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## A study of the uniformity of the USALI methodology in Spain and Catalonia

### Abstract

To be competitive, the hotel industry must face several challenges in the daily business. The Uniform System of Accounts for the Lodging Industry (USALI) is one of the fundamental tools that helps hotel managers to benchmark financial data, monitor the progress of their business and identify revenue opportunities. The purpose of this study is to test the homogeneity of the practical implementation of USALI through an analysis of a series of operations in the hotel business. USALI aims to establish an internal process for determining and providing results for the totality of hotels in a homogenous way. This system, introduced for the first time in 1926 in the United States, is a key reference and an essential tool used by professionals in management accounting for measuring the efficiency of the hotel operations. Its homogeneity has been tested through two studies that were carried out with the purpose of confirming this statement; one, that was developed for hotel chains in Spain and, another group corresponding to hotels established in Catalonia. The results of this research show a significant heterogeneity in the implementation of USALI.

**Key words:** USALI; management accounting; key performance indicators; hospitality management; uniform systems of accounts ; Spain; Catalonia

### Introduction and objectives

In the Anglo-Saxon countries, there are usually professional bodies responsible for issuing the generally accepted accounting principles (GAAP). For example, in the United States, most of the economic sectors have plans of sectorial accounts, named Uniform Systems that are issued by professional organizations and updated regularly with the advice of experts. These manuals consider detailed information for all matters related to calculations of internal results, classification and cost assignment, criteria for the distribution of indirect costs, allocation of the same products and/or services, as well as recommendations about management information.

Nowadays, there exist several uniform systems in the tourism and hospitality sector, including the hotel business, restaurants or clubs, for instance. Basically, the Uniform System of Accounts for the Lodging Industry, USALI (American Hotel & Motel Association, 2014), aspires to establish an internal process for determining results that are formalized in an overall income statement and a series of complementary analytical documents that allow the calculation of results for each of the centers where operational activities are developed, in other words, that are generating revenues.

Therefore, the usefulness of the Uniform Systems of Accounts in the field of management accounting is relevant as a support to the decision-making process, especially to the extent that the concept,

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uniform, is applied in a homogenous way. Therefore, the main purpose of this study is to analyze the mentioned uniformity in the moment of applying USALI in the hotel sector. Therefore, we decided to compare two complementary works related to this topic; one about the hotel chains established in Spain and another one about hotels operating in Catalonia.

The work is structured into different sections. First, USALI is analyzed in detail and its advantages and disadvantages are exposed. Afterwards, a conducted literature review is described to see the existence, in this case the lack of existence, of similar studies about the implementation of USALI. The third section describes the objectives and the method that has been applied for the development of this paper, while the fourth section shows the results drawn from this research. The last section includes the conclusions and future research lines that emerge from this study.

## The uniform system of accounts for the lodging industry (USALI)

USALI pursues, according to their own statement (American Hotel & Motel Association, 2014), two objectives. Firstly, to provide an accounting model that can be adapted easily by any hotel regardless of size and category, and, that is at the same time useful for any type of users, both internal and external. Secondly, being a uniform and standardized model, to give the possibility of comparing between different hotels and hotel chains, even if they perform with another operating system or if they are established in different countries. It is also important to mention that several improvements and updates have been carried out with the eleventh revised edition of USALI (2014). For instance, changes for the operating departments with a more detailed room revenue reporting, recorded resort fees and surcharges, changes in the food and beverage department, between others. The main changes, having an impact on the financial statements of lodging properties, are the replacement of the concept "net operating income", by "earnings before interest taxes depreciation and amortizations, EBITDA".

Therefore, regardless of the general ledger system (external) that different hotels are using, the hotel managers turn this methodology over to a system of management accounting, preferably USALI. The USALI methodology has attracted scholarly attention with many researchers identifying, both, advantages and disadvantages of this system (AECA, 2005; Amat & Campa-Planas, 2011; Janković, Peršić & Zanini-Gavranić, 2012; Moreno & Martín, 2002; Peršić, Janković & Poldrugovac, 2012a; Peršić, Janković & Poldrugovac, 2012b; Schmidgall, 1998; Tsai, 2010; Turkel, 1999; Vacas, 1999, 2000).

As a time-tested system established in 1926, it has been continually revised and upgraded by accountants from all over the world. Firstly, USALI is designed for hotels regardless of their size and organization structure. Smaller hotels simply ignore multiple detailed information that is collected for large hotels. Secondly, by providing detailed information on performance of various departments and each departments' contribution to the overall hotel performance, it facilitates management responsibility and promotes competition between different departments within a hotel or, in the case of a hotel chain, between the same departments in different hotels, contributing to the profitability. Thirdly, it minimizes the effect of different accounting and reporting practices in different countries and it is independent of local fiscal norms, what is especially important for hotel chains operating in many countries. Fourthly, it is independent from the operating system used by hotels. However, USALI has several shortcomings. It does not enable the income from a commercial package to be allocated to the hotel departments. For example, when there is a conference, it is not possible to attribute the part of the income to rooms, food and beverages, conference facilities rentals or similar. At the same time, too

detailed analysis of performance by departments ignores the hotel as a whole. The system is also not coping with the emerging trends such as the tendency of hotel chains to centralize all possible activities and thus limiting the role of each hotel manager. While the system is difficult to apply for small hotels with insufficiently differentiated department structures to classify expenses/costs, the results of profit centers do not derive a comprehension contribution analysis as some costs cannot be allocated to profit centers and remain undistributed operated expenses. Finally, the system enables department managers to work on improving the department results, while ignoring the overall hotel performance.

Finally, it should be noted, the limitation that represents the application of the direct costing system for the decision making, on which USALI is based (Turlkel, 1999). This distortion comes from the lack of consideration of the profitability of any business line, or of an operating department. On one hand, the system does not include undistributed expenses, such as administrative, general, commercial and maintenance, etc.; on the other hand, the expenses that are not included in the Gross Operating Profit (GOP), such as insurance, taxes, depreciation, among others. The inclusion of such expenses in the analysis of each hotel business segment (each department) could lead to different decisions, which could even drive to the closure of some part of the business.

### Description of the income statement model according to USALI

The performance of the model is based on the premise that the hotel activity is characterized by the whole provision of several clearly differentiated services, which contribute individually to the profitability of the hotel.

USALI follows the North American structure of the income statement, opposite the British model and the conventional model, as shown in Figure 1. The fundamental difference is given by the previously mentioned imputation per departments.

Figure 1  
Different models for the presentation of income statements

Conventional model	North american model	British model
Incomes - Cost of sales	Departmental incomes - Direct operational cost	Direct incomes - Cost of sales
Gross margin - Indirect cost	Operating margin - Indirect cost	Gross margin - Direct labor cost
Net profit	Net profit	Net margin - Allocated expenses
		Profit operational departmental + Other incomes
		Operational profit hotel - Indirect costs
		Net profit

Source: Serra & Flayih (1994).

The overall calculation process is carried out in a stepwise manner, calculating intermediate results, the first being obtained in each of the operational activities. Each of these areas constitute a center of benefits that enjoy a high independence in terms of control and decision-making and form the basis of the model.

The system classifies the costs in direct and indirect in relation to each of the responsibility centers, existing two types of centers, or departments in its own terminology. On one hand, direct operating

departments that provide services related to the hotel business activity and whose services are billed to the customers. And, on the other hand, indirect operating departments that correspond to those departments that do not generate any income, or at least it is not their main activity. So, they provide services related to the activity but they are not billed to the customers. USALI does not distribute these indirect operating costs; in most of the cases the distribution would be arbitrary and conventional and, therefore, scarcely relevant for the purposes of analysis. Thus, as shown in Figure 2, we obtain the following result on structure by department.

Figure 2  
**Basic analytical statement structure per departments according to USALI**

Net income of the department - Cost of sales
Gross margin of department - Personnel expenses - Other direct expenses
Operating income of the department

Each of these activities behave like a profit center where the income of the activity and the direct costs of the same are gathered. Therefore, the operating analysis of each of the centers is carried out only in terms of the margin on direct costs.

When using a direct cost system or direct costing for calculating the cost of a product or service, only those costs that are directly assignable (with an objective criteria) to the corresponding product or service are considered. That means that it is possible to obtain the income statement for each of the hotel's revenue generation lines. This is very useful for analyzing the contribution margin (sales less direct costs) generated by each line of activity. Finally, expenses that are not attributable to any of the departments are considered such as revenues and expenses for rents, taxes, financial expenses, depreciations and other business expenses; those are allocated globally to the income statement. Consequently, the final result will be obtained as shown in Figure 3.

Figure 3  
**Final results according to USALI**

Result direct operating departments - Result indirect operating departments
Gross operating profit (GOP) - Not assignable results
Net profit

Therefore, there is a specific breakdown on the hotel income statement, as it is the segregation between the gross operating profit (GOP) and the operating result, which is as follows:

- + Gross operating profit (GOP)
  - Management fees
  - Leases
  - Taxes
  - Insurance
  - Other non-operating costs departments

= EBITDA  
- Depreciation  
= Operating profit

The segregation between both magnitudes is because, as it is common in the hotel sector, likely exists a segregation of roles between the operator (managing the hotel business, being expert in this sector) and the property (owner of the asset/building where the hotel activity is developed).

This segregation between the two economic indicators is intended to leave the level of the gross operating profit (GOP) the operator's responsibility, regardless of the issues that are discussed below, which are more in line with the ownership structure.

In this way, a homogenization in the comparison between hotels of the obtained results in an absolute value (GOP) or related to some other variable (GOP per available room, for example) is achieved, in a way that the comparison of sectors is not affected by aforementioned concepts.

Therefore, summarizing (Campa-Planas & Sánchez, 2008), USALI is presented as the key reference framework in terms of the accounting system and the structure of management information. This system is based on a cost allocation model similar to direct costing, in a way that all costs are assigned to the departments that have generated them; and additionally, with an important feature, and under the criterion that all assigned costs mean a full identification of responsibility in the management of the mentioned cost in the department that receives it. This aspect becomes fundamental from the moment that a correct application of the system assumes a clear identification between budget/economic results and the responsible managers.

It is necessary to point out, that USALI is an operational tool focused on the short-term analysis and short-term decision-making process. So, the direct costs allocated to the Operational Departments, and consequently to their managers, should provide enough information for their management; as far as, the indirect costs are under the responsibility of other managers, not directly related with the Operational Departments.

## Research on USALI

A search has been carried out using academic databases JCR and Scopus (period 1990-2015) to detect academic studies published about USALI, with the aim of identifying preliminary studies on the homogeneity of the implementation of USALI in different countries. In both searches, USALI was used as a keyword and results were filtered by document type, considering only journal papers.

13 academic articles that met these conditions have been found, where 2 of them were repeated in both databases. Of the resulting 13 articles, 8 of them are written by the same author King (2004, 2006, 2008a, 2008b, 2008c, 2010, 2012a, 2012b).

His first research describes the importance of a uniform management system for the hotel industry in Korea and China and the identification of this system with USALI. Subsequently, he exposes the disadvantages in the implementation of USALI in these countries, the need to introduce standards regarding the accounting norms in the hotel establishments and he makes suggestions for the development of the financial statements for the hotels.

There are 3 studies that focus on USALI, and its implementation in a particular destination as Hong Kong (Ni et al., 2012), Algarve-Portugal (Faria, Trigueiros & Ferreir, 2012) and Macedonia (Kosarkoska

& Mircheska, 2012). Peršić, Janković, Bakija and Poldrugovac (2013) investigate the degree of application of the reports on social responsibility in hotels of Croatia, mentioning that the reports are composed of three types of information: accounting, social and environmental information. The accounting information for the preparation of the report would be provided by USALI.

The second study, conducted by Samper and Moreno (2014), considers the factors that influence pricing and its management. USALI is one of the main sources of information used to obtain data that allows the improvement of this process. The research methodology is a case study, being the only contribution about USALI found that is focused on a Spanish hotel chain.

All papers included in this search highlight the importance of USALI as a uniform system that allows benchmarking different hotels. However, no document examines specifically the homogeneity in the process of the implementation of USALI, being the main target of the current research.

## Objectives and methodology

Given the importance of USALI for the hotel management and the large history and tradition that accompanies this professional tool, one of the objectives was to see the degree of implementation of this system in two different groups.

On one hand, in hotel chains established in Spain (Campa-Planas, 2005) and, on the other hand, in hotels operating in Catalonia, using a publicly available and accessible database about hotel establishments (Government of Catalonia, 2015). Therefore, and given the lack of literature related to this research topic, the main objective of this study is to check the homogeneity and the degree of implementation of USALI, both, from the point of view of accounting allocation and organizational structure by departments.

In addition, the following research questions were established:

- Which is the assessment criterion used for segmenting total revenues per tourist package between the rooms department and food and beverage department?
- Which is the criterion followed for the recognition of room revenues in the income statement?
- Which is the criterion followed for the presentation of room revenues in the income statement?
- Which is the criterion followed for the allocation of staff training costs of the food and beverage department, and the costs for the liability insurance and office supplies?

In order to achieve the stated objectives, the decision was to use a quantitative methodology. The sample collection consisted of hotel chains established in Spain and the existing hotels in Catalonia.

## Selection of hotel chains

A questionnaire was sent to 35 hotel chains, obtaining a response for 27 of them, with a response rate of 77.1%, a percentage that can be considered as very satisfactory. Based on the responses received, the next proceeding was to classify the questionnaire into four groups or segments. First, big Spanish hotel chains, defined as those with presence both in Spain and abroad, that had at least more than 50 hotels in their chain. 8 out of 27 chains that answered, fulfilled this condition. Secondly, Spanish chains, understood as hotel chains with the same characteristics of presence, national or international, but with less than 50 hotels belonging to this hotel chain. Thirdly, international chains, understood as such, multinational chains, with a very small presence in Spain (one/two hotels) but with a high

international presence, corresponding 5 hotels to this segment. And, finally, individual hotels, corresponding to those that are not linked to any hotel chain.

## Selection of hotels in Catalonia

For the Catalan hotels, there was a publicly available database accessible on the webpage of the Government of Catalonia (Generalitat de Catalunya), containing 2,802 establishments. Of the 2,802 establishments included in that database, only those with the category of hotel, aparthotel or Spa were selected; considering only those establishments that had more than 10 rooms. Only those hotels that had an available and up to date email address in the database, were used; therefore, the total sample that met these requirements, was a total of 1,305 establishments. In turn, repeated contacts were deleted, as well as those where the email address was erroneous. Thus, the final sample collection was constituted by 1,089 hotels.

For the data collection, it has been used a questionnaire since it is a widely-used tool for the research in management accounting in the hotel business (Hesford & Potter, 2010). This questionnaire was based on and adapted to the study carried out by Campa-Planas (2005) and afterwards implemented online. The data collection process consisted in sending a personalized email to each of the hotels giving a short explanation about the study and asking them to complete the survey, accessible by an attached link.

In that first stage, 85 hotels answered. Two weeks after the first mail, a reminder email was forwarded; with a response rate of 15.97%, a high enough percentage given the stated goal. In the survey, it was optional for the hotel to explicitly identify itself; finally, this data has been provided by an 89.1%. Table 1 shows the characteristics of the companies that responded to the survey, considering hotel type, size and characteristics of management/contract. Regarding the hotel type, in the case of a 70.7%, the hotels are individuals that do not belong to any chain, whether national or international. Of these hotels, an 18.4% belongs to a hotel chain and a 10.3% is linked to an international hotel chain. In terms of the size of the hotels that answered the survey, a 58.1% have less than 50 rooms, and only a 4.6% have more than 250 rooms.

Table 1  
Characteristics of the hotels that responded to the survey

	Characteristics	Number of observations	%
<b>Hotel type</b>	Individual hotel	123	70.7%
	Hotel chain, with national presence	23	13.2%
	Linked to an international hotel chain	18	10.3%
	Hotel chain, with hotels abroad	9	5.2%
	Not available	1	0.6%
	Total	174	100.0%
<b>Number of rooms</b>	1-10	4*	2.3%
	11-25	53	30.5%
	26-50	44	25.3%
	51-100	41	23.6%
	101-250	24	13.8%
	251-1,000	8	4.6%
	Total	174	100.0%

\* While hotels that did not have more than 10 rooms were not considered, in the database were some hotels that did not have information about the quantity of rooms. Therefore, we decided to send them the questionnaire. In some cases, they had less than 10 rooms.

## Obtained results

In this section, the results that have been obtained through this study are presented, considering the four research questions of this paper.

### Assessment criterion used for segmenting the total revenues per tourist package between the room department and food and beverage department

Table 2 summarizes the results obtained from the question regarding the assessment criterion followed for the allocation of the tourist package among the various operational departments included in this study of hotel chains. We can see a great criterion disparity. In case of the international chains, an 80%, divide the package between rooms and food and beverage, based on the application of a standard percentage, while the remaining 20% applies a fixed amount to food and beverage and the additional amount to the rooms, criterion that seems to be the most reasonable. Whereas, the Spanish hotel chains apply both criteria at a 50% and, therefore, it does not exist any prevailing criteria. On their behalf, the big Spanish chains have a higher percentage (62%) in applying a fixed amount to food and beverage, although there is a 25% that does not segregate it between the different departments.

Table 2  
Assessment criterion used for segmenting the total revenues per tourist package between the room department and food and beverage department (hotel chains)

	Study hotel chains						Other hotels
	Total	Hotel chains					
		Subtotal chains	Subtotal Spanish chain	Big Spanish chain	Spanish chain	International chain	
Fix amount to F&B and the remaining part to rooms	48.1	47.6	56.3	62.5	50.0	20.0	50.0
% standard between rooms and F&B	48.1	47.6	37.5	25.0	50.0	80.0	50.0
Not added	7.4	9.5	12.5	25.0	-	-	-

Source: Created by the authors.

Table 3 presents the results for the study of hotels in Catalonia. Most of the hotels (53.6%) apply a fixed amount to food and beverage and the additional amount to rooms, while a 29% shares the package among rooms and food and beverage based on the application of a standard percentage. Considering the hotels belonging to chains with hotels abroad, a 100% uses the first criterion.

The only category of hotels that mostly does not use the criteria to apply a fixed amount, are hotels linked to an international chain. These results are consistent with Table 2, where an 80% of the international chains used this criterion. Among the hotels that answered not making use of any of the proposed criteria in some cases, three answered this way because they did not segregate the amount between the departments.

Table 3  
Assessment criterion used for segmenting the total revenues per tourist package between the room department and food and beverage department (hotels in Catalonia)

Study hotels Catalonia					
	Individual hotel	Linked to an international hotel chain	Hotel chain with national presence	Hotel chain with hotels abroad	Total
Fix amount to F&B and rest of rooms	57.4	27.3	50.0	100.0	53.6
% standard between rooms and F&B	23.4	63.6	25.0	--	29.0
Another alternative criterion	17.0	9.1	12.5	--	14.5
Non-available	2.1	-	12.5	--	2.9

## Criterion followed for the recognition of room revenues in the income statement

In the next question, we tried to see the criterion followed for the recognition of room revenues in the income statement. A priori, and regardless of whether USALI offers any positioning in that regard, from a perspective of applying the accrual criterion and the accounting principle of correlation of income and expenses, we believe that the correct approach is to allocate the income based on the expected length of the customer's stay at the hotel.

In Table 4, we can observe answers to this question, where the 100% of the international chains confirm the application of this criterion, while the other two segments of Spanish chains also apply this criterion in case of an 87.5%. The remaining responses state that they do so at the moment of the clients' arrival at the hotel (check-in), separating it from the days of stay.

Table 4  
Criterion followed for the recognition of room revenues in the income statement (hotel chains)

	Study hotel chains						Other hotels
	Total	Hotel chains					
		Subtotal chains	Subtotal Spanish chain	Big Spanish chain	Spanish chain	International chain	
At the moment of charging the stay	3.7	-	-	-	-	-	16.7
At the moment the client does the check-in	7.4	9.5	12.5	12.5	12.5	-	-
Depending on the length of stay	92.6	90.5	87.5	87.5	87.5	100.0	100.0

Table 5 shows the results corresponding to the work performed in the hotels established in Catalonia. Only in the category of hotels linked to an international chain is this the most used criterion, since a 59.4% of the hotels of the sample recognize the room revenues in the income statement at the moment of charging the corresponding amount.

Table 5  
Criterion followed for the recognition of room revenues in the income statement (hotels in Catalonia)

	Study hotels Catalonia				Total
	Individual hotel	Linked to an international hotel chain	Hotel chain with national presence	Hotel chain with hotels abroad	
At the moment of charging the stay	38.3	18.2	12.5	33.3	31.9
At the moment the client does the check-in	6.4	18.2	12.5	--	8.7
Depending on the length of stay	21.3	45.5	37.5	33.3	27.5
At the moment of the room reservation	4.3	9.1	--	--	4.3
At the moment of charging the reservation	25.5	9.1	25.0	33.3	23.2
Other criteria	4.3	--	12.5	--	4.3

If we analyze the criteria used with respect to the hotel size, a 66.6% of the hotels with more than 100 rooms use the recommended criteria.

## Criterion followed for the presentation of room revenues in the income statement

The following question has tried to see the homogenization of the presentation of the sales numbers, when considering whether all the establishments would present the number of room revenues once netted from sales commissions, or on the contrary, if they would present the revenues through their gross amount and as expenses the amounts corresponding to discounts and commissions. Table 6 shows that it exists a significant majority in all segments that do not net the amount of sales (around a 75-87% presented through its gross amount).

Table 6  
Criterion followed for the presentation of room revenues in the income statement (hotel chains)

	Study hotel chains						Other hotels
	Total	Hotel chains					
		Subtotal chains	Subtotal Spanish chain	Big Spanish chain	Spanish chain	International chain	
Net income of discounts	22.2	19.0	18.8	12.5	25.0	20.0	33.3
Gross income and commissions as expenses	77.8	81.0	81.3	87.5	75.0	80.0	66.7

Source: Created by the authors.

Table 7 contains the results of the question in the case of hotels established in Catalonia. It shows that a 58% of the hotels present the net number of sales. This option was the most chosen in all the categories, except the category of the hotel chain with national presence.

Table 7  
Criterion followed for the presentation of room revenues in the income statement (hotels in Catalonia)

	Study hotels Catalonia				
	Individual hotel	Linked to an international hotel chain	Hotel chain with national presence	Hotel chain with hotels abroad	Total
Net income of discounts	61.7	54.5	37.5	66.7	58.0
Gross income and commissions as expenses	31.9	45.5	50.0	33.3	36.2
Other criteria	4.3	--	12.5	--	4.3
Non-available	2.1	--	--	--	1.4

## Criterion followed for the cost tracing of staff training of the food and beverage department and costs for the liability insurance and office supplies

This question considers recurring operations in a hotel establishment to see uniformity in their accounting treatment, homogeneity with USALI on one hand, and, on the other hand, between establishments. In Table 8, we can see that the first question is about how to register the costs of staff training of the food and beverage department.

Following USALI and assuming that this course would have been requested by the responsible manager of the F&B department, the same should be allocated to the mentioned department and not to human resources or the administration department, for instance. Table 8 shows that, while international chains demonstrated a greater implementation of USALI, only a 40% considers this as F&B spending, allocating the remaining 60% to human resources. In a 37.5%, the Spanish chains considers that as general expenses and a 25% considers that as restaurant business. In contrast, the big Spanish chains, contrary to the case of international chains seemed to show a lower degree of implementation of

USALI, and they are those who allocate it in a greater percentage amount to the restaurant business, namely an 87.5%.

The second question in the same part was about the cost assignment for the liability insurance. In this case, following USALI, it should be administrative, general or a management cost (depending on the structure of the departments), but in any case, attributable to the manager (in case of being different from the owner of the property). It is not a business expense, as it is directly linked to the business operation; contrary to the insurance for material damages of the property, that, because of being linked to the property would not be attributable to the manager and, therefore, would not penalize the gross operating profit (GOP).

As Table 8 shows, there is also a diversity of responses, although, if we totalize costs of administration and general, an 80% of responses are concentrated in the international chains, a 63% in Spanish chains and an 87% in big Spanish chains.

Another answer, not acceptable from the accounting management point of view, is to consider the cost of insurance as financial expenses, since these are not linked at any time to the debt, interest expenses or monetary transactions.

Therefore, we could verify that relatively simple operations have generated quite different responses related to the treatment of cost assignments.

Table 8  
Classification per departments of determined operating costs (hotel chains)

Study hotel chains							
	Total	Hotel chains					Other hotels
		Subtotal chains	Subtotal Spanish chain	Big Spanish chain	Spanish chain	International chain	
<b>Cost of staff training of food and beverage department</b>							
Restaurant business	55.6	52.4	56.3	87.5	25.0	40.0	66.7
General	14.8	19.0	25.0	12.5	37.5	-	-
Human resources	18.5	19.0	6.3	-	12.5	60.0	16.7
Other	3.7	-	-	-	-	-	16.7
Non-available	7.4	9.5	12.5	-	25.0	-	-
<b>Costs of liability insurance</b>							
Administration	37.0	38.1	31.3	50.0	12.5	60.0	33.3
General	33.3	38.1	43.8	37.5	50.0	20.0	16.7
Business expenses	14.8	4.8	6.3	12.5	-	-	50.0
Financial	3.7	4.8	-	-	-	20.0	-
Non-available	11.1	14.3	18.8	-	37.5	-	-

Table 9 shows the first proposed operation that is to register the costs of staff training of the food and beverage department, for the established hotels in Catalonia.

As previously indicated, according to USALI and to the extent that the mentioned course has been requested by the F&B responsible (and therefore responsible for the same), the cost should be allocated to this department and not to human resources, administration or general, for instance. More than a 50% of the hotels linked to an international hotel chain or a chain with national presence, carry out the cost assignment in accordance with USALI, even though they do not have implemented the

system. The second criterion most used by these types of establishments is to charge the costs to human resources, coinciding with the first criterion used by the individual hotels (42.6%). The second proposed recurring operation was how liability insurance costs were charged. Half of the hotel chains, with hotels abroad (50%) allocate the cost to the administration department. However, the options following the USALI guidelines are not the most used by the rest of hotel types, where they are allocated as business expenses or even to other departments.

Table 9  
Classification per departments of determined operating costs (hotels in Catalonia)

Study hotels Catalonia				
	Individual hotel	Linked to an international chain	Hotel chain with national presence	Hotel chain with hotels abroad
<b>Costs of staff training of food and beverage</b>				
Food and beverage	31.5	52.4	50.0	33.3
General	5.6	--	10.0	8.3
Human resources	42.6	23.8	30.0	8.3
Other	20.4	23.8	10.0	50.0
<b>Costs of civil liability insurance</b>				
Administration	20.7	22.2	25.0	50.0
General	10.3	5.6	25.0	--
Business expenses	18.4	33.3	37.5	25.0
Other	50.6	38.9	12.5	25.0

## Conclusions

Since 1926, the hotel industry has used a uniform system of accounts (USALI), based on a cost allocation model similar to direct costing, so that all the costs are allocated to the departments that have generated them.

There are significant advantages in implementing USALI, among which we could highlight the homogenization of results, which allows the possibility of applying it to both large and small hotels, individual hotels and hotel chains, and the possibility of its application independently of the owner structure of the hotel. Therefore, it is a basic tool for benchmarking, controlling and comparing results between different establishments.

As it can be deduced from the characteristics of USALI, its advantages are based on the uniform registration of operations; uniformity that has not been fully tested in this study. Therefore, it is questioned, on one hand, the degree of implementation of USALI, and on the other hand the reality of the advantages that should derive from its use.

This research consisted in merging two quantitative studies on hotel establishments in Spain. The first one, focused especially on hotel chains established in Spain and the second one, hotel establishments located in Catalonia. After setting out several questions concerning the method of allocating certain common transactions in the hospitality sector, it was possible to verify a remarkable disparity of the criterion that surfaces the problem of heterogeneity in management information, as well as the potential difficulty in considering the information as uniform in the moment of carrying out sectorial studies.

For instance, in a regular operation, such as the segregation criterion of the tourist package (how much amount to charge for rooms, how much for food and beverages), we noted that a 48.1-53.6% (hotel chains and Catalan hotels, respectively) apply a fixed amount to food and beverage and the additional amount to the rooms, while a 48.1-29.0% divide the package between rooms and food and beverage based on the application of a standard percentage.

In two operations, also common in this sector (criterion of recognition and presentation of room revenues), we found that there was also no prevailing criterion. In the case of revenue recognition, it is given a considerable dispersion, registering the same in the moment of payment, a 3.7-63.8%, based on the daily stay a 92.6-21.3%, and, finally, a 3.7-4.9% in the moment of the reservation and other criteria with lower percentages.

About the accounting presentation of revenues, the netted presentation of commission is majority in Catalan hotels (61.7%); meanwhile in the hotel chains, that is in the case of a 77.8%, revenues and commercial expenses are not presented netted. Two additional questions were laid out in relation to which departments should be allocated certain expenses (staff training of food and beverage and liability insurance), obtaining a real range of possibilities in the responses provided.

Therefore, all the last answers regarding how to implement USALI allow us to conclude the disparity of the criteria in the application of the same in the analyzed hotels. We understand that the present study gives the possibility of developing future research in this area, so that it can be extended to hotels established in other countries, analyzing other hotel transactions. Additionally, it can be studied if the heterogeneity is depending on the hotel type (number of rooms, number of stars, city or beach hotel, etc.). Additionally, in further researches, it could be very interesting to analyze the homogeneity or heterogeneity related with the calculation of the main key performance indicators in this business, as for instance, RevPar, ADR or occupancy.

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