

SHORT COMMUNICATION

The Interface between Environmental Services Department and Hospital Infection Control

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The importance and impact that the hospital environment has over the organization of the services and the safety of the patient is undeniable. Much of the assessment by part of the customer in a Hospital environment is related to the areas associated with infrastructure and the quality of existing services and has been used in some models as a market tool in the captivation of new clients.

However, besides aspects of customer loyalty, when well structured, the Environmental Services Department can offer support in infection control by having better managed hygiene and cleaning services.

The relationship between the Environmental Services Department and the Hospital Infection Control Committee affects the existing cleaning routine and might result in more adequate and decisive work methods.

One of the main processes of alignment in existence between these areas is in the standardizing of the chemical products used in the hospital (detergent, disinfectant, products used by the laundry and pest control) by way of technical specifications from their manufacturers and the validation of their correct usage, from their dilution to their use in the standard procedures and work instructions.

According to the editors of CDC (*European Centre for Disease Prevention and Control*),⁸ this interface presents important intersections of the HICC with the cleaning staff, causing a better control of the hospital environment in the cross transmission of microorganisms.

One of the largely used instruments in Brazilian Hospitals is the terminal cleaning check list. The immediate leadership assesses the cleaning performed on the main items existing in the environment listed on a standardized document. The practical objective of this instrument is normally much more directed to verifying the corrective maintenance of the items than to the way in which the environment was in fact cleaned. Usually the employee who performed the cleaning is no longer even present in the vicinity at the moment of the check and many times there is not a feedback of possible existing errors.

Technically Validating the cleaning could improve even

more the performance of the process. Although there already are several forms of microbiologic assessment of the environment, as for example, verification of the positivity of culture in swab test, fluorescent gel, the ATP (adenosine triphosphate) quantitative analysis that is directly related to the quantity of live cells in the area – the process performed in the hygiene routine is direct observation after the cleaning of the area, which has no action in identifying pathogens (Noble-Wang, 2010).⁵

In the hygiene check list, all of the items are treated with the same importance and it evaluates primarily aesthetic matters after discharge cleaning or mistakes that are unusual and gross due to lack of attention, as in, for instance, the presence of hair on the floor or on furniture, the bedding, the organization (layout) of the furniture or the presence of visibly soiled surfaces of the patient room.

Adapted from a model developed by Carling (2008),¹ Qutaishat (2012) states that the highest critical points of the "patient environment" can be divided into three areas, representing 18 constant elements in the patient room, which should be the main target for specific training. These items should receive more highlight in the cleaning evaluation checklist in relation to the other components due to presenting higher risk of contact with the patient and employees and should be constant target of training and recycling.

The three areas are divided as follows:

A) Patient Care Surfaces

- 1) Call Button
- 2) Remote Control
- 3) Patient Tray Tables (Overbed)
- 4) Bedside table/cabinet
- 5) Telephone
- 6) Bed rail & Bed control panel
- 7) Patient/Visitor chairs

B) Restroom Surfaces

- 1) Toilet flush handle
- 2) Toilet hand holds/rails
- 3) Patient Pull cord

- 4) Toilet seat, bowl and booster
- 5) Wall area around toilet
- 6) Restroom door and handle
- 7) Sink, faucet, and handles
- 8) Portable commodes
- 9) Restroom light switch

C) Room Entrance Surfaces

- 1) Room door and handle/knob (both sides)
- 2) Room light switch

Even so, it is well known that technical training, at its best, still does not imply in behavioral changes. It only affects the knowledge of a determined subject. The reinforcement of technical training in work routine should be carried out by direct leadership, who need to give constant feedback about the activities performed by the cleaning staff. Work procedures during training should be presented in a clear manner so as to move the team on the importance of their role in the reduction of the rate of hospital infection and how to do it.

The aforementioned 18 items, for example, could be the target of tighter control on activities performed by the leadership, diminishing subjectivity of training.

In general, the cleaning staff is one of the teams that offer one of the lowest rates of knowledge retaining when comparing the degree of existing knowledge on the date of training and a few days after the training session. It is represented by cleaners, housekeeping department workers, laundry workers and residue collectors.

For this reason, a training methodology is necessary that is able to convey to these employees consistently in a simple and objective manner of approach. The work of this team is carried out in all areas of the hospital, their presence in the customer environment is daily and needs to be well developed, as well as their leadership. The HICC department has a direct interface in the planning of these training sessions, along with the department itself and many times even with the support of suppliers.

Several studies show the direct relation between contaminated environment and the increase of risk of infection due to the persistence of multiresistant pathogens on surfaces for months and reinforce the importance that the cleaning staff understands the precautions present in the Hospital.

Shaughnessy MK,⁶ et al 2011, Huang SS, Datta R, Platt R,⁴ 2006 and Drees M, Snyderman DR, Schmid CH,² 2008 bring important studies that reinforce the matter of environment influence, showing an increase in the risk in admittance in beds previously occupied by patients infected with *Clostridium difficile*, MRSA or VRE respectively.

Aside from these, several other authors discuss this point, including Eckstein (2007)³ and Carling (2008)¹ who show the relation among the environment, sanitation routine and hospital infection.

However, as important as discussing sanitation techniques and their relation to the environment is dealing with the dimensioning and the difficulty of retention of this team, in which the HICC does not directly legislate, but is affected by their results and methods.

The struggle to keep a hygiene team over a long period of time can also be directly related to its quality and might affect results as well. As this activity is based on a business model that has inexpensive workforce as the basis for its structure, pay and benefits affect the quality of the labor team directly.

According to ANAHP data,⁷ between 2004 and 2012, it is possible to verify an increase of over 150% in the rate of annual absenteeism in private hospitals. The turnover indicators follow this increase, generating effects on work accidents, overtime and

the difficulty of qualifying a constantly "new workforce" monthly, ever more rare. The motives are varied, among them, the continued opening of new jobs in the formal work market of Brazil, overall in civil construction, the standardizing of the rights of domestic employees foreseen in the Constitutional Amendment no. 72 and the ascension of class C, seeking a migration from operational jobs to administrative areas.

This demands that the management of the cleaning area be more and more professional. In the past, the environmental services in Brazilian hospitals had an exclusively operational scope. Apart from being in-house or outsourced, models are still found in which the environmental services area is directly connected to the nurse area and in other models, directly connected to an administrative direction. Many times, in these models, the leadership is merely operational and does not possess any relationship with the areas of interface and does not present a political status that allows a systemic view of the impact of its processes on the remainder of the hospital or an active voice in the decision making that might influence aspects connected to the choice of furniture, finishing, chemical products, equipments and bed management.

This manager, in a hospitality structure, should have conditions to align processes, plan activities with other managers of the Hospital, such as, the nurse manager, the human resources manager and IT, for instance, and work alongside with the HICC area, understanding this area as a facilitator of its processes, educator and partner and never as an auditor.

The Hospitality Department should, therefore, embrace all of the non-healthcare services that have direct contact with the customer and should be represented by a manager that answers for these services. In other words, besides the management of the cleaning services, this manager is also responsible for the clothes processing (washing) and the linen room (control and distribution), pest control and solid residue management. All of these services have a direct relation with infection control and the management of the interfaces is a critical factor of success in the rendering of the services.

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