Exercise 1

Create a model of a street crossing with a signal and a walk-sign.
The decision to be made is whether you should:

- walk
- dont-walk
- be-cautious

The result should be given in terms of a **walk-status** assertion and printout.
The lights have the following conditions:

- Signal-Light
  - green
  - yellow
  - red
  - broken
  - blinking-yellow
- Walk-Signal
  - walk
  - dont-walk
  - broken

The pedestrian should walk only if it is safe by both lights.
Use an intermediate template having the conditions of both signals:

- signal-light-status
- walk-signal-status

One set of rules should deal with setting the signal-light-status and one set of rules should deal with setting the walk-light-status.
Use this intermediate structure to make the final decision.
Hand in the program and sample data.