

# **The Mining Metaphor of Knowledge Acquisition**

*If only we could go a little deeper and  
extract one more piece of knowledge,  
our system will perform better.*

# **The Specific Situations Heuristic**

*Practice tells us what experts cannot.*

# **The Situation Comparison Heuristic**

*If two situations look the same  
but the expert treats them differently,  
then they are not the same.*

**vocabulary**

*AI systems as*  
**idiot savants**

The system reasons at only one level.

The system does not look  
at the problem  
from different perspectives.

The system does not know  
when to break its own rules.



The system does not have access to the reasoning behind its rules.

Pick two of these.

- 1 The system reasons at only one level.
- 2 The system does not look at the problem from different perspectives.
- 3 The system does not know when to break its own rules.
- 4 The system does not have access to the reasoning behind its rules.

\* Give an example from your problem, or from another problem with which you are familiar.

\* Can a computer program do this?  
If so, how? If not, why not?