

HAZARDOUS MATERIALS SAFETY TIP

D.E.C.I.D.E. PROCESS FRAMEWORK

An emergency is a set of circumstances that are (1) sudden, (2) unforeseen, (3) urgent, and (4) demand immediate action. During an emergency, the decision maker is faced with a series of decision events.

When hazardous materials are involved, the possibility of the emergency escalating into a disaster is always present, and the demand for action is even more immediate. Because of the nature of a hazardous materials emergency, many decisions are made on a "first-time" basis, usually under duress.

"D.E.C.I.D.E." is a process framework for hazardous materials emergency decision making. The goal of "D.E.C.I.D.E." is to influence the outcome of the emergency response sequence by making decisions that focus on modifying the sequence of events that would otherwise occur naturally.

Six steps provide a framework for decision making during a hazmat emergency:

1. **DETECT** hazards and hazmat presence. The essential first step in any emergency. Facts and clues must be sought out by the decision maker.
2. **ESTIMATE** likely hard without intervention. The next logical step when hazmat is present. Decide what the most likely progression of events and their outcome will be, if no intervention is attempted.
3. **CHOOSE** response objectives. Based on the predicted injury and damage estimates from step #2, choose emergency response objectives that aim to minimize or avert these losses.
4. **IDENTIFY** action options. Analyze the action options plus the "gains" and "costs" associated with each. Usually more than one action option is available to control the emergency, depending on the stage beyond which the emergency is to be influenced.
5. **DO** best options. A decision to proceed with the best option after the estimated harm-and-events-sequence predictions are known for each available action option.
6. **EVALUATE** progress. Continuous observations and decisions of a "yes/no" type following the decision to proceed with the best option. If the events sequence is not progressing as expected, much of the D.E.C.I.D.E. process must be repeated until the emergency has stabilized.

