Release Notes

Eclipse Update for Freescale Kinetis SDK 1.0.0-GA

Introduction

To use the Kinetis SDK with Eclipse and Processor Expert, this updated needs to be installed into Eclipse (e.g. Kinetis Design Studio or Processor Expert Driver Suite). Otherwise both 'New Project Wizard' and Processor Expert will not know about the devices present and supported in the Kinetis SDK.

The following Eclipse environments are applicable:

- Kinetis Design Studio V1.1
- Processor Expert Driver Suite V10.4 with Update V10.4.1

With the installation of this update, the 'New Project Wizard' will be enabled to use the Kinetis SDK for the devices supported, and Processor Expert components for the Kinetis SDK are added.

Installation

1. Launch Eclipse
2. Choose the menu Help > Install New Software...
3. Press the Add... Button in the dialog
4. In the next dialog, choose the 'Archive...' button and browse for the SDK_1.0.0-GA_Update_for_Eclipse.zip installation package file
5. Then go through the guided update process
6. At the end, you are asked to restart Eclipse

Product Content

- CPUs – Kinetis
  - MK22FN128xxx10, MK22FN256xxx12, MK22FN512xxx12
  - MK24FN1M0xxx12
  - MK63FN1M0xxx12,
  - MK64FN1M0xxx12, MK64FX512xxx12
  - MKV31F128xxx10, MKV31F256xxx12, MKV31F512xxx12

- SDK peripheral driver components
  - fsl_adc
  - fsl_can
  - fsl_clock_manager
  - fsl_dac
  - fsl_debug_console
  - fsl_dspi
  - fsl_edma
  - fsl_flextimer
  - fsl_gpio
  - fsl_hwtimer
  - fsl_interrupt_manager
  - fsl_i2c
  - fsl_lptmr
  - fsl_lpuart
  - fsl_mpu
  - fsl_os_abstraction

    - fsl_pdb
    - fsl_pit
    - fsl_rtc
    - fsl_sai
    - fsl_sdhc
    - fsl_uart
    - fsl_wdog

- HAL components
    - fsl_adc_hal
    - fsl_can_hal
    - fsl_dac_hal
    - fsl_dmamux_hal
    - fsl_dspi_hal
    - fsl_edma_hal
    - fsl_enet_hal
    - fsl_flextimer_hal
    - fsl_gpio_hal
    - fsl_i2c_hal
    - fsl_llwu_hal
    - fsl_lptmr_hal
    - fsl_lpuart_hal
    - fsl_mcg_hal
    - fsl_mpu_hal
    - fsl_osc_hal
    - fsl_pdb_hal
    - fsl_pit_hal
    - fsl_pmc_hal
    - fsl_port_hal
    - fsl_rcm_hal
    - fsl_rtc_hal
    - fsl_sai_hal
    - fsl_sdhc_hal
    - fsl_sim_hal
    - fsl_smc_hal
    - fsl_uart_hal
    - fsl_wdog_hal

- Peripheral Initialization components
    - Init_ADC_VAR0
    - Init_AIPS0_VAR0
    - Init_AIPS1_VAR0
    - Init_AXBS_VAR0
    - Init_CAN_VAR0
    - Init_CMT_VAR0
    - Init_CRC_VAR0
    - Init_DAC_VAR0
    - Init_DMAMUX_VAR0
    - Init_eDMA_VAR0
    - Init_ENET_VAR0
    - Init_EWM_VAR0
    - Init_FB_VAR0
    - Init_FMC_VAR1
    - Init_FTFL_VAR0
    - Init_FTM_VAR0
    - Init_GPIO_VAR0

        - Init_HSCMP_VAR0
        - Init_I2C_VAR0
        - Init_I2S_VAR1
        - Init_LLWU_VAR0
        - Init_LPTMR_VAR0
        - Init_MCM_VAR3
        - Init_MPU_VAR0
        - Init_NVIC_VAR1
        - Init_PDB_VAR0
        - Init_PIT_VAR0
        - Init_PMC_VAR0
        - Init_PORT_VAR0
        - Init_RCM_VAR0
        - Init_RNG_VAR1
        - Init_SCB_VAR0
        - Init_SDHC_VAR0
        - Init_SIM_VAR3
        - Init_SMC_VAR0
        - Init_SPI_VAR0
        - Init_SRTC_VAR0
        - Init_SysTick_VAR0
        - Init_UART_VAR0
        - Init_USB_OTG_VAR0
        - Init_USBDCD_VAR0
        - Init_VREF_VAR0
        - Init_WDOG_VAR0
        - PinSettings

- High Level components
    - MQX_KSDK
    - MQX_KSDK_Task

Known problems and limitations

- IAR workbench integration using ProjectInfo.xml: projects with SDK mcu's cannot be built in IAR Embedded Workbench

  Workaround: Define <device> symbol additionally in compiler>
- The MQX_KSDK component does not install ISRs for MQX_KSDK RTOS component - user needs to install it using OSA_InstallIntHandler. This problem will be resolved in SDK drivers in 1.1.0-GA release (Q4-2014).
- SDK components with timing item are able to work only with 16 configurations. Selection of more configurations may lead to unexpected behavior.
- SDK components with timing item: Timing setting is validated according to all configurations in a CPU component.(ENGR00320699).

  Workaround: Configure only 1 clock configuration in CPU component.
- Parameters auto-fill for component methods does not work for some DRV SDK components.
- Common links in html help of SDK components do not work.
- The 'View Code' command does not work for some methods.