

Microprocessor System Vs Microcontroller System

Microprocessor	Microcontroller
Used where intensive processing is required	Used where task is fixed and predefined
Only CPU is in the chip. Memory, I/O port are connected externally	CPU, Memory, I/O port – all are connected on the same single chip
Higher Clock speed and external RAM used is also higher	Lower Clock speed and RAM used is also lower
The program for the microprocessor can be changed for different applications.	The program for the microcontroller is fixed once it is designed
Cost is comparatively higher	Cost is comparatively lower
Power consumption is higher	Power consumption is lower
Overall size of the system is large	Overall size of the system is smaller
Applications include personal computers	Applications include washing machines, camera etc.