COMPARING ADMINISTRATION OF HOSPITAL WASTES USING SOCIAL NETWORK ANALYSIS

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Abstract:
Waste management requires interaction between different players. It is important to map these interactions to identify key players. This study utilizes social network analysis to compare the organization of waste management activities at two different hospitals. One of these hospitals was a large public hospital whereas the other one was a small private hospital. The structure and characteristics of the waste management network varied at both hospitals. On the whole the network at the larger hospital was institutional and the one at the smaller hospital was social in nature. At the larger hospital communication between any two members on average required three degrees of freedom. Moreover, its waste management network was characterized by the presence of three brokers whose absence could split the network into smaller disparate components. At the smaller hospital the waste management activities suffered from a lack of involvement from the paramedic staff. Thus its waste management network was more compact and communication between most of the network members did not require an intermediary. In both hospitals, a feedback mechanism between the municipal sanitary staff and hospital management was conspicuous by its absence. Hence issues such as an incidence of hazardous items mixed in the general waste could not be communicated to the hospital directly. The key positions identified in this study can be used for behavioral changes related to waste management among the concerned hospital staff.