

Microcontroller Exercise

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- Explain briefly how the various characteristics of an embedded system can be fulfilled. Which methods and techniques are used?
- Give an overview of the attributes of dependability and show how they influence each other.

- Give a schematic overview on the main elements of a microcontroller.
- Which processors are typically used for microcontrollers?
 - Given an overview of the characteristics (like: #address bits, cpu frequency, # memory, ...)
- Implement a 2-bit (branch) predictor given by the state diagram in the lecture
 - In C-Code
 - As a circuit (use the known memory elements from computer science 1)