Verbal Skills And Spanish Language Skills Of Students Graduating From High School In Mexico

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Resumen

Esta investigación tiene el propósito de proporcionar información sobre las habilidades verbales y el conocimiento de la lengua escrita que poseen los estudiantes que aspiran ingresar a las instituciones de educación superior en México. Mediante los resultados obtenidos en el Examen de Habilidades y Conocimientos Básicos (*EXHCOBA*) de los aspirantes a ingresar a cinco universidades públicas del país, en 2006 y 2007, se analizaron las puntuaciones relacionadas con 30 habilidades verbales y 15 de lenguaje escrito, de 28,925 estudiantes, el 30% del total de aspirantes evaluados en ambos años. Los resultados muestran que: 1) el nivel de habilidades lingüísticas de los estudiantes es muy semejante entre universidades y consistente a lo largo del tiempo, 2) los estudiantes no dominan una gran cantidad de habilidades que se debieron aprender en el nivel de educación básica.

Palabras clave:

- Evaluación del aprendizaje
- Habilidades verbales
- Lenguaje escrito
- Exámenes de admisión
- Educación superior
- EXHCOBA

Abstract

This paper is intended to provide information on the verbal and written language skills of students to be admitted into higher education institutions in Mexico. It uses information from students gathered through the Basic Knowledge and Skills Test (EXHCOBA), used as part of the admission process in five public universities, in 2006 and 2007. Scores from 30 verbal and 15 written language items were analyzed, from a sample of 28,925 students, which represented 30% of the whole population for both 2006 and 2007. Results show that: 1) among universities, the students language skills levels are very similar and consistent over time; 2) students have not acquired many of the skills that should have been learned at the basic education level.

Key words:

- Learning evaluation
- Verbal skills
- Written language
- Admission tests
- Higher education
- EXHCOBA

The use of language, both oral and written, is a fundamental human learning and knowledge-building tool since it involves using a multiplicity of higher mental abilities in coordination. The use of language is not only an indispensable skill for social interaction, but is a very powerful thinking tool, because it allows us to reflect on our experience, values and feelings, in order to be able to rebuild them, clarify them and make them more specific (Backhoff, Peón-Zapata, Andrade and Rivera, 2006).

The curricula of basic education in Mexico indicate that, among other academic objectives, students must develop skills and strategies to: 1) understand different types of texts, 2) critically evaluate what they read, 3) search, select, process and use information, 4) produce texts with different intents and purposes, 5) acquire notions of grammar, syntax and language use, spoken and written, and 6) understand the functioning and basic features of the writing system (SEP, 2006).

In short, the learnings expected to be acquired by students at the end of basic education can be classified into two major categories: 1) language skills and communication skills, and 2) knowledge on the structure and function of written language. In the first category we find the ability to understand written texts and find information, while the grammatical knowledge of written language is the second category.

For the foregoing reasons, virtually all university entrance exams seek to assess the proficiency students have in these two categories, for the ability to learn most of the contents taught at the higher education level largely depends on it. Based on this, the Test of Basic Knowledge and Skills (EXHCOBA, Examen de Habilidades y Conocimientos Básicos), which is an admission test that is now used in 18 public institutions in Mexico, classifies these skills into two sections: *verbal skills and knowledge of Spanish* (Backhoff and Tirado, 1992).

Although the entrance examinations to institutions of higher education can not be considered diagnostic tests that provide accurate information about the skills, knowledge and capabilities of students, so as to make an assessment of their skills to be able to remedy individual deficiencies, they may provide important information at the group level, regional or national, that may serve as "x-rays" on the type of skills and knowledge mastered by most students, as well as those which present greater difficulties for them, hence allowing the educational system to implement educational policies aimed at improving education in terms of the weaknesses identified at the institution, state or national level.

While in Mexico this practice is rare, in the United States several organizations regularly use the results of the Scholastic Aptitude Test exams (SAT) and American College Testing (ACT) for different purposes, among which are:

[1] In addition to these learnings, students are expected to develop the joy and love of reading.

- To carry out studies on the progress or longitudinal follow up of the us educational system, such as the National Survey of Student Engagement (http://nsse.iub.edu/).
- To conduct comparative studies of educational attainment among us states, such as those conducted by the Public Agenda organization (http://www.publicagenda.org).
- To provide information for students, schools and decision makers in a timely manner, as does the National Center of Higher Education Management Systems (http://www.higheredinfo.org).
- To develop us national educational indexes, with high levels of disaggregation, to assess the states and the country's educational levels, as those provided by the Educational Needs Index Project (http://educationalneedsindex.com).
- Furthermore, the results of entrance exams are the subject of multiple studies and research, among which are:
- To place students, during their first school year in basic, intermediate or advanced levels, according to their skills. This happens especially with mathematics courses (Foley-Peres and Poirier, 2008).
- To investigate the effects that factors such as the characteristics of schools, extracurricular activities, school achievement and student socioeconomic levels have on learning (Everson and Millsap, 2004).
- To study the relationship between students' personality and academic achievement (Noftle and Robins, 1993).
- Understanding the relationship between intelligence and performance in entrance examinations (Frey and Detterman, 2004).
- Estimating success in adult life (Cavanagh, 2007).
- Assessing the level of education standards or requirements established by the system as a whole (u.s. News & World Report, 1991).
- Knowing the effectiveness of teaching thinking skills in high school students (Worsham and Austin, 1983).
- To assess the influence of mathematics learning in chemistry (Spencer, 1996).
- To assess the influence of mathematics learning in art (Vaughn and Winner, 2000).

However, in the case of Mexico, the only use of the results of entrance exams is for selecting students. Perhaps one of the few exceptions are the works of Rageb Chain and colleagues at the University of Veracruz, who developed computer applications for higher education institutions to analyze the data from the tests applied by the Centro Nacional para la Evaluación de la Educación Superior (CENEVAL) (Chain, Cross, Martínez and Jácome, 2002).

Therefore, with the intention of showing that entrance examination results can be used in Mexico, the purpose of this study was to determine the language skills level of students completing high school and wishing to enter the higher education level, in order to identify areas of weakness and make proposals for educational policy. The study was conducted, using the available database of the EXHCOBA test results in five public universities in Mexico.

Method

This paper's methodology is descriptive and retrospective, as it was mainly based on the analysis of the databases containing the EXHCOBA results from five state public universities, for the admissions processes for the years 2006 and 2007. In alphabetical order these universities are: Universidad Autónoma de Baja California (UABC), Universidad Autónoma de Nayarit (UAN), Universidad Autónoma de Querétaro (UAQ), Universidad de Guanajuato (UG) and the Universidad de Sonora (UNISON). In total, we analyzed the scores in the areas of verbal skills and Spanish of 28,925 applicants looking to enter these five institutions. The analysis consisted primarily in comparing the percentage of correct answers of students in the areas of interest, both aggregate and disaggregated, with three main purposes: 1) to understand the differences in the levels of verbal skills and knowledge of written language of students between the institutions, 2) to determine the consistency of results over time, and 3) to identify the type of language skills in which Mexican students show less competence, in order to formulate education policy recommendations.

Characteristics of the EXHCOBA TEST

This test was developed two decades ago with the intent that higher education institutions could have a reliable admission test, valid and standardized for the Mexican student population (Backhoff and Tirado, 1993; Backhoff, Ibarra and Rosas, 1995). In 1995, the EXHCOBA became a computerized test that is currently used in 18 educational institutions in the country, about 125,000 students are assessed annually with this test during their admission procedures.

The exam is divided into three sections: Basic skills, basic knowledge and basic specialized knowledge these contents correspond to elementary and secondary education. The first section evaluates Verbal skills (30 questions) and Quantitative skills (30), the second examines basic knowledge of Spanish (15), Mathematics (15), Natural (20) and Social (20) Sciences; the third section depends on the program the applicant wishes to enter, three subjects of the following curriculum content are evaluated (with 20 items each): Physics, Chemistry, Economics-Business, Statistics, Calculus, Humanities, Social Sciences Biology and Language. In total, the test contains 310 items, of which the candidate must answer 190 reagents. The test has seven different versions, i.e. for each of the 310 specific thematic contents (also called nodes), there are seven similar or equivalent items which can be evaluated irrespectively, which makes a total of 2,170 items (for more information on the structure and contents of EXHCOBA see the website, in Spanish (http://iide.ens.uabc.mx/blogs/EXHCOBA/).

This test is very well documented and has been the subject of numerous studies showing that its psychometric properties –predictive validity, reliability, discrimination, difficulty and behavior of distractions– are acceptable (see e.g. Backhoff and Tirado, 1993, Tirado and Backhoff, 1995; Tirado, Backhoff and Larrazolo, 2009; Backhoff Larrazolo and Rosas, 2000). It has also been the subject of two doctoral dissertations that provide evidence of content validity and construct (see e.g. Backhoff, 2003, Gonzalez-Montesinos, 2004).

Knowledge and skills tested

Of the total contents EXHCOBA evaluates, this paper discusses only those related to two of its thematic areas: *verbal skills and Spanish*, taught at the levels of primary and junior high school, respectively.

Table 1 lists the 30 specific contents (nodes) that are evaluated in the area of verbal skills, while Table 2 shows the 15 nodes of knowledge on Spanish. These contents are grouped into sub-areas, which define the skills and knowledge being assessed. It is noteworthy that we only provide the names of the contents evaluated and a brief description of the thematic groups where they are contained, with the aim of preserving test security.

Application of the EXHCOBA test

Like any admission and high stakes test, EXHCOBA's application takes place under strict security and control standards. In addition, due to its computerized character, the test is administered in computer labs where each student answers a personalized version. That is, when the student enters the Computerized Exams System (SICODEX), the system will generate a customized test version, which combines the seven versions of questions, changes their order and reorders the response options for each of the 190 reagents that the student must answer. However, for research purposes, as in this case, some students respond to the same versions of EXHCOBA, so that their responses can be compared.

Student population

Table 3 shows the distribution of applicants who responded to the EXHCOBA in five universities (the names of which are withheld for confidentiality) in the years 2006 and 2007. A total of 94,400 students were evaluated, of which we analyzed the results of 28,925 of those who responded to any of the three versions of the test used in this study. It is important to note that the number of students is 30% of the total population evaluated in the five institutions, the sample was randomly selected.

Table 1
EXCHOBA test Verbal skills content area

EXCHOBA *test Verbal skills content area*	
Areas	**Nodes (contents)**
Understanding of words (vocabulary). Ability to use and understand the terms and concepts used in elementary school textbooks.	• Antonyms • Extension of the concept • Word interpretation
Understanding sentences. Ability to understand a sentence (sentence or proposition) its PLAIN and SUBVERT meaning, its opposite meaning, as well as the meaning of some proverbs	• Literal Meaning • Figurative Meaning • Opposite meaning • Proverb
Understanding paragraphs. Ability to understand in a short paragraph, the main idea, the literal information, as well as subvert information and make inferences.	• Main Idea • Specific information • SUBVERT information • Inferences
Grammatical use of sentences. Ability to recognize and compose grammatically correct, incomplete, inaccurate sentences, change the sense of the sentence, turn affirmative into negative sentences and vice-versa of statements; and use basic punctuation (commas and periods) correctly**.**	• Incomplete sentences • Inaccurate sentences • Change the sense • Negative/affirmative sentences • Punctuation
Grammatical use of paragraphs. Ability to recognize and form grammatically correct paragraphs (replace incorrect words in a paragraph, select the parts of a paragraph that need to be changed, to use similar or analogous concepts, and to recognize false propositions in a text and related concepts).	• Incorrect words • Incorrect sentences • Similar concepts (categorization) • Analogies • True/false propositions • Related Concepts
Reasoning with paragraphs. Ability to understand the meaning of complex paragraphs (syllogisms, abstraction of concepts and infer logical deductions).	• Syllogisms • Abstraction of concepts (conceptual associations) • Non literal deductions • Difficult sentences • Logical associations
Using dictionaries and encyclopedias. Ability to look up words and subjects in the dictionary and encyclopedia.	• Dictionary • Encyclopedia • Reason of things

Source: Backhoff, 2003.

Table 2
EXHCOBA Spanish content area

EXHCOBA *Spanish content area*	
Areas	**Nodes (content)**
Reading comprehension. Ability to understand the reading of a text: main idea, non-literal information and inferences.	• Main Idea • Interpretation/idea • Inference
Grammar. Ability to correctly use accents, gender, number and tense of the verb, as well as words and sentences in isolation.	• Accentuation • Gender/number • Tense/verb • Antonyms/sentences
Syntax Identification of SIMPLE and COMPLEX sentences, direct object, indirect object or circumstantial, nuclei of subjects, predicates and compliments.	• Sentences • Indirect object • Nucleus/subject • Nucleus/predicate • Complement/predicate
Literature. Knowledge of the concept of literary piece, universal and Mexican literatures..	• Literary piece • Universal Literature • Mexican Literature

Source: Backhoff, 2003.

Results

The first question we set out to answer is on the possible differences in students' language skills for the five universities. To answer this question Table 4 shows the number of correct answers and their respective standard deviations for the five universities in the two years analyzed. It is important to bear in mind that the number of questions (k) in the area of verbal skills is 30, while in Spanish it is 15.

It can be observed that the standard deviations and the mean values of correct answers from one year to the next are equal. The biggest differences between the mean scores range from 18.2 and 21.4 in verbal skills, and between 8.2 and 10 for Spanish. It is important to note that the lowest scores are found in the same class (University B, 2007), as well as the highest (University D, 2006), so part of this variance could be due to class factors. Also in Table 4, it can be seen that confidence intervals of the mean estimates correspond to a level of 95 percent. This information indicates that the EXHCOBA is a very stable instrument, very similar and consistent results were obtained for the five Mexican universities in the two years studied.

Here we can see that the average correct answers for the first case is between 18.2 and 21.3, and the second between 8.2 and 10. It can also be seen that the scores from one year to the next are practically the same, as well as their standard deviations. This information tells us that the EXHCOBA produces very similar and consistent results between different Mexican universities.

Table 3
Number of applicants who responded to the EXHCOBA in five Mexican universities: 2006 and 2007.

Number of applicants who responded to the EXHCOBA in five Mexican universities: 2006 y 2007						
Institutions	Total of students tested			Students that responded to versions 2, 3 and 4		
	2006	2007	Total	2006	2007	Total
University A	19,535	19,954	39,489	5,861	5,986	11,847
University B	5,621	6,367	11,988	1,683	1,915	3,598
University C	8,263	7,791	16,054	2,488	2,297	4,785
University D	3,260	7,124	10,384	1,005	2,191	3,196
University E	8,332	10,153	18,485	2,490	3,009	5,499
Total	**45,011**	**51,389**	**96,400**	**13,527**	**15,398**	**28,925**

Source: Information of its own.

Table 4
Correct answer mean, standard deviations and confidence intervals in the EXHCOBA by subject area (verbal skills and Spanish) in five Mexican universities: 2006-2007

Correct answer mean, standard deviations and confidence intervals in the EXHCOBA by subject area								
	Year	N	Verbal Skills (k=30)			Spanish (k=15)		
			Mean	SD	Confidence Interval	Mean	SD	Confidence Interval
University A	2006	5861	19.5	4.3	(19.4 - 19.6)	8.8	2.5	(8.7 - 8.9)
	2007	5986	19.5	4.3	(19.4 - 19.6)	8.8	2.5	(8.7 - 8.9)
University B	2006	1683	18.6	4.7	(18.3 - 18.8)	8.4	2.6	(8.3 - 8.5)
	2007	1915	18.2	4.6	(18.0 - 18.3)	8.2	2.5	(8.2 - 8.4)
University C	2006	2488	20.7	4.1	(20.6 - 20.9)	9.6	2.6	(9.5 - 9.6)
	2007	2297	20.8	4.1	(20.6 - 21.0)	9.5	2.6	(9.4 - 9.6)
University D	2006	1005	21.4	4.1	(21.1 - 21.6)	10.0	2.5	(9.8 - 10.1)
	2007	2191	20.3	4.4	(20.2 - 20.5)	9.6	2.6	(9.5 - 9.7)
University E	2006	2490	19.2	4.7	(19.0 - 19.4)	8.8	2.6	(8.7 - 8.9)
	2007	3009	19.0	4.7	(18.9 - 19.2)	8.5	2.6	(8.4 - 8.6)

Where the confidence interval = 95%
Source: Information of its own.

A second question we set out to answer is related to the equivalence of the three versions of the EXHCOBA at the five institutions in the two years evaluated. Table 5 shows the percentage of correct answers by students in each version of the exam. Additionally, Figures 1 and 2 present the same information, but only for the year 2007 with the aim of graphically showing the behavior of the three versions of the exam in each institution.

Making a broad analysis of the two following figures we can see that the EXHCOBA results for the five universities are very similar, with slight differences. The range of average scores for the five institutions in the three versions of verbal skills ranges between 60% and 70% of correct answers. For its part, Spanish average scores vary between 53% and 65% of correct responses.

A third question that we set out to answer is on the differences and similarities between the five universities compared to each other and by each of the topics evaluated in the EXHCOBA , which are briefly described in Tables 1 and 2 of this study. Tables 6 and 7 show the average percentages of correct answers obtained by the five universities for each of the skills and knowledge assessed. Table 6, shows that on average, students from the five universities responded correctly to 67.1% of the questions in verbal skills.

In order to facilitate the interpretation of this information Figures 3 and 4 graphically show the same information contained in the tables above. These two graphs show great similarities in the percentage of correct answers obtained by students from the five universities in the 30 verbal skills and 15 knowledge of Spanish items assessed. Therefore a common profile of linguistic competences can be distinguished in the universe of students who participated in this study, regardless of the institution.

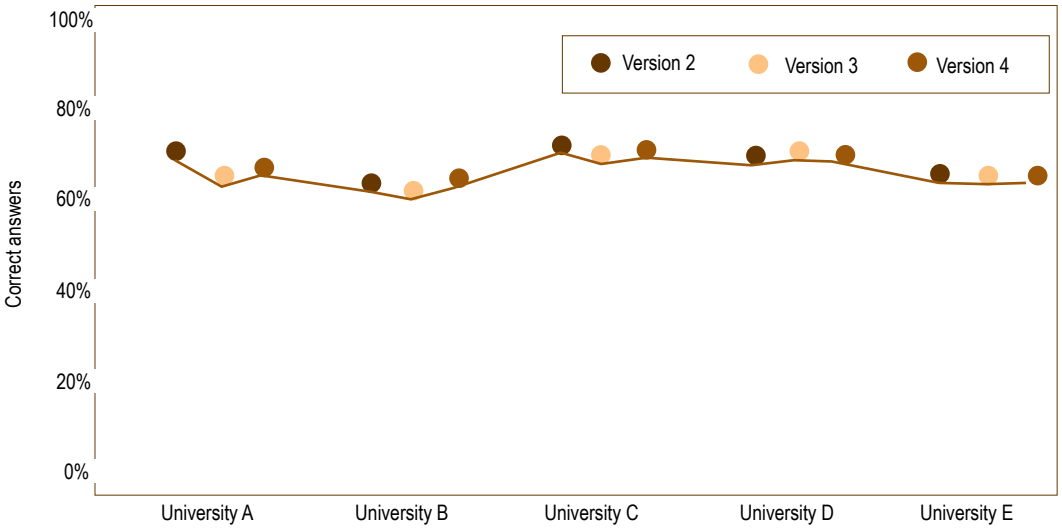
This profile can detect the skills and knowledge that students who graduate from high school grasp, and those skills that only a minority dominate. In the case of the verbal skills, which should be acquired in elementary

Table 5
Correct answer percentage in three versions of the EXHCOBA by subject area, institution and year.

Correct answer percentage in three versions of the exhcoba by subject area, institution and year.										
Institution	Year	N=			*Verbal skills* (k=30)			*Spanish* (k=15)		
		V.2	V.3	V.4	V.2	V.3	V.4	V.2	V.3	V.4
University A	2006	1951	1945	1965	67	64	65	61	57	60
	2007	1999	1995	1992	68	64	65	64	57	60
University B	2006	564	555	564	65	64	63	66	58	58
	2007	643	639	633	64	60	62	65	53	56
University C	2006	831	836	821	76	74	76	66	63	63
	2007	761	779	757	70	68	69	65	64	61
University D	2006	339	334	332	70	72	71	68	69	63
	2007	742	722	727	67	69	68	65	65	62
University E	2006	864	800	826	65	64	64	61	57	59
	2007	1020	1027	962	64	63	63	60	54	57

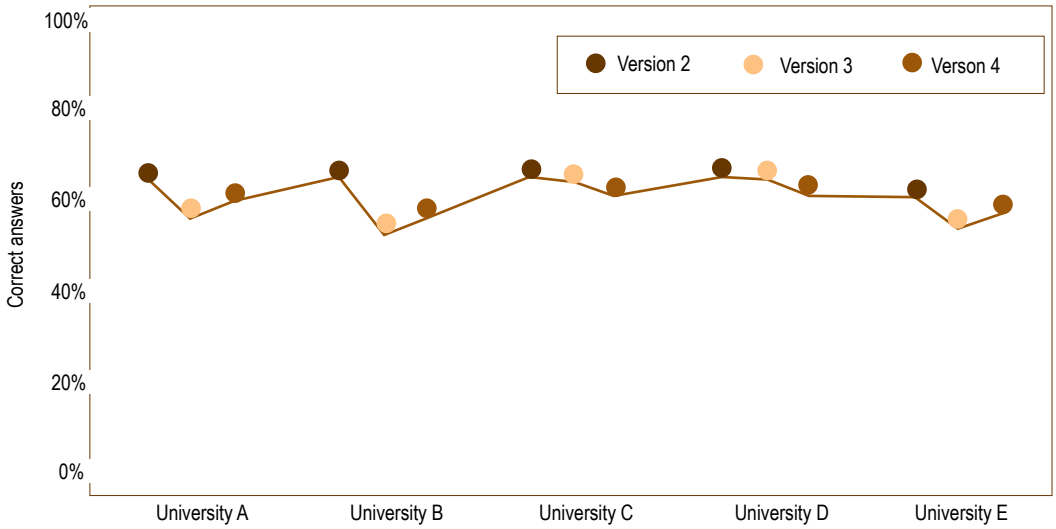
WHERE V = EXHCOBA VERSION
Source: Information of its own.

Figure 1 Correct answer percentage in the area of Verbal skills in three versions of the EXHCOBA by institution: 2007.



Source: Information of its own.

Figure 2 Correct answer percentage in the area of Spanish in three versions of the EXHCOBA by institution: 2007



Source: Information of its own.

education, that on average, only a very small percentage of students are able to master, these include: extension of a concept (29.2%), understanding of incomplete sentences (37.4 %), literal meaning (40.2%), logical associations (43.2%) and the identification of incorrect words (48%).

The results in Table 7 show that on average students from the five universities obtained 63.8% of correct answers in the area of knowledge of Spanish. In particular, low scores are seen in the following skills: ability to complement a predicate (32.8% correct), basic knowledge of Mexican literature (39.4%), indirect object recognition in a sentence (39.6%) and the understanding of antonyms that reverse the meaning of a sentence (49.2%). Again this knowledge set, from the junior high school level, shows that students who graduate from high school present different difficulties in relation to their command of written language.

Finally, the last question we set out to answer had to do with the stability of the collected data. That is, we wanted to know if the skills of the students could change considerably over time, if this was the case, our diagnosis would be ephemeral and would have little value, since the performance of students changes from year to year. By contrast, if the language skills of students completing high school were stable over time, the results presented here would have greater relevance to educational decision-making aimed at improving Mexican students' learning.

With this end in mind we analyzed the behavior of data in the two consecutive years (2006 and 2007). We chose University A version 2 and the EXHCOBA area of verbal skills. Figure 5 presents the results of this analysis, which shows the percentages of the responses of the two year cohorts of students in each of the 30 nodes in the section under review, ordered from the least to the most difficult. The behavior of the two groups of students is virtually identical, which shows that the type of academic skills that students acquire during their schooling, are stable over time and do not change from one year to the next.

Conclusion

This study was undertaken to investigate the verbal skills and knowledge of Spanish that students graduating from high school that wish to continue with their university studies grasp. To this end we analyzed the results of students in two thematic areas of the EXHCOBA test, Spanish and verbal skills, which are assessed through 45 multiple choice questions administered by a computer. 28,925 students took part in this study, who responded to three versions of the entrance examination in 2006 and 2007, which represents 30% of all applicants wishing to enter five public universities in Mexico. This sample was selected randomly, thus it is representative of the total population.

The results show that the EXHCOBA is reliable, because the results are very consistent among institutions from year to year. With minor differences, the overall

Table 6
Percentage of correct answers on verbal skills reagents for version 2 of the EXH-COBA in the five institutions: 2007

Verbal skills reagents for version 2 of the del EXHCOBA						
Nodos	**Univ. A**	**Univ. B**	**Univ. C**	**Univ. D**	**Univ. E**	**Average**
Antonyms	61	58	59	58	61	59.4
Extension of the concept	29	27	34	27	29	29.2
Interpreting Words	63	63	65	67	62	64.0
Literal Meaning	37	38	44	47	35	40.2
Non literal meaning	65	60	76	58	62	64.2
Opposite meaning	90	89	94	92	90	91.0
Sayings	84	85	78	80	77	80.8
Main Idea	80	83	89	85	82	83.8
Specific information	82	76	86	79	78	80.2
Non-literal information	73	69	73	69	69	70.6
Inferences	63	60	65	65	63	63.2
Incomplete sentences	39	28	47	40	33	37.4
Inaccurate sentences	89	86	86	86	87	86.8
Changing the sense	65	67	79	69	61	68.2
Sentence negation/affirmation	46	46	54	46	49	48.2
Punctuation	87	86	87	83	83	85.2
Incorrect words	51	44	52	47	46	48.0
Incorrect sentences	85	81	78	78	80	80.4
Similar concepts	89	83	95	94	85	89.2
Analogies	83	87	82	83	81	83.2
True/False Propositions	73	72	75	79	73	74.4
Relative concepts	71	66	76	72	66	70.2
Syllogisms	68	64	70	69	68	67.8
Abstraction of concepts	67	64	81	74	63	69.8
Deductions not literal	72	73	73	71	71	72.0
Difficult sentences	73	64	77	74	70	71.6
Logical associations	47	39	43	44	43	43.2
Dictionary	51	49	57	52	48	51.4
Encyclopedia	83	82	86	79	79	81.8
Reason of things	66	64	52	46	65	58.6
Average	67.7	65.1	70.4	67.1	65.3	67.1

Source: Information of its own.

scores for verbal skills and knowledge of Spanish are very similar, both aggregated and disaggregated, including each of the 45 skills that make up these two areas of the test.

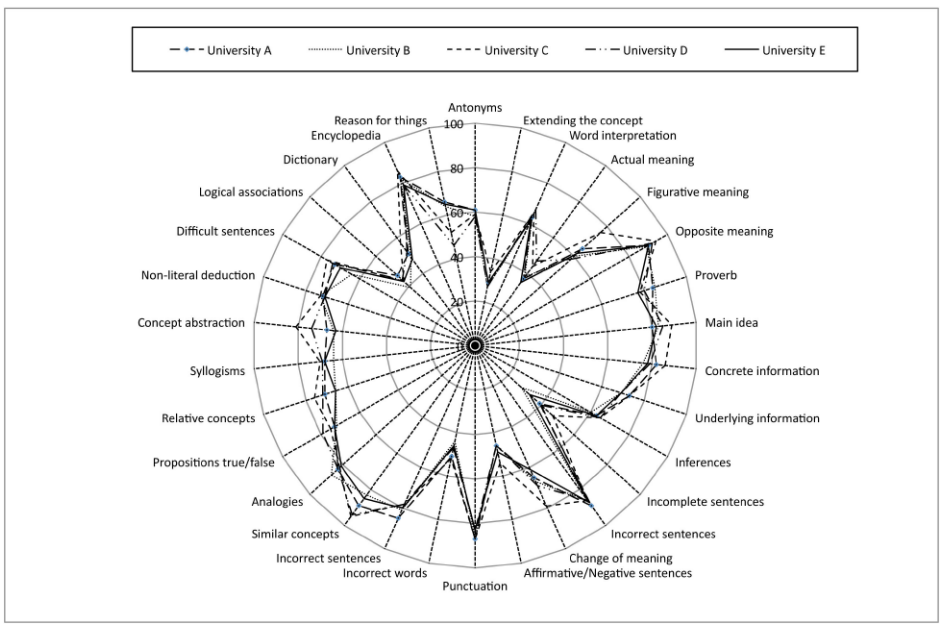
This provides elements to affirm that the level of language skills acquired by students during basic education and high school, is very similar, not only among the five institutions assessed, but among the states where the test was applied: Baja California, Guanajuato, Sonora, Queretaro and Nayarit. This statement is based on the fact that the five pubic universities largely cater to the educational demand of their own state.

Considering the few differences in the linguistic profile of the students in these five states, we would not be surprised if they resemble other states of the country, with some specific differences.

On the other hand, the results show that a great proportion of students aspiring to enter the higher education level show significant deficiencies in their knowledge of verbal and written language, as what the EXHCOBA evaluates are the essential learnings taught in basic education (Backhoff and Tirado, 1992). Therefore, it is anticipated that many of these students would have trouble finishing college, since most of their learning is mediated by the use of language as well, it is evaluated through written language (Luria, 1981).

These results coincide with those reported in educational evaluations such as the International Student Assessment, PISA (OECD, 2003, 2006, 2009) and the National Institute for Educational Assessment INEE (Backhoff, Andrade, Sanchez,

Figure 3 **Percentage of correct answers in verbal skills reagents of version 2 of the EXHCOBA at the five institutions: 2007**



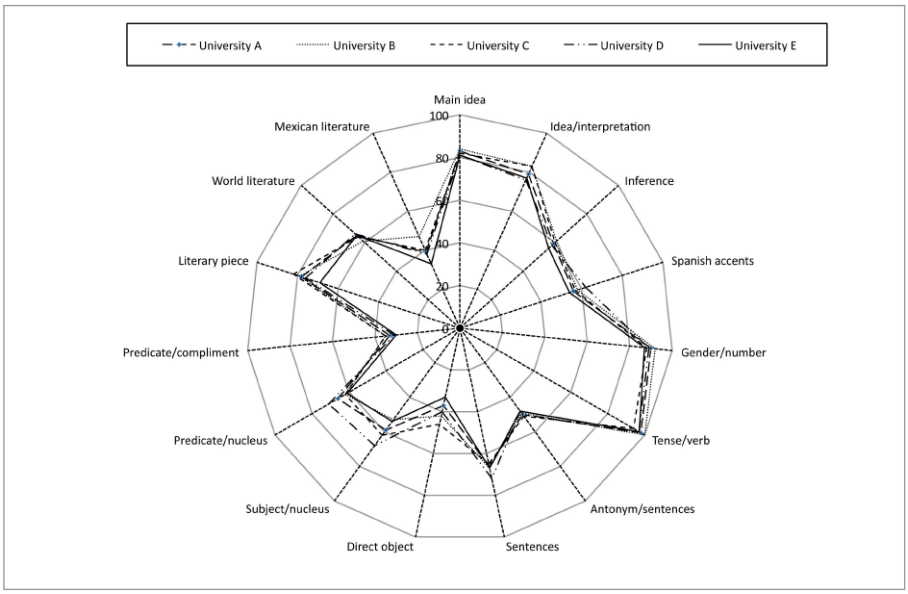
Source: Information of its own.

Table 7
Percentage of correct answers in *verbal skills* reagents for version 2 of the EXHCOBA in the five institutions: 2007.

Verbal skills reagents for version 2 of the EXHCOBA						
Nodos	**Univ. A**	**Univ. B**	**Univ. C**	**Univ. D**	**Univ. E**	**Average**
Main Idea	83	84	82	81	81	82.2
Interpretation/idea	79	83	83	76	77	79.6
Inference	59	61	60	58	56	58.8
Spanish accent usage	56	58	57	62	54	57.4
Gender/Number	90	92	88	89	87	89.2
Tense/verb	98	100	94	97	97	97.2
Antonyms/sentences	50	49	51	48	48	49.2
Sentences	66	67	65	72	67	67.4
Indirect object	37	42	46	40	33	39.6
Nucleus/subject	59	53	62	68	54	59.2
Nucleus/predicate	66	62	62	71	61	64.4
Complement/predicate	33	35	35	31	30	32.8
Literary piece	78	79	82	76	69	76.8
Universal Literature	65	61	64	66	65	64.2
Mexican Literature	39	47	40	38	33	39.4
Average	63.9	64.9	64.7	64.9	60.8	63.8

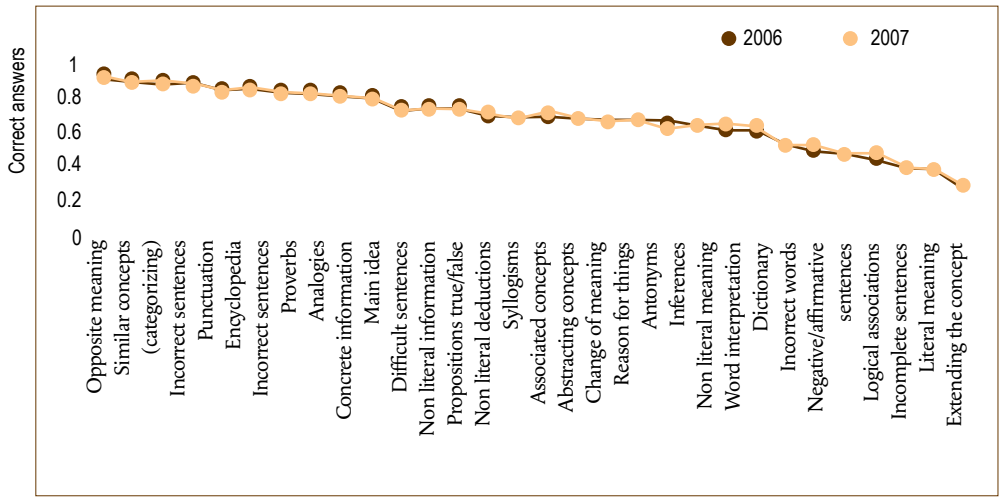
Source: Information of its own.

Figure 4
Percentage of correct answers for Spanish reagents in version 2 of the EXHCOBA in the five institutions: 2007



Source: Information of its own.

Figure 5 Percentage of correct answers in the verbal skills section of the EXHCOBA (v.2) for the two consecutive years at University A.



Source: Information of its own.

Pawn and Bouzas, 2006 , Sanchez and Andrade, 2009), with respect to low literacy levels in Mexican 15 year old students who graduate from junior high school.

Furthermore, this study allows us to know the type of language skills that a significant proportion of students do not grasp, and as such the kind of difficulties they may encounter during college could be anticipated. For example, OECD (2006) research highlights that a fifth of 15 year old Mexican students are not able to read independently, as a tool to help them acquire knowledge and skills in other areas. For its part, INEE's last junior high school report (Sanchez and Andrade, 2009) shows that less than 30% of young people completing this level can use quotation marks properly and are able to determine the role of a subordinate clause in context; and only 15% manage to write a short text with correct spelling.

In the same vein, the EXHCOBA results indicate that students seeking to enter university dominate between 60% and 70% of the language skills acquired in elementary school, and between 53% and 65% of basic knowledge of Spanish language taught in junior high school. More specifically, the results of this test indicate that more than half of these students lack the ability to use and understand the terms and concepts used in elementary textbooks, as well as the ability to understand the literal meaning of a sentence, and the ability to draw logical deductions from complex paragraphs. As for the basic knowledge of Spanish, only four in ten students are able to identify the complement of the predicate of a sentence, less than 45% can identify the indirect object in a sentence, and about half are unable to identify antonyms and synonyms in a clause.

In conclusion, the findings reported in this paper allow us to confirm that the results of large-scale tests, which are used in the process of admission to higher education, may yield additional information beyond the simple screening of stu-

dents, which is necessary for selecting them. These results can be analyzed with very different purposes, as is often done in the US and only incipiently in Mexico.

Among the different purposes, it seems central to understand that the language (and mathematical) tools students possess will affect whether or not they are able to meet the learning challenges they may encounter in their university studies (Zwick and Sklar, 2005). For educational institutions this information may be of the utmost importance because based on this they may design programs to enhance the verbal skills of students and thus increase their probabilities of academic success.

Finally, the information from admissions tests, such as the EXHCOBA should also be useful for the entire education system, especially at the state level, as it would serve as an assessment on the effectiveness of language teaching, which may detect defective acquisition of verbal skills by students and, therefore, be strengthened from a pedagogical perspective.

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