```
addi $s1, $s0, -1  # j = i - 1

for2tst:slti $t0, $s1, 0  # reg $t0 = 1 if $s1 < 0 (j < 0)
    bne $t0, $zero, exit2 # go to exit2 if $s1 < 0 (j < 0)
    sll $t1, $s1, 2  # reg $t1 = j * 4
    add $t2, $a0, $t1  # reg $t2 = v + (j * 4)
    lw $t3, 0($t2)  # reg $t3 = v[j]
    lw $t4, 4($t2)  # reg $t4 = v[j + 1]
    slt $t0, $t4, $t3  # reg $t0 = 0 if $t4 \ge $t3
    beq $t0, $zero, exit2 # go to exit2 if $t4 \ge $t3
    beq $t0, $zero, exit2 # go to exit2 if $t4 \ge $t3
    ...
    (body of second for loop)
    ...
    addi $s1, $s1, -1  # j -= 1
    j for2tst  # jump to test of inner loop

exit2:
```

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Unn Fig. 2-46.