

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	
<i>0x00100204</i>	
<i>0x00100208</i>	
<i>0x0010020C</i>	

Branch Table

<i>0x00100300</i>	
<i>0x00100304</i>	
<i>0x00100308</i>	
<i>0x0010030C</i>	

ARM Binary (shown disassembled)

<i>0x00100400</i>	
<i>0x00100404</i>	
<i>0x00100408</i>	
<i>0x0010040C</i>	
<i>0x00100410</i>	
<i>0x00100414</i>	

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	
<i>0x00100208</i>	
<i>0x0010020C</i>	

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	
<i>0x00100308</i>	
<i>0x0010030C</i>	

ARM Binary (shown disassembled)

<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	
<i>0x00100408</i>	
<i>0x0010040C</i>	
<i>0x00100410</i>	
<i>0x00100414</i>	

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	<code>0x00100404</code>
<i>0x00100208</i>	
<i>0x0010020C</i>	

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	<code>0</code>
<i>0x00100308</i>	
<i>0x0010030C</i>	

ARM Binary (shown disassembled)

<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	<code>SUB R3, R4, -1</code>
<i>0x00100408</i>	
<i>0x0010040C</i>	
<i>0x00100410</i>	
<i>0x00100414</i>	

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	<code>0x00100404</code>
<i>0x00100208</i>	<code>0x00100408</code>
<i>0x0010020C</i>	

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	<code>0</code>
<i>0x00100308</i>	<code>0x0010020C</code>
<i>0x0010030C</i>	

ARM Binary (shown disassembled)

<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	<code>SUB R3, R4, -1</code>
<i>0x00100408</i>	<code>CMP R4, R0</code>
<i>0x0010040C</i>	<code>BGE 0</code>
<i>0x00100410</i>	
<i>0x00100414</i>	

first pass

second pass

Branch table row: $0x00100208 + 0x04 = 0x0010020C$

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

Branch table row: $0x0010020C - 0x08 = 0x00100204$

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

ARM branch address: *0x00100408* + *0x04*

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	<code>0x00100404</code>
<i>0x00100208</i>	<code>0x00100408</code>
<i>0x0010020C</i>	<code>0x00100410</code>

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	<code>0</code>
<i>0x00100308</i>	<code>0x0010020C</code>
<i>0x0010030C</i>	<code>0x00100204</code>

ARM Binary (shown disassembled)

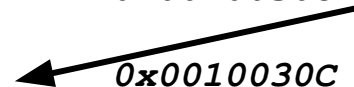
<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	<code>SUB R3, R4, -1</code>
<i>0x00100408</i>	<code>CMP R4, R0</code>
<i>0x0010040C</i>	<code>BGE 0</code>
<i>0x00100410</i>	<code>CMP R3, R0</code>
<i>0x00100414</i>	<code>BEQ 0</code>

first pass

second pass

ARM branch address: *0x00100408* + *0x04*

ARM branch target: *0x00100410*



RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE 0
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

ARM branch address: $0x00100408 + 0x04$

ARM branch target: $0x00100410$

ARM branch offset: $0x00100410 - (0x00100408 + 0x04) - 0x08$

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE -0x04
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

ARM branch address: $0x00100408 + 0x04$ ARM branch target: $0x00100410$ ARM branch offset: $0x00100410 - (0x00100408 + 0x04) - 0x08 = -0x04$

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	<code>0x00100404</code>
<i>0x00100208</i>	<code>0x00100408</code>
<i>0x0010020C</i>	<code>0x00100410</code>

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	<code>0</code>
<i>0x00100308</i>	<code>0x0010020C</code>
<i>0x0010030C</i>	<code>0x00100204</code>

ARM Binary (shown disassembled)

<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	<code>SUB R3, R4, -1</code>
<i>0x00100408</i>	<code>CMP R4, R0</code>
<i>0x0010040C</i>	<code>BGE -0x04</code>
<i>0x00100410</i>	<code>CMP R3, R0</code>
<i>0x00100414</i>	<code>BEQ 0</code>

first pass

second pass

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE -0x04
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

ARM branch address: *0x00100410 + 0x04*

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	<code>addi t0, t0, 2</code>
<i>0x00100104</i>	<code>addi s0, s1, -1</code>
<i>0x00100108</i>	<code>bge s1, t0, 4</code>
<i>0x0010010C</i>	<code>beq s0, t0, -8</code>

RISC-V to ARM Table

<i>0x00100200</i>	<code>0x00100400</code>
<i>0x00100204</i>	<code>0x00100404</code>
<i>0x00100208</i>	<code>0x00100408</code>
<i>0x0010020C</i>	<code>0x00100410</code>

Branch Table

<i>0x00100300</i>	<code>0</code>
<i>0x00100304</i>	<code>0</code>
<i>0x00100308</i>	<code>0x0010020C</code>
<i>0x0010030C</i>	<code>0x00100204</code>

ARM Binary (shown disassembled)

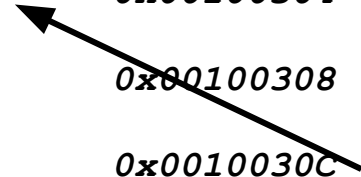
<i>0x00100400</i>	<code>ADD R0, R0, 2</code>
<i>0x00100404</i>	<code>SUB R3, R4, -1</code>
<i>0x00100408</i>	<code>CMP R4, R0</code>
<i>0x0010040C</i>	<code>BGE -0x04</code>
<i>0x00100410</i>	<code>CMP R3, R0</code>
<i>0x00100414</i>	<code>BEQ 0</code>

first pass

second pass

ARM branch address: *0x00100410* + *0x04*

ARM branch target: *0x00100404*



RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE -0x04
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ 0

first pass

second pass

ARM branch address: $0x00100410 + 0x04$

ARM branch target: $0x00100404$

ARM branch offset: $0x00100404 - (0x00100410 + 0x04) - 0x08$

RISC-V Binary (shown disassembled)

<i>0x00100100</i>	addi t0, t0, 2
<i>0x00100104</i>	addi s0, s1, -1
<i>0x00100108</i>	bge s1, t0, 4
<i>0x0010010C</i>	beq s0, t0, -8

RISC-V to ARM Table

<i>0x00100200</i>	0x00100400
<i>0x00100204</i>	0x00100404
<i>0x00100208</i>	0x00100408
<i>0x0010020C</i>	0x00100410

Branch Table

<i>0x00100300</i>	0
<i>0x00100304</i>	0
<i>0x00100308</i>	0x0010020C
<i>0x0010030C</i>	0x00100204

ARM Binary (shown disassembled)

<i>0x00100400</i>	ADD R0, R0, 2
<i>0x00100404</i>	SUB R3, R4, -1
<i>0x00100408</i>	CMP R4, R0
<i>0x0010040C</i>	BGE -0x04
<i>0x00100410</i>	CMP R3, R0
<i>0x00100414</i>	BEQ -0x18

first pass

second pass

ARM branch address: $0x00100410 + 0x04$ ARM branch target: $0x00100404$ ARM branch offset: $0x00100404 - (0x00100410 + 0x04) - 0x08 = -0x18$