

* Sejarah Perkembangan Sistem Kontrol Digital

Tahap RINTISAN

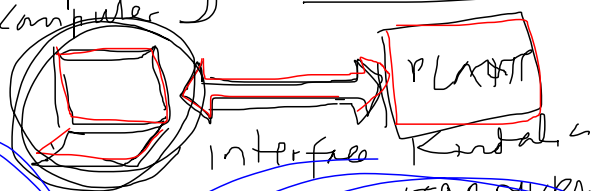
Tahap ODC → PLC → DCS → APC

Tahap MiniComputer → PC-based

Tahap Microcomputer

Next
PERMUKAAN
SISTEM
KENDALI
DIGITAL

DEC
Digital Equipment Corp



PERANGKAT ANTARMUKA

- HPIB (Hewlett Packard)
- GPIB general purpose
- Standard : parallel port IEEE 488
- Serial RS-232

1980

Microcontroller

- * CPU
- * Memory < ROM < RAM
- * Interface → PORT

* ADC & DAC

Pengendali

Pengolah Isyarat

Texas Instruments TM5320

- Intel 8030
- 8050
- Motrola 68000
- 65XX

PLC

1990

Jaringan Komputer

Web-based Control

ATMega ^{Bahasa Pemrograman}

Protocol → TCP/IP