

PERSONAL PROTECTIVE EQUIPMENT

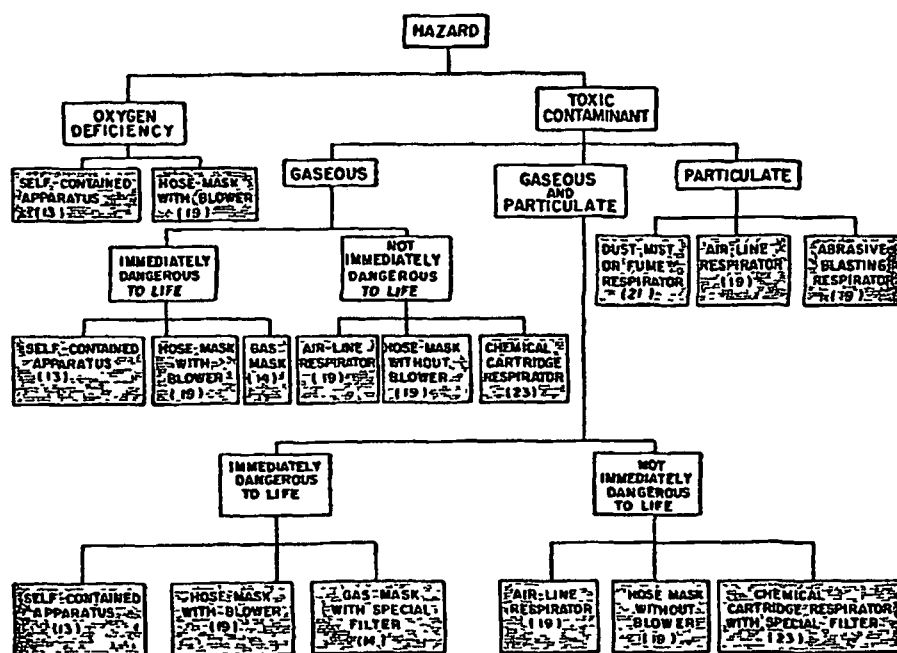


Fig. 36-12. Outline for selecting respiratory protective devices (after Bureau of Mines Information circular 7792) Numbers in parentheses (in shaded boxes) refer to Bureau of Mines Schedules and Revisions thereof which discuss the items.

The industrial safety man should familiarize himself with the type of hazard for which a given type of respiratory equipment is approved, and should not permit its use for protection against hazards for which it is not designed. For instance, mechanical filter respirators are of no value as protection against solvent vapors, injurious gases, or lack of oxygen. Their use under these conditions is one of the most common and most dangerous abuses of respirators.

Other common misuses of respiratory equipment is to use chemical cartridge respirators where canister masks are required or to use chemical filtering types where air fed or self-contained units are necessary.

Some substances require protection against not only damage to the respiratory system but also systemic injury through the skin. All substances should be investigated to learn whether this double hazard is involved. Some common substances which

are hazardous through both the respiratory system and the skin are

- Aniline
- Carbon disulfide
- Cresol (cresylic acid)
- Dichloroethylene-1,1
- Decalin (decahydronaphthalene)
- Diethylene oxide (dioxane-1,4)
- Diethylphthalate
- Dimethylaniline
- Dinitrobenzene
- Dinitrochlorobenzene
- Hydrogen cyanide (hydrocyanic acid)
- Iodoform
- Lead tetraethyl
- Mercury and its compounds
- Nicotine
- Nitrobenzene
- Nitroglycerine
- Organic phosphate insecticides
- Phenyl hydrazine
- Tetralin (tetrahydronaphthalene)