Letters to the Editor

The Protectiveness of Protective Clothing

To the Editor:

As described in her commentary, [1] Sue Crow and the members of her infection control committee are to be commended for the comprehensive protocol they developed to ensure their being able to select "the best protective gown for the best price" for their employees. It is truly a formidable task completed in a thoroughly objective manner.

Under the prevailing circumstance, it is not difficult to empathize with the quandary confronting not only this group but everyone else to whom similar tasks have been delegated. Because the primary purpose of the protective gown is to protect the wearer from blood and other potentially infectious materials, it is the gown's protective capability that must be given the first and foremost consideration. As Ms Crow states, the selection process immediately becomes a perplexing one by the identification of three categories or levels of protection that may be required: where there is a potential for soiling; where there is a potential for splashing; and where there is a potential for becoming soaked.[2]

For those situations in which the garment is intended to protect against the potential for soiling, it could be interpreted that gowns made of the traditional type of fabrics would be considered appropriate.

The selection process then focuses on materials that are either liquid-resistant or liquid-proof. Before proceeding, however, one must have thorough understanding as to how distinctively different these terms are.

Materials that are liquid-resistant generally have varying degrees of resistance that are usually determined by the extent to which the pores or interstices of the fabric are closed. Liquid-proof materials, on the other hand, are usually coated or laminated with some type of impervious film. Their performance is absolute-they simply do not permit the liquid to penetrate.[3] As a matter of fact, one could expect a liquid-proof material to rupture under pressure before permitting liquid to penetrate.

Another important consideration that directly influences a fabric's liquid resistance or liquid-proof capability is one that Ms Crow's group astutely examined, that namely being comfort. Cornfort usually is determined by a combination of factors such as temperature, humidity, and air movement. The importance of each of these factors differs relative to the other factors. For example, an improvement in a fabric's capability to resist liquid penetration can only be achieved by proportionally decreasing its permeability. Conversely, increasing the permeability of a fabric results in diminishing its ability to resist liquid penetration.[3] Although lower levels of liquid resistance might be adequate in some situations and its protectiveness cornpromised for the sake of comfort, it is highly unlikely that one could have the security of a liquid-proof or impervious garment without sacrificing wearer comfort.

Overall, it is the complexity of these two factors-liquid resistance and comfort-that accounts for the ranges in "barrier effectiveness" of all the products on the market today. As understandably frustrating as this may have been to Ms Crow's committee during the course of its selection process, it is quite apparent that the variances in opinion as to

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what constitutes "barrier effectiveness" is prevalent enough to support the availability of such an assortment.

In conclusion, the question to be answered is whom should be responsible for determining the level of protection to be provided by a gown worn by the healthcare worker: the infection control community or the manufacturers of the products. Ideally, it would be preferable to have both parties participate in establishing the parameters of performance. History has proven that casting the responsibility on industry alone can only result in the perpetuation of chaos and confusion.

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SOME PEOPLE TAKE DRUG ABUSE TO HEART.

Most cocaine users are so dedicated to the drug that what it does to their hearts never enters their minds. They don't realize that every time they use cocaine, they put themselves at risk for such potentially fatal cardiovascular complications as hypertensive crisis.. . myocarditis.. . myocardial infarction . . .ventricular tachycardia.. . ventricular fibrillation.. .even cardiac arrest.

Chances are, at least some of these people are your patients. And many of them may feel more comfortable telling a nurse what they can't-or won't-tell a doctor. That's why your role becomes critical in helping suspected drug abusers understand what illegal drug use does to their bodies.

As key members of the health care team, nurses can make a difference in helping to curb drug abuse, and in preventing some of its deadliest consequences. The next time you suspect a patient may be using cocaine-or *any* illegal substance—have a heart-to-heart talk about the damage these drugs can do.

A short talk can go a long way.

Partnership fur a Drug-Free America

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