A new procnto (procnto-900) variant is required to support the PPC 900 series family architecture on the IBM 970FX Target Platform and the PA Semi target Platform. SMP support is also included. Though the 900 series family is a 64-bit implementation of the PPC architecture, with 64-bit integer registers, at this time the context save/restore code in the kernel only preserves the low order 32-bits of the integer registers.

This includes development of startup code. Startup is the software component that gains control after the ROM Monitor executes. Startup will:

1. Include interrupt controller callouts, debug callouts, timer callouts and cache callouts;
2. Initialize the hardware (i.e. basic device initialization, the extent of which depends on the level of intialization done by the Boot loader before Startup is invoked;
3. Initialize the system page;
4. Initialize callouts; and,
5. Load and transfer control to the next program in the image (i.e. kernel)