

It is small set of instructions.

It contains at most 100 instructions set.

Because of simple instructions, RISC chips require fewer transistors to produce processors.

Also the reduced instruction set means that the processor can execute the instructions more quickly, potentially allowing for greater speeds.

Allowing simple instructions causes a heavy load on the software's.

Greater works on efficient writing on software required because of availability of less number of instructions sets.

Instruction pipelining can be implemented easily.

Only LOAD/STORE instructions can access memory.

Mainly used for real time applications.

RISC systems decreases execution time by reducing the clock cycles per instruction, such that simple instructions take less time to interpret.

Examples: Atmel AVR, PIC, ARM, etc.

Advantages of RISC:

- Implementation is easy.

- Transistor counts are very less.
- Clock speed is fast.
- Power consumed per instruction execution is less. Hence its mainly used in Mobile and other power sensitive products.

Disadvantages of RISC:

- More program code-size due to reduced instruction set.