Embedded Linux System



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CH1 Introduction to Embedded System

- →嵌入式系統 定義
- ▶ 嵌入式系統 相關知識
 - SOC: ARM, MIPS, PowerPC ...
 - >> 週邊設備:Flash, eMMC, I2C, I2S,
- ▶嵌入式作業系統 基本原理
- ▶開發版 NanoPi-M4 介紹
- ▶外掛模組介紹:
 - >> 溫溼度模組,亮度模組...
- >學習建立 嵌入系統開發環境







To know RockPi4B EVK









CH4 Basic Software And Tool

- **S**GPL
- Tool
 - → Develop Tool
 - → Video and Audio Tool
 - → WiFi and Ethernet
 - → Build Code Tool



CH5 Cross-compile Toolchain

- >> How to Cross-compile with Toolchain
- Create a Linux library to use



- To know Bootloader
- How to U-boot
- Detail into U-boot



CH7 Embedded Linux Kernel

- > How to build Linux kernel
- How to scale Linux kernel
- To know Linux kernel something





- To know RootFS in embedded system
- > How to create a RootFS with Buildroot





- > To know Linux user land
- > To know user land application
- How to control device on the Linux user land





- > To know Linux device driver
- > How to build a Linux device driver
- > How to install/remove a device driver