

Table 34. Enhanced Pulse Width Modulator (ePWM) Module Type Description

Type	Description	Devices Covered	Device-Specific Options
0	Original EPWM Module Type	280x ⁽¹⁾ , 2801x	Time-base synchronization scheme 1: ePWM1 SYNC out is fed to eCAP1 and ePWM2. All other ePWM modules have their SYNCIN signals fed from the ePWM module numerically preceding them.
		2804x, 2809	Time-base synchronization scheme 2: Two ePWM pinouts are possible: A-channel only or 280x compatible. If the ePWM pinout is configured for A-channel only mode, ePWM1 SYNC out is fed to eCAP1, ePWM2, ePWM5, ePWM9, and ePWM13. All other ePWM modules have their SYNCIN signals fed from the ePWM module numerically preceding them. If the ePWM pinout is configured for 280x-compatible mode, synchronization scheme 1 is used.
		2823x, 2833x, 28234x	Time-base synchronization scheme 3: ePWM1 SYNC out is fed to eCAP1, ePWM2, and ePWM4. All other ePWM modules have their SYNCINs fed from the ePWM module numerically preceding them.
1	Doubled deadband resolution, interrupts and ADC SOC can be generated on both CTR = 0 or CTR = PRD, added digital compare submodule, added hooks for high-resolution period	2802x, 2803x, 2805x, 2806x	–
2	Expanded Register set, added High Resolution to Dead-band RED and FED, added Dead-band generator module enhancements, added HRPWM capability to ePWMxB channels, added enhancements to Counter Compare Module, Event Trigger Module, and Digital Compare Module. Supports Simultaneous writes to TBPRD and CMPx Registers, added Shadow to Active Load on SYNC of TBPRD and CMP registers.	M35x, M36x	–
3	This type is not used.	–	–
4	Remapped address space for ease of use, Added Delayed Trip functionality, Dead-band Generator Module enhancements, One shot and Global reload of Registers, Trip Zone Module Enhancements, and PWM SYNC related enhancements.	2807x, 2837xD, 2837xS	–

⁽¹⁾ The time-base synchronization scheme 1 is not available in the TMS320F2809 part.