

COSTING SYSTEM FOR HOSPITALS

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Hospitals, like hospitality industry, provide a variety of services to patients under one roof. It is akin to a large manufacturing or a service organization considering the number of personnel involved and the capital-intensive nature of medical equipment. But there are several distinguishing factors in a hospital such as: It is fundamentally humanitarian. Thus, hospitals cannot turn away needy patients just because they do not have money to pay. They have to factor such scenarios in the financials.

Other than corporate hospitals, they are either Government run or charitable institutions. So, a lot of public money is involved which needs to be efficiently deployed even if the objective of an institution is not profit.

There is a concept of cross-subsidy across different classes of patients. Different prices may be charged to different classes of patients although the main services rendered to the patient may be the same.

Unlike the hospitality industry, the health care industry should focus more on higher productivity of expensive resources (like OT, medical equipment, Doctors' time) and less on bed occupancy.

In today scenario, the corporate world has adopted and benefited from good costing systems since the 1930's. However, because of the complexities involved and the inherently charitable nature of the hospital, managements have not given much thought to putting a good costing system in place. It is sad to see that in most hospitals, even today, the process of fixing the Schedule of Charges has no scientific basis. They simply survey the charges of nearby hospitals and fix their rates a little above or below the other hospitals depending on the Management Philosophy/ Marketing Strategy.

The hospitals still tend to use only bed occupancy as the yardstick of

measurement of performance. With the advancements in medical technology, the average length of stay (ALOS) is reducing and hence, bed occupancy is not important any longer. The increased utilization of costly equipment in operating theatres, ICUs, Cath-Lab, Pathology Lab etc. & Doctors' times are the key to success in hospitals.

Why a good costing and management accounting system?

The scenario in the past few years has changed dramatically for the healthcare industry. Established names in the industry are facing tremendous competition from the newcomers. Thus, each hospital has to be competitive both in terms of the quality of services as well as cost management.

Another big movement expected is on account of the advent of insurance companies. With the costs of treatment going up and the privatization of the insurance industry, the hospitals will be forced to give quality service at highly competitive prices as the insurance companies will pay for the service directly and monitor the service rendered closely. It, therefore, is imperative for hospitals to have a system to control the costs while providing high quality service to the patients.

Objectives of a costing system

Utilization of resources

A costing system should monitor the resource utilization across the hospital. These resources could be infrastructure, equipment, materials or personnel. Each department has a key driver and the system should track these drivers on a continuous basis. This will ensure that each department is efficient.

Department-wise profitability analysis

A good costing system should enable generation of this most valuable information on an on-going basis. Managements can take corrective steps using this data. It enables fixation of responsibilities and monitoring them. Coupled with a budgeting system, Managements will have full control over the working of the hospital.

Fixation of doctors' honorarium

This is a very touchy subject for most Management. With a costing system, they can negotiate a fair rate for the doctors for each service rendered. The doctors also will be assured of a reasonable and scientific basis for their remuneration.

Fixing Schedule of Charges

This document can make or break a hospital. The costing system should provide inputs to fix the charges for the various services rendered for each class of patient. This is not to say that the charges of monitoring

For purchases of new equipment or infrastructure, the costing system should enable the Managements to arrive at the feasibility of the projects. More importantly, the system should keep track of the status of the projects after they are commissioned. Generally, at the time of feasibility stage, certain estimates & assumptions are made. But almost never are they monitored after commissioning.

Monitoring of factors affecting pricing

The costing system will keep a tab on all factors affecting pricing. For example, material costs directly affect prices. Any major variation in material costs should be highlighted and price changes effected immediately after ascertaining the impact of the variation on margins.

The costing problem

Patients undergoing treatment receive services of varied nature from different departments. The hospital has to recover the expenses of these as well as the supportive departments from the patients availing of these services.

Nowadays, any composite hospital with latest facilities for advanced medical/surgical procedures in the various

areas of treatment will have nearly 50 or more revenue centers and about 10 to 15 supporting service centers. Further most of the revenue centers, particularly, in-patient wards, will have classification depending on the level of services for different class of patients according to their monetary or other needs. Again, each department, other than Wards, undertakes several types of procedures/operations etc.

All these make the list of procedures and classification of services quite large. It is for this reason that ascertaining true costs of various services rendered and fixing of the Schedule of Charges for the innumerable services and classes become extremely complex. This needs to be done after careful analysis of past data, comparative data from other hospitals, study of utilization of capacities and applying costing techniques for allocation and absorption of costs to provide acceptable costs and charges, enabling optimization of capacity utilization, which, in turn, result in better overall revenues and leave adequate funds for growth and development of newer and advanced facilities.

Setting up a costing system

Unlike in other industries, where pricing of products / services is generally uniform except in special cases such as exports, institutional sales etc., in hospitals most of the services rendered are charged at different rates based on class of patients; besides, a category of patients are given free or semi-free treatment where the charges are nil or kept very low. Thus, the final charges or pricing has no direct relevance to 'costs' individually but the overall revenue expected from the charges recovered from all patients has to cover the total costs incurred, to make the procedure or department self-supporting. This matching of expected revenue and costs can be done only on the basis of exhaustive analysis of past quantitative and financial data. Thus, detailed statistics play an extremely important role in Costing of services and fixing of schedule of charges. Again, based on such analysis, discussions with medical personnel of each department regarding the Table 1 practical problems and

determination of reasonable & practical levels of occupancies and expected quantum of each procedure and class-wise level of patients and detailed level of budgeting of revenue has to be made. This will form the broad structure for cost allocation to the various cost centers and fixation of individual charges. Keeping in mind the purpose of cost allocation as well as its importance to the hospital in recovering all expenses incurred, the procedure for cost allocation should be designed so that accurate and realistic results are obtained. We shall not go into the intricacies of these procedures in this article but limit ourselves to the basic steps for the purpose of ascertaining the final costs to obtain the desired results.

Broadly the steps needed are:

- 1) Identify the various cost centers in the Institution and arrange them into:
 - a) Revenue producing centers by charging to patients for the services and
 - b) Supporting non-revenue producing centers
- 2) Allocate direct expenses to all centers by analysis of each element of cost
- 3) Develop cost allocation criteria for supporting cost centers to other supporting cost centers and revenue producing centers, ultimately bringing all costs into revenue producing centers. This will be done on the basis of services rendered for other centers.
- 4) Now, each revenue center will have the total direct costs of the center and indirect costs representing the allocated expenses of the supporting centers.

- 5) The total costs thus arrived at for each of the revenue providing centers and to be appropriately distributed among the various services rendered to the patients by that center. This involves not only finding the nature of the services but also learning the general application of the services to the patients. This should be done in conjunction with the medical personnel and modalities determined for each type of service.

Once the costs are available for each profit & cost center, they can be used for the various purposes identified earlier. Typically, to arrive at the above costs, one needs to setup various monitors across the hospital, which will give the necessary data for computing the costs. Computerization could significantly simplify the process of data collection and analysis. A good Hospital Management System software should form the basis for the costing system.

Summary

Whatever be the philosophy of the Management, they need to ensure efficient utilization of costly resources and they should take informed decisions on pricing. A scientific Costing system is a very important tool for Managements to fulfill these needs and hence, is imperative for the successful running of a Hospital.

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