabilities of particular books being borrowed together.

The first three columns in Table 1 list the names of the clusters, the most popular authors belonging to each of them, and cluster sizes. Generally, the clusters are easy to interpret using the folk taxonomies of genres. The major anomalies—from the point of view of mundane classifications—are related to the position of the Russian classics, which was split between two clusters. Thus, Leo Tolstoy and Alexander Pushkin are found among books for children (cluster 1, also including Astrid Lindgren and Tove Jansson), while Fyodor Dostoevsky is put into the same group with Erich Maria Remarque and Stephen King (cluster 7). The most likely explanation for the location of classics is that besides writing tales and stories for children, Tolstoy and Pushkin are a part of school literary syllabi, and while pupils themselves were excluded from the numbers of readers whose preferences we analysed, it may be that in some cases they were borrowed by adults for younger members of their families. The boundary between clusters 1 and 7 obviously looks somewhat arbitrary, and some other cluster solutions we obtained while analysing the data put the school ration of Russian classics in a separate cluster. Cluster 3 also sometimes split into separate detective and fantasy/sci-fi sections.

Community name	Most popular representatives	N	<i>Gosstandart</i>	Nobel prizes	Russian literary prizes
1. Literature for children - Russian classics	Tolstoy, Pushkin, Chekhov, Gogol, Nosov	5390 (69)	27 30.3%	1 5.9%	1 1.8%
2. Contemporary Russian prose	Rubina, Akunin, Tokareva, Ulitskaya, Prilepin	3756 (72)	8 9.0%	1 5.9%	25 45.5%
3. Russian detectives/ fantasy/science fiction	Abdullaev, Bushkov, Leonov, Lukjanenjo, Kolychev	3683 (46)	0 0.0%	0 0.0%	8 14.5%

or communities. Our usage of a community detection algorithm was thus similar to the usage of traditional cluster analysis; however, it allows working with datasets of a much larger size with much lower degree of density (de Nooy, 2003).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

4. Translated detectives	Nesbe, Kristi, James, Gerritsen, Granzhe	2058 (59)	2 2.2%	0 0.0%	5 9.1%
5. Translated romance/ detectives	Roberts, Steel, Brown, Sheldon, Pilcher	1933 (37)	3 3.4%	0 0.0%	1 1.8%
6. Russian romance/ detectives	Marinina, Dontsova, Vil'mont, Ustonova, Litvinova	1398 (80)	3 3.4%	0 0.0%	6 10.9%
7. International classics	Dostoevsky, Remarque, King, Bradbury, Schmidt	3177 (131)	46 51.7%	15 88.2%	9 16.4%
All network		21819 (494)	89 100%	17 100%	55 100%

Table 1. Seven communities, their principal representatives, number of authors (N in top 500 in parenthesis) and number of authors belonging to top-500 included in Gosstandart, winning Nobel or Russian literary prizes

Another seeming anomaly is cluster 7, which includes Dostoevsky and Remarque alongside King and Vladimir Nabokov (as well as F. Scott Fitzgerald, Jane Austin, Terry Pratchett, Paolo Coelho, and Anna Gavalda). The group appears to be a textbook case of omnivorousness. In fact, most translated authors, apart from authors of children's, romance, or detective books, fall within it, although those writers traditionally considered high-brow, such as Orhan Pamuk or John Fowles, prevail numerically.

The final three columns in Table 1 present three measures of legitimacy for authors being included in each respective cluster. First is the number of the authors included in this cluster who were part of the State Standard (*Gosstandart*) for teaching literature in secondary schools. *Gosstandrat* includes a list of (mostly Russian) authors, studying whose work is obligatory. It also offers a list of authors who a given teacher may choose to include in their reading lists. While not directly intended to serve as a standard of cultural importance (some books were probably included on the list as appropriate for children or adolescents, rather than being culturally significant), *Gosstandart* offers a useful measure of how legitimate an author is considered to be in Russia. The next column is the number of authors belonging to each cluster who received a Nobel Prize in literature, the most well-known global literary prize. The final

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

column lists the number of authors receiving Russian literary prizes between 1991 and 2015.¹⁵

The distribution confirms the intuitive impression that clusters 1, 2 and 7 can be considered legitimate, while others not. Overall, these three clusters account for 64% of Russian book prizes, 91% of authors included in *Gosstandart*, and 100% of Nobel prizes.

Incidentally, our grouping confirms recent evidence that conventional genre categories serve to describe real-life tastes poorly (Vlegels & Lievens, 2017). Thus, while we do find genre communities, books that are sometimes placed under the “detective” category dominate in three of them and could be found in all others.

3. Results

3.1 Individual-level analysis

Table 2 cites some very elementary statistics—Spearman’s Rho correlations—presenting strong evidence in favour of Peterson’s hypothesis. We do invariably find strong positive correlations between alternative measures of the same variable (two measures of gender specificity 0,863; two measures of age concentration 0,750) and moderate (in 0,25–0,45 range), but highly significant negative correlations between the share of audiences with higher education and the concentration of members of the particular gender and generational groups in them. The lower the brow-level, the more salient, in general, the demographic profile.

	Gender specificity (Z-measure)	Gender specificity (R-measure)	Age concentration	Age variance	Share university educated
Gender specificity (Z- measure)		.863***	.145***	-.323***	-.434***
Gender specificity (R- measure)			.128***	-.231**	-.364***
Age concentration				-.750***	-.249***
Age variance					.456***

* p < 0,05, ** p < 0.01, *** p < 0.001

¹⁵ We relied here on an unpublished work by Ksenia Ovadenko (2014), who compiled a database on the winners of 46 nationwide literary prizes regularly awarded in Russia between 1991 and 2014. The prizes differed in the genres of literature they targeted, with some aimed at rewarding highly legitimate work (the “Russian Booker”), with others launched to encourage writing in genres that are considered generally less legitimate, such as science fiction (“Aelita”). We did not try to classify prizes themselves according to their brow-level, believing instead that, overall, prizes would gravitate to work that would be highly legitimate.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Table 2. Spearman's Rho correlations between characters of audiences for 500 authors

Figure 1 depicts the relations between education level and gender composition. We see that high-brow tastes tend to be balanced in terms of representation of each gender category (with a general prevalence of women), while low-brow ones are strongly segregated along gender lines. There are books almost exclusively borrowed by women, and they, with some notable exceptions, tend to be low-brow. The fact that we do not find authors borrowed only by men (as Danielle Steel is borrowed almost exclusively by women) may be partly explained by the fact mentioned above that library users are often delegated the function of borrowing books for their households following requests from other family members. As women generally prevail among library users, this creates a significant share of women among borrowers of all books. It is noticeable, however, that while no books are borrowed exclusively by men, books with the largest male audience have a standing even lower in the education level of their readers. Note that this introduces a source of errors in our data: the education of the family member reading a book does not necessarily coincide with education of the one who borrowed it. This fact makes correlations of literary preferences with education even more remarkable, albeit unsurprising in the light of what we know from other studies on endogamy and the reproduction of achievement among highly educated groups (DiMaggio and Mohr, 1985).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Figure 1. Share of men and share of those with higher education in audiences of 500 most widely read books, with selected authors highlighted

The outliers deserve separate analysis. A few writers situated in the upper left angle and borrowed nearly exclusively by university educated women are authors of books for children. Generally, the chances of borrowing children's literature from the library strongly increase with education, and Sven Nordqvist, Jansson and Lindgren are among the authors with the most educated audiences (nevertheless, even here one finds some variation with translated classics preferred exclusively by university educated parents and books on animals by Russian authors preferred by the less well educated audiences). In spite of being characteristic of highly educated audiences, borrowing books for children is a gendered practice: women were strongly overrepresented among those who took home cluster 1 books. Also among books preferred by university educated women are classic romance novels, from Austin to Françoise Sagan. Among the books disproportionately preferred by university educated men are fiction books bordering on political journalism or satire (Dmitrii Bykov, Eduard Limonov, Alexander Prokhanov).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Generally, it seems that there could be more gender segregation in the readership of non-fiction literature than in fiction, even among books almost exclusively read by university educated audiences, with women almost exclusively the readers of various self-help books or books on housekeeping or cooking, and men preferring political or military history (cf. Zavisca, 2005; Dubin and Zorkaya, 2005). Thus, the lonely point in the upper right corner is a “Mysteries and adventures” periodical, which, in addition to fiction, publishes various articles on history. Characteristically, some of the books occupying an ambiguous position are those which mixing genres, such as Ann Rice’s vampire saga, apparently qualifying as both fantasy and romance.

To account for the special position of literature for children, which demonstrates a higher age concentration because of life cycle effects (see Figure 2 and accompanying discussion), we recalculated the correlations after excluding books that belonged to cluster 1. Supporting our proposition, we received even stronger correlations than we did previously (Table 3). Thus, the correlation between the share of those university educated (including students) and age variance grows from 0.456 to 0.599.

	Gender specificity (Z- measure)	Gender specificity (R-measure)	Age concentration	Age variance	Share university educated
Gender specificity (Z-measure)		-.883**	.178**	-.378**	-.496**
Gender specificity (R-measure)			-.214**	.324**	-.413**
Age concentration				-.699**	-.376**
Age variance					.599**

* $p < 0,05$, ** $p < 0.01$, *** $p < 0.001$

Table 3. Spearman’s Rho correlations between characters of audiences for 431 authors (excluding authors of children’s literature)

3.2. Cluster-level analysis

Listing values of variables characterizing genders, age and education of readers for the seven clusters, Table 4 provides further arguments in favour of Peterson’s model. Indeed, we see that

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

clusters we recognised as high-brow or legitimate (clusters 1, 2 and 7), have the highest percentage of university educated readers. They also produce shares of men and women in their audiences which are very similar to the averages in the sample as a whole. Opposingly, books specifically preferred by men (cluster 3) or women (clusters 5 and 6) have the least educated audiences. The relation between education and age specificity is the same: the higher the brow-level, the lower the specificity. The major exception here is cluster 1, which demonstrate high age concentration combined with high percentage of university educated readers. Its position can be explained, however, by the fact referred to above—it is the literature to an important degree borrowed by parents of children of school age who are likely to be younger adults. We will provide additional confirmation of this below (see Figure 2 and the accompanying discussion).

Community name	Per cent men	Gender specificity (Z-measure) *100	Gender specificity (R-measure)	Per cent university educated students	Age concentration	Age variance
1. Literature for children - Russian classics	16.07 (5.25)	.44 (.48)	167.52 (63.95)	77.38 (3.79)	1157.9 (218.3)	220.60 (42.45)
2. Contemporary Russian prose	22.38 (10.35)	1.11 (1.96)	121.14 (61.05)	77.40 (4.10)	906.1 (73.0)	284.23 (39.72)
3. Russian fantasy / science fiction	50.16 (13.29)	10.77 (7.54)	31.43 (30.81)	63.81 (7.01)	988.4 (88.6)	233.30 (27.83)
4. Translated detectives	20.10 (6.62)	.43 (.68)	153.22 (57.12)	77.04 (3.73)	952.4 (69.0)	255.87 (29.51)
5. Translated romance/ detectives	10.46 (4.90)	1.16 (.53)	83.00 (71.11)	68.22 (6.93)	955.4 (96.7)	281.14 (35.09)
6. Russian romance/ detectives	10.97 (4.54)	1.04 (.59)	99.34 (63.46)	65.32 (4.91)	1072.4 (91.8)	218.97 (29.80)
7. International classics	19.12 (6.44)	.42 (.53)	152.34 (63.21)	78.99 (3.91)	923.9 (129.1)	316.04 (33.68)
All network	20.14 (12.77)	1.63 (3.81)	125.50 (72.24)	73.87 (7.54)	988.5 (149.9)	265.15 (51.63)

Table 4. Average values of selected variable for the seven communities (standard errors in parentheses)

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Table 5 presents further support to Peterson's hypothesis. We took individual readers as units and calculated logistic regression models with borrowing books by at least one of the authors belonging to clusters 1–7 as dependent variables and education, gender and age as independent (squared age was added to account for possible non-linearity). Table 5 lists the results. While all independent variables are highly significant, the strength of effects varies spectacularly.

	Cluster1 (Books for children / Russian classics)	Cluster 2 (Moder n Russian prose)	Cluster3 (Russian fantasy / sci-fi / detective)	Cluster4 (Translat ed detective s)	Cluster5 (Translat ed romance /detecti ves)	Cluster6 (Russian romance / detective s)	Cluster7 (Internatio nal classics)
Gender (male)	.737***	1.063***	2.083***	1.044*	.572***	.600***	.935***
Age	1.049***	1.024***	1.055***	1.034***	1.024***	1.074***	.958***
Age ²	.972***	1.001	.983***	.993***	.999	.980***	1.020***
Educatio n (seconda ry)	.773***	.901***	1.432***	1.103***	1.234***	1.391***	.954*
Educatio n (vocatio nal)	.864***	.897***	1.329***	1.016	1.256***	1.385***	.864***
Cox and Snell pseudo R ²	.021	.048	.040	.021	.035	.065	.006

* p < 0,05, ** p < 0.01, *** p<0.001

Table 5. Odd's ratios of borrowing books belonging to clusters 1–7 (reference category for gender—female, for education—higher education)

The likelihood of borrowing books by authors belonging to clusters 1, 2 and 7 increases with a reader's education level while the probability of borrowing books belonging to clusters 3, 4 and 6 decreases.¹⁶ Incidentally, we see here also that secondary education has effects similar to those of vocational education, albeit less pronounced.

¹⁶ At first sight, this contradicts expectations based on Peterson's double triangle imagery, according to which education will increase the probability of consuming high-brow items, but not decrease the probability of

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

In accordance with the other part of Peterson's model, for clusters 3, 5 and 6 the effects of gender are the strongest while for 2, 4 and 7 they are relatively small. The exception, again, is children's literature, disproportionally borrowed by women. The situation with age is more complicated. Reading authors belonging to clusters 2 and 5 linearly increases with age, with those in their 20s having odds of borrowing them 4 times less than those in their 80s, net of effects of education. In the cases of clusters 1, 3, 4 and 6 an inverted U shape is present. Finally, in the case of cluster 7, we observe a non-inverted U shape. Figure 2 presents these observations in a visual form. Indeed, we see that borrowing books for children peaks when individuals are in their 30s, while borrowing international classics reaches its lows at the same age.

Figure 2. Share of readers borrowing books belonging to the seven clusters in 2015, by year of birth

consuming low-brow ones, as highly educated omnivores also consume them. Here we see, however, that vocational education significantly increases the probability of borrowing low-brow literature, other things being equal. One has to remember, however, that we are calculating the probabilities not for all members of the respective category, but only for those who borrowed at least one book at the library; what the coefficients say is that readers without university education are more likely to read low-brow, rather than high-brow, authors, compared with those with university diplomas.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

Overall, however, age is significant for predicting reading authors belonging to all of our clusters. In other words, all clusters are age-specific. This finding does not necessarily disconfirm Peterson's hypothesis concerning the decreasing significance of age for segmenting high-brow reading, as well as the findings reported earlier, although it requires introducing certain stipulations. Apparent discrepancies with the results of our previous analysis could be explained by the fact that the former dealt with particular authors, while this analysis treats larger genre groupings. It might be that the preference for larger genres among higher- and lower-status audiences is reproduced from generation to generation, while the popularity of particular authors within these genres is much more volatile among lower-status groups. An appreciation of particular authors within Russian sci-fi novel genres is highly cohort-specific,

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

while an appreciation of figures within the international classics canon is not, although the overall social profile of the sci-fi audience is relatively stable.¹⁷

One amazing feature of readership in Russia, which one can notice looking at Figure 2, is that the ratio between the borrowed high- and low-brow literature decreases with age—the older library users are, the more low-brow, on average, is the literature they take home. Younger individuals prefer borrowing books that belong to high-brow cluster 7, and low-brow clusters 3, 5, and 6 find most of their readership among older audiences. A sizable negative correlation exists between the average age of readers of an author and the share of those among them with university education (-0,437). If we look to the possible account for this fact, a re-interpretation of our findings can be suggested. It is possible that the weakening of categorical boundaries is characteristic of younger cohorts rather than of a highly educated strata. But as the general expansion of higher education, occurring after the fall of the USSR, increased the shares of individuals with higher education among younger audiences, we find a negative correlation between education and gender and age specificity.¹⁸

However, while some weakening of categorical boundaries may have occurred in younger cohorts, and is possibly accountable for the variability of authors getting into cluster 7, it does not seem that this effect is primarily responsible for the observable connection between strength of categorical boundaries and status. Most obviously, cluster 2 (Modern Russian prose), popular predominantly among older cohorts, demonstrate the same lack of gender specificity as cluster 7. In regressions that include the gender and age specificity of an author's audience as dependent variables and its average age and share of university educated as independent ones both effects prove significant. However, the effects of education are much more salient (e.g., for Z-measure of gender specificity as a dependent variable, β for average

¹⁷ Incidentally, independence of dynamics of authors and genres responds to one of the criticisms that could be raised against our findings. The criticism points out that genres, rather than individual authors, may be the units having specific audiences and thus we have fewer than 500 independent cases, which means that our evidence remains plagued by the small-N problem. The above analysis shows, however, that preferences for particular authors may change relatively independently of preferences for genres. As another way of responding to the same criticism, we used a general linear model with age variance as a dependent variable and education and belonging to one of our clusters as independent (available on demand). The analysis reveals that while belonging to clusters accounts for a significant part of the variance, higher education explains much of the variance within communities as well as between them.

¹⁸ We are grateful for one of the anonymous reviewers for suggesting the presence of this effect. Indeed, this possibility is disquieting as it undermines the overall validity of the share of university-educated readers as a measure of brow-level. Estimates of brow-level of any taste prevalent among younger audiences using such a measure is likely to be inflated due to the simple fact that many more individuals in the youngest cohorts receive university diplomas than was the case some decades ago.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

age is -0.123, for education -0.519; for age variance β for average age is -0.038, for education 0.423). This is not what we should have observed if both strength of categorical boundaries and share of university educated among an author's readers were effects of their average age. It could still be that the tendency among younger readers to patronize high-brow literature is partially an artifact of our measuring brow-level of an author with average education of her readers.¹⁹ The phenomenon we are dealing with in this article, however, cannot be explained by this fact.

As a conclusion, our findings offer strong support for Peterson's hypothesis: there is a strong negative correlation between the attractiveness of a book for a predominantly educated readership and the gender and age specificity of its audience. As more highly educated audiences demonstrate a strong preference towards literature possessing other signs of legitimacy (literary prizes, inclusion in secondary education curriculum), one can say that the more demographically specific the audience, the less high-brow their reading is likely to be. In the system of tastes, we find on the one pole high-brow tastes with objects consumed by men and women, as well as by young and old together, and segmentary low-brow tastes opposing these groupings to each other on the other pole. It seems that Lizardo and Skiles's supposition that the strongest cultural boundaries exist between different less privileged groups rather

¹⁹ Remarkable contrasts exist between our findings and studies of social determinants of taste in other countries, as far as the effects of age are concerned. Counter to most Western and Northern European cases (Falk and Katz-Gerro, 2016), in Russia younger people tend to be the most avid consumers of legitimate art (Sokolov 2018; Dubin and Zorkaya, 2005). Thus, a series of surveys carried out in St Petersburg between 1991 and 2017 showed that there is a strong life cycle pattern, with successive generations exhibiting similar levels of cultural participation while passing the same stages of their life course (Ille 2016)—most active in the late teens and early twenties, and progressively less active afterwards. We see that the same is true as far as literary tastes in Russia are concerned—overall cluster 7, predominantly consisting of high-brow authors, is disproportionately preferred by younger people. One can speculate about the reasons of Russia being different from the most thoroughly studied European and US cases. Ill protection of property rights, regular currency devaluation and loss of investments in enterprise-specific human capital resulting from the decline of whole industries, and the general economic turbulence characteristic of Russian history may explain why in many senses traditional status culture is much better preserved in Russia than it is elsewhere. In such a society, economic security is less a question of possessing property, or even qualifications, than a question of belonging to social networks; indeed, it is common wisdom in Russia that friendship is the most secure investment one can make (Rose 2001; Kharkhordin, 2009). This may explain why general cultural capital as a status signal and communicative resource granting membership in intelligentsia networks could reproduce relatively unaffected by secular changes, offering some stability in an unstable world. It also explains why so much effort is made by individuals to attain it while relatively young: individuals can expect the greatest payoffs from strategic investments in cultural capital when they are establishing long-lasting social relations and entering the labour market; when one's social position is established, cultural consumption may provide rapidly decreasing returns. A related interpretation is that among younger generations, reading yielded to other activities in the role of "mere entertainment", such as watching TV or surfing social networks (this fits well with the finding reported above that the median number of hours young people spend reading fiction is lower). Compared with older cohorts, younger people predominantly read with self-cultivating intentions and so the overall pool of their reading tends to be more high-brow.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

than between privileged and non-privileged ones, is still valid (Lizardo and Skiles, 2012), and even if they are gradually disappearing, in Russia at least this process is far from complete.²⁰

What is the precise character of the process producing stronger categorical differentiation among audiences of low-brow genres? In the next section we will describe three interpretations which could be discerned from a survey of cultural consumption literature and discuss how they fit our data. While our evidence is unlikely to be conclusive, we argue that analysis of the specific character of categorical differentiation of low-brow tastes may shed some light on the relative strength of these interpretations.

4. Discussion and theoretical interpretations

Of the three theoretical interpretations of greater demographic specificity of low-brow genres, the first two can be nicely summarized by referring to Mary Douglas's group and grid "cultural theory" (Douglas, 1996 [1970]; Douglas, 1996; Douglas, 2000).²¹ In Douglas's work, "grid" stands for the degree of tolerance to anomalies not fitting into a culture's or subculture's classification orders. High-grid cultures are ones which are averse to the transgression of categorical boundaries, while low-grid cultures are more tolerant or even jubilant about such possibilities. Among other things, high-grid cultures insist on a clear-cut division of gender and age roles, celebrate these divisions with differences in appearances and styles, and react to the refusal of following such conventions with disgust (to borrow from Henry James, they are the ones who abhor men with long hair, and women with short). High-grid cultures are also obsessed with correlating different systems of categories with each other, for example, associating body parts with celestial bodies—a preoccupation which is alien to low-grid cultures. The second "group" dimension stands for describing salience of a tendency to use all sorts of cultural materials for drawing clear boundaries separating "us" from "them", establishing strong solidarities among "us", and rejecting "them" with disgust and contempt. "Groupness" does not exclude "gridness", but does not assume it either; rather, they are independent dimensions. There is thus a specific kind of "sectarian" culture Douglas was

²⁰ Interestingly, Peterson's pyramidal imagery seems deficient at other points, at least as far as literary tastes in Russia are concerned. There is no indication that there are fewer genres at the top of our pyramid, than at the bottom. Even if we take the obscure "international prose" (cluster 7) category as a single genre, a clear-cut boundary would still remain, separating it from Russian-language modern prose (cluster 2) with the younger generation of readers preferring the former and older ones the latter.

²¹ So far, Douglas's work found only limited usage in the sociology of culture. The important exceptions are Jordi Lopes-Sintas and Tally Katz-Gerro (2005), although they were not utilising the grid and group distinctions that Douglas herself regarded as her major achievement, and Alan Warde (2011).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

particularly interested in, which are at the same time low-grid, egalitarian, and which defy all kinds of distinctions inside, and high-group, paranoid, and which isolates itself from the polluted world outside.

Both grid and group may explain the omnivorousness of the privileged groups and a stronger categorical differentiation among the less privileged ones. In the “group interpretation” frameworks, stronger categorical differentiation among the non-elite groups results from their members’ tendency to use culture for establishing strong solidarity among their peers, complemented by a “cultural hostility” to outsiders (Warde, 2011). Omnivorousness, according to this interpretation, results from another usage of culture, one which treats it as a resource for establishing connections to members of various social strata and bridging cultural holes rather than maintaining group solidarity (Erickson, 1996; Lizardo and Skiles, 2012; Lizardo, 2014). Treatment of culture as an essentially communicative resource finds its expression in the conspicuous refusal to deny tastes widespread among members of other groups (Lizardo and Skiles, 2016); omnivores are celebrated in low-group cultures for the richness of their interactional repertoire and absence of prejudice.

Within the frames of the “grid interpretation”, it is the attitudes held within high- and low-grid cultures toward categorization itself that opposes them to each other. High-grid cultures reject whatever does not fit in their classification orders; low-grid cultures tolerate or even celebrate it. High-grid cultures delight in witnessing the reproduction of their classification patterns in all spheres of activity so that, for example, any possible set of individual choices (clothes, hairstyles, preferred colours, as well as literary and artistic tastes) are firmly divided into male and female, while low-grid cultures reject such correlation as restrictive and boring. The grid interpretation seems less prevalent in the omnivorousness literature, although some texts explicitly define the omnivore as the transgressor of categorical boundaries, rather than one having a particular distaste for social exclusion (e.g., Lahire, 2008; Ollivier, 2008). In Douglas’s own writing, class tastes are connected with grid, rather than group, dimensions. Precise association between class and grid dimension is historically contingent, and may change several times during the history of a single civilisation (Douglas uses the example of Chinese porcelain [1996, p.122–125]). Upper class culture in modern Western societies, as described by Lizardo, Ollivier and others, is thus principally low-grid, while lower class culture is mostly high-grid. According to this interpretation, the cultural openness of the privileged groups is probably further supported by the fact that the rigid “brow” classification system is itself part of high-grid

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

culture, and therefore low-grid culture negates its relevance (Goldberg, Hannan and Kovacs, 2016).

The third interpretation also refers to differences in cultural usages, but it is an interpretation that points to the predominant aims of cultural consumption. A few studies have stressed that low-brow art usually serves for entertainment and relaxation purposes, while high-brow art is consumed in pursuit of self-development and “transcendence” (Holt, 1998; Atkinson, 2011, p.180–185; Lahire, 2008, p.175; Roose, van Eijck & Lievens, 2012). This difference in usage may also result in stronger categorical differentiation, at least for some art forms. Thus, in the case of literature, entertainment and relaxation is associated with a process of daydreaming, usually involving characters one can easily identify with.²² The identifiability of a particular character for a given reader, however, is probably deeply influenced by the similarity of their attributes, particularly gender and age; thus, one can think of fantasy novels such as Stephanie Meyer’s, featuring adolescent protagonists experiencing all sorts of romantic adventures their predominantly teenage audiences are probably secretly dreaming about. For this reason, the prevalence of usages of cultural products involving identification with characters is likely to segment audiences along demographic lines, while usages not related to identification may show less tendency to do so.

The mechanisms supposed by these three hypotheses are not necessarily mutually exclusive, and may be even mutually reinforcing. Particularly, the grid interpretation of omnivorousness and the entertainment/transcendence interpretation may be easily synthesised. The prevalence of entertainment usages among non-elite consumers, and of transcendence usages among elite ones may create the structure Peterson describes—demographically segmented low-brow pole and non-segmented high-brow—even in the absence of any specific role rigidity among consumers of low-brow culture. However, if gender and life cycle roles are rigidly defined among audience of low-brow literature—which their belonging to high-grid culture leads us to expect—the effect is likely to be particularly salient.

Nevertheless, in spite of points of convergence, the three explanations are still analytically different and at some points lead to conflicting expectations. These conflicting expectations

²² On the opposition of “affective” or “immersive” vs. “rational” reading, and the affective reading’s inferior status in modern intellectual culture, see Radway (2009); Felski (2011); Millner (2012); discussion of this opposition in present-day Russia can be found in Samutina (2016).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

relate to two areas: first, the presence and direction of patterned “cultural hostility”; second, the specific nature of categories differentiating low-brow consumption. As for hostility, the “group” interpretation suggests that low-status groups will exhibit a significant amount of intensive dislike aimed at tastes of other low-status and higher-status groups, with higher-status groups not reciprocating these negative feelings. The “grid” interpretation suggests that disapproval among lower-status groups may primarily be aimed at individuals whose tastes are considered categorically inappropriate rather than considered to be tastes as such. Thus, men in a traditional European high-grid subculture will not necessarily profess intense dislike for romance novels, and women for football matches (Warde, 2011), but both will be distrustful of men liking romance, and women enjoying football. By the same token, low-grid subcultures may approve of such transgressors. Overall, we can thus expect little dislike by low-status audiences for high-grid genres patronised by other such audiences. Instead, one may speculate that there will be a tendency for low-status audiences to reject all low-grid genres and artists, and for high-status a symmetric tendency to reject all high-grid offerings, although it does not need to achieve a degree of full-fledged hostility.²³ Finally, in the case of an “entertainment/transcendence” interpretation, indifference rather than intensive dislike may be characteristic of attitudes held by low-status consumers to objects of taste held by other groups of such consumers, although some degree of snobbish contempt could be expected on the part of high-status groups. In contrast to the first two, this interpretation does not assume the existence of in-built mechanisms for the emergence of omnivorousness, although one can suggest that those using culture for transcendence may often allow themselves a break and have some unsophisticated entertainment.

Regretfully, our data shed no light on the character of cultural hostility experienced by actors, as we cannot know how they felt about books they did not borrow. The study coming closest to systematically testing expectations arising from the group interpretation is that of Alan Warde (2011), who used the results of a representative survey of the British population to test if any patterned cultural hostility could be detected. Warde discovered that overall, the degree of variation in dislikes that could be explained by belonging to the major social categories was insignificant, and in cases where members of some categories tended to dislike genres and particular items patronised by other categories, the categories under question included gender

²³ Importantly, “grid interpretation” suggests that low-grid culture of the elites is likely to cause repulsion among non-elite groups, rather than admiration and envy. It is perceived as perverse, and in no way serves as a source of legitimacy (cf. Holt [1997], Lizardo and Skiles [2012]).

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

and age together with class. Warde rightfully expresses doubt as to whether we can talk of “cultural hostility” between genders (Warde, 2011, p.358). His findings thus offer little support to the “group” interpretation. The other two interpretations, however, do receive some support, as they can explain why whatever hostility we find tends to be patterned along demographic lines. Intriguingly, Warde observed no hostility towards tastes of groups occupying different position on the status scale, which could be derived from all three interpretations.

Further research is needed, however, to test expectations concerning the directions of cultural hostility that arise from our three models. Particularly promising avenues for such research may be opened up by the use of Big Data sets that include information on dislikes, as well as likes, of a wide variety of cultural objects (databases of various recommender systems come to mind).

The second respect in which the three interpretations differ concerns the expectation along *which* categorical lines low-brow tastes will be primarily segmented. The “group” interpretation suggests that categories most likely to structure audiences for low-brow culture are those which serve as the primary object for social allegiances and antagonism amongst members of lower-status groups. Thus, class, religion and ethnicity are mentioned as the usual suspects for structuring cultural consumption (Bryson, 1996; Lizardo and Skiles, 2016). While the “grid” interpretation allows for ethnicity or religion to be associated with categorically appropriate tastes, their centrality is likely to be eclipsed by other categories perceived as the most universally important for defining social identity. Within this framework, gender is probably the most likely candidate to be the principal dimension for structuring audiences. The same is true for the “entertainment/transcendence interpretation”, according to which low-brow consumers are likely to be segmented along categories sharing common themes for daydreaming. As an addition to gender, dream-sharing categories probably also include age—playing a role both as a proxy for life cycle stage and as a correlate of certain generational experiences supplying themes for fantasizing.

Here our evidence offers some insight. Generally, one can conclude from our data that age and gender boundaries, rather than that of “race, region, religion” (Peterson, 1992, p.254), shape audiences of low-brow genres. There is not much in terms of ethnic, political or religious boundaries, cross-cutting demographic one, that could be discerned from our automatic clustering of literary tastes. One may suspect that the division between tastes for Russian or translated literature could be correlated with the division between pro-Western and nationalist

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

camps that organise much of Russia's political life. The existence of such a correlation, however, would seem less likely if we take into account the fact that a few of the most popular Russian modern prose writers, occupying central positions in cluster 2, are well-known for their liberal views (Akunin, Bykov, Ulitskaya). In our survey, we could not find any trace of correlation between nationalism and the preference for domestic cultural products.²⁴ In our data we can thus see little support for the "group" interpretation of Peterson's model, and much for the "grid" interpretation. The evidence casts doubt on the widely accepted view that elite tastes today are characterised primarily by a refusal to use culture for exclusion while, in contrast, non-elite tastes facilitate an establishment of stronger solidarity within pre-existing groups.²⁵ Readiness to disregard rigid gender and age expectations may be a more salient divisive principle in the system of tastes than eagerness to maintain group solidarities.²⁶

The entertainment/transcendence interpretation also seems to fit our evidence well. An in-depth look at the categorically differentiated low-brow literature shows that the most popular books in these genres are full of identifiable characters. Thus, say, protagonists of Darya Dontsova's most successful series are well-to-do women in their forties or fifties, known as writers or journalists, having highly successful grown-up children and living lives full of leisure and wealth—described in much detail—who serve as amateur detectives; similarly, characters of many of Bushkov's books are accidental travellers (*popadantsy*), usually middle-aged military men, finding themselves in an alternative universe where their luck and combat training exported from Earth raise them to the status of superheroes. In addition to experiences

²⁴ One could suggest, as one of the anonymous reviewers did, that, theoretically, ethnic or religious divisions can avoid being captured by our database as members of certain minorities can systematically abstain from using municipal libraries for language reasons or because libraries do not meet the demands of such audiences. While our data does not allow us to reject this claim, nothing of what we know of book circulation in Russia suggests that this is the case. In spite of being multi-ethnic and multi-confessional, there are hardly any segments of the population that are not fluent in Russian as Russian is the language of schooling and mass media; and while there are libraries serving audiences with special needs (e.g., offering books written in Braille) we have never heard of any alternative library systems serving minorities whose demands for fiction (in contrast to, say, religious literature) is not met by public libraries. Thus, in St Petersburg there are no special libraries or bookstores offering fiction books in Ukrainian, Belarusian or Tatar languages (the three largest minorities according to census data).

²⁵ This does not mean that literary tastes cannot give rise to subcultures with a sense of solidarity, the example here being fun fiction movement described by Samutina (2016). However, the size of such subcultures is tiny compared to any major social category; participation in them thus cannot be said to buttress any major societal divisions.

²⁶ Multiple observations can be cited as circumstantial evidence in favour of the existence of a correlation of brow-level with adherence to traditional demographic roles in Russia. Thus, to give only one example, in our survey (paragraph 2.1), subjects were asked to identify their attitudes towards 12 of the most popular writers representing our clusters. Liking Dontsova, Steel, Bushkov and Vishnevsky correlated positively with agreement that it "should be more important for a woman to fulfil her role as a wife and a mother than to make a career", while no similar correlation was present in the case of high-brow authors, and familiarity with high-brow authors were correlated negatively with adherence to gender roles.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

coloured by gender, stage in life cycle and occupational role, much of this kind of literature also reacts to generational experiences, for example, much of the accidental traveller literature work out the political trauma felt by many of middle-aged readers from the disintegration of the USSR. Given this, it is not surprising that their audiences are stratified along demographic lines. Both Dontsova's and Bushkov's protagonists are similar in their demographic attributes and social aspirations to the core representatives of their audiences. One may further speculate that high-brow taste in Russia is defined largely by denial of such wish-fulfilling usage (which those to whom we discussed the results of this study in Russia occasionally defined as "masturbatory"), while openness to them contributes to the stigmatisation of particular artistic productions in the eyes of high-brow audiences.

Overall, we can conclude that the "group" interpretation, having a wider currency in the literature, looks somewhat less plausible in light of our data, although the evidence is far from conclusive. More studies specifically designed to check expectations arising from "grid", "group" and "entertainment/transcendence" in different settings are necessary to reach a final verdict. Such studies should specifically address the issue of the (ir)relevance of religious, ethnic and political affiliations for audience formation.

They should also explore the possibility that art forms differ in their social usages. It may be, for example, that the relative importance of group and grid dimensions is different in the cases of art, literature or music (Purhonen et al., 2011; Warde and Gayo-Cal, 2009, p.120). One can speculate that music, the most thoroughly studied art form, may exhibit a different logic of audience formation as its consumption is often public, occurring during attending concert in physical co-presence of individuals sharing live experiences (Benzecry and Collins, 2014). It may be that it thus offers a much better resource for establishing group solidarity than literature, and musical tastes are more likely to exhibit group, rather than grid, logic.

As a final remark, irrespective of which interpretation of Peterson's model is the most accurate in explaining the demographic specificity of the audiences of low-brow authors, this specificity has consequences for these authors' potential as a communicative resource. The observation that segmentation of low-brow tastes may affect the potential of establishing social ties outside of one's immediate social circle was repeatedly made (Ericksson, 1997; Lizardo, 2006).

However, it can also affect even the strongest ties an individual has already established, reducing opportunities for socialising between genders and generations within households, neighbourhoods and workplaces.

References

1. Atkinson, W. (2011). The context and genesis of musical tastes: Omnivorousness debunked, Bourdieu buttressed. *Poetics*, 39(3), 169–186. doi: 10.1016/j.poetic.2011.03.002.
2. Bernstein, B. (1964). Elaborated and restricted codes—their social origins and some consequences. *American Anthropologist*, 66(6), 55-69.
3. Benzecry, C., & Collins, R. (2014). The high of cultural experience: Toward a microsociology of cultural consumption. *Sociological Theory*, 32(4), 307–326.
4. Bessudnov, A., Kurakin, D., & Malik, V. (2017). The Myth about Universal Higher Education: Russia in the International Context. *Educational Studies*, 3: 83-109
5. Blondel, V. D., Guillaume, J. L., Lambiotte, R., & Lefebvre, E. (2008). Fast unfolding of communities in large networks. *Journal of statistical mechanics: theory and experiment*, 2008(10), P10008.
6. Boyd, D & Crawford K. (2012). Critical questions for big data. *Information, Communication & Society*, 15(5), 37–41.
7. Bryson, B. (1996). Anything but heavy metal: Symbolic exclusion and musical dislikes. *American Sociological Review*, 61(5), 884–899. doi: 10.2307/2096459.
8. DiMaggio, P., & Mukhtar, T. (2004). Arts participation as cultural capital in the United States, 1982–2002: Signs of decline?. *Poetics*, 32(2), 169–94. doi: 10.1016/j.poetic.2004.02.005.
9. Douglas, M. (1996). *Thought styles: Critical essays on good taste*. London: Sage
10. Douglas, M. (1996 [1970]). *Natural symbols. Explorations in cosmology*. London: Routledge.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

11. Douglas, M. (2000) *A history of grid and group cultural theory*. Lecture transcript. University College London. Retrieved from <http://projects.chass.utoronto.ca/semiotics/cyber/douglas1.pdf>
12. Dubin B & Zorkaya, N. (2005) Knigi v segodniazhnej Rossii: vypusk, rasprostranenie, chtenie. [Books in present-day Russia: Publishing, distribution, reading]. *Vestnik obshchestvennogo mnenija. Dannye. Analiz. Diskussii, [Russian Public Opinion Herald]* (5), 39-57.
13. Erickson, B. H. (1996). Culture, class, and connections. *American Journal of Sociology*, 102(1), 217–251. doi: 10.1086/230912.
14. Falk, M., & Katz-Gerro, T. (2016). Cultural participation in Europe: Can we identify common determinants? *Journal of Cultural Economics*, 40(2), 127–62. doi:10.1007/s10824-015-9242-9.
15. Felski, R. (2011). *Uses of literature*. New York: John Wiley & Sons.
16. Goldberg, A., Hannan, M. T., & Kovács, B. (2016). What does it mean to span cultural boundaries? Variety and atypicality in cultural consumption. *American Sociological Review*, 81(2), 215-241.
17. Gudkov, L & Dubin B. (2005) Rossijskie biblioteki v sisteme reproduktivnykh institutov. Kontekst i perspektivy [Russian libraries in the system of reproductive institutions. Context and perspectives]. *Novoe literaturnoe obozrenie [New Literary Review]*, 74: 166-202
18. Holt, D. B. (1997). Distinction in America? Recovering Bourdieu's theory of tastes from its critics. *Poetics*, 25(2-3), 93–120. doi: 10.1016/s0304-422x(97)00010-7.
19. Holt, D. B. (1998) Does cultural capital structure American consumption? *Journal of Consumer Research*, 25(1), 1–25. doi: 10.1086/209523.
20. Ille, M.E. (2016). Uchestie zhitelej kulturnoj stolitsy v kulturnoj zhizni Peterburga.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

- [Participation of “cultural capital” inhabitants in Petersburg’s cultural life]. *Telescop: zhurnal sotsiologicheskikh i marketingovykh issledovanij*. [Telescope: A journal of sociological and market research], 5, 27–32.
21. Katz-Gerro, T. (2011). Cross-national consumption research: Inspirations and disillusion. *Kolner Zeitschrift Fur Soziologie Und Sozialpsychologie*, 63, 339–360.
22. Kharkhordin, O. (2009). *Druzhba: Issledovanie praktik* [Friendship: A study of practices]. St Petersburg: European University at St Petersburg Press.
23. Lahire, B. (2008). The individual and the mixing of genres: Cultural dissonance and self-distinction. *Poetics*, 36(2–3), 166–188. doi:10.1016/j.poetic.2008.02.001.
24. Leguina, A. (2015) Musical Distinctions in England – Understanding Cultural Homology and Omnivourism through a Methods Comparison. *BMS Bulletin of Sociological Methodology/ Bulletin de Methodologie Sociologique*, 126(1), 28–45
25. Lizardo, O. (2006) How cultural tastes shape personal networks. *American Sociological Review*, 71(5), 778–807.
26. Lizardo, O. (2014) Omnivorousness as the bridging of cultural holes: A measurement strategy. *Theory and Society*, 43(3-4), 395–419. doi: 10.1007/s11186-014-9220-9.
27. Lizardo, O., & Skiles S. (2012). Reconceptualizing and theorizing “omnivorousness”: Genetic and relational mechanisms. *Sociological Theory*, 30(4), 263–282. doi: 10.1177/0735275112466999.
28. Lizardo, O. & Skiles S. (2015) Musical taste and patterns of symbolic exclusion in the United States 1993-2012: Generational dynamics of differentiation and continuity. *Poetics*, 53, 9–21.
29. Lizardo, O. & Skiles, S. (2016). The end of symbolic exclusion? The rise of “categorical tolerance” in the musical tastes of Americans: 1993–2012. *Sociological Science*, 3, 85–108. DOI 10.15195/v3.a5

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

30. Lopez-Sintas, J., & Katz-Gerro, T. (2005). From exclusive to inclusive elitists and further: Twenty years of omnivorousness and cultural diversity in arts participation in the USA. *Poetics*, 33(5-6), 299–319.
31. Manovich, L. (2011). Trending: The promises and the challenges of big social data. *Debates in the Digital Humanities* 1–10. Retrieved from <http://manovich.net/index.php/projects/trending-the-promises-and-the-challenges-of-big-social-data> (7 Nov, 2017)
32. Millner, M. (2012). *Fever reading: affect and reading badly in the early American public sphere*. UPNE.
33. de Nooy, W. (2003) Fields and networks: correspondence analysis and social network analysis in the framework of field theory. *Poetics* 31(6): 305–327.
34. Ollivier, M. (2008) Modes of Openness to Cultural Diversity: Humanist, Populist, Practical, and Indifferent. *Poetics* 36(2-3):120-47. doi: 10.1016/j.poetic.2008.02.005.
35. Ovadenko, K. (2014) *Sovremennoe rossijskoe literaturnoe pole: struktura, bor'ba za definitsiju i pisatel'skie kar'ery*. [Contemporary Russian literary field: Structure, striggle for definitions, and authors' careers]]Unpublished MA dissertation. European University at St Petersburg.
36. Peterson, R. (1992). Understanding audience segmentation, from elite and mass to omnivore and univore. *Poetics*, 21(4), 243–258. doi: 10.1016/0304-422x(92)90008-q.
37. Peterson, R. (2005). Problems in comparative research: The example of omnivorousness. *Poetics*, 33(5-6), 257–282.
38. Prieur, A., Rosenlund L., & Skjott-Larse J. (2008). Cultural capital today—A case study from Denmark. *Poetics*, 36(1), 45-71.
39. Purhonen, S., Gronow, J., & Rahkonen, K. (2011). Highbrow culture in Finland: Knowledge, taste and participation. *Acta Sociologica*, 54, 385–402.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

40. Radway, J. A. (2009). *Reading the romance: Women, patriarchy, and popular literature*. Durham: University of North Carolina Press.
41. Roose, H., van Eijck K. & Lievens J (2012). Culture of distinction or culture of openness? Using a social space approach to analyze the social structuring of lifestyles. *Poetics*, 40(6), 491-513. doi: 10.1016/j.poetic.2012.08.001.
42. Rose, R. (2001). Getting things done in an anti-modern society: Social capital networks in Russia. In Dasgupta, P., & Serageldin, I. (Eds.). *Social capital: a multifaceted perspective*. World Bank Publications, 147–172.
43. Samutina, N. (2016). Emotional landscapes of reading: fan fiction in the context of contemporary reading practices. *International Journal of Cultural Studies*, 20(3), 253-269.
44. Savage, M. & Gayo, M. (2011) Unravelling the omnivore: A field analysis of contemporary musical taste in the United Kingdom. *Poetics* 39, (5), 337-357.
45. Sokolov, M (2018) Cultural capital and social revolution. Arts consumption in a major Russian city, 1991-2017. *Poetics* <https://doi.org/10.1016/j.poetic.2018.10.005>
46. Kazantsev A & Sokolov M. (2017) Типы опросов, выборочные смешения и эффекты квоты: Результаты эксперимента с трюхосновной выборкой в российском мегаполисе. [Survey types, sample biases, and the effects of demographic quotas. The results of an experiment with a three-frame survey in a major Russian city] *Jekonomicheskaja sociologija [Economic sociology]*, 18(5): 87-110.
47. Vlegels, J. & Lievens J. (2017). Music classification, genres, and taste patterns: A ground-up network analysis on the clustering of artist preferences. *Poetics*, 60, 76–89.
48. Warde, A., Wright D., & Gayo-Cal M. (2007). Understanding cultural omnivorousness: Or, the myth of the cultural omnivore. *Cultural Sociology*, 1(2), 143–164. doi:10.1177/1749975507078185.

DO LOW-BROW TASTES DEMONSTRATE STRONGER CATEGORICAL DIFFERENTIATION?

49. Warde, A. & Gayo-Cal M. (2009). The anatomy of cultural omnivorousness: The case of the United Kingdom. *Poetics*, 37(2), 119–145. doi: 10.1016/j.poetic.2008.12.001.
50. Warde, A. (2011). Cultural hostility re-considered. *Cultural Sociology*, 5(3), 341-366.
51. Zavisca J. (2005). The status of cultural omnivorism: A case study of reading in Russia. *Social Forces*, 84(2), 1233–1255.