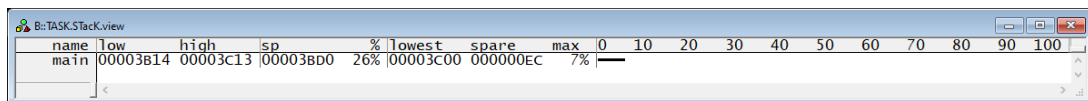


Is it possible to calculate the stack usage for a bare-metal application?

2023-10-24 - Comments (0) - TRACE32 PowerView

Here it is an example that can be tested on the TRACE32 Instruction Set Simulator for Arm:



name	low	high	sp	% lowest	spare	max	0	10	20	30	40	50	60	70	80	90	100
main	00003B14	00003C13	00003BD0	26%	00003C00	000000EC	7%										

RESet

SYStem.RESet

SYStem.CPU CortexA9

SYStem.Up

DO ~/~/demo/arm/compiler/gnu-pic/demo_sieve

; initialize the stack with a specific pattern

; use section .stack here

Data.Set sYmbol.SECRANGE(.stack) %Byte 0xa5

Go main\1

WAIT !STATE.RUN()

; add stacks manually

TASK.STAcK.PATtern %Byte 0xa5

TASK.STAcK.view

; use any number as "task" identifier, e.g. here 0x100

TASK.STAcK.ADD 0x100 sYmbol.SECRANGE(.stack)

; possibly add more stacks: TASK.STAcK.ADD

; [optional] set a name:

TASK.NAME.Set 0x100 "main"