This is a trivial example of assembling and testing a program. It should work for anyone logged in to rabbit. It shows every keypress, even down to the ⤶ being used to show when I press ENTER. What I type is in **bold**, everything else came from the computer. This sample shows just entering a program, assembling it, and single stepping through it. For anything else, see the proper documentation.

```
$ pico testprog ⤶

        .makeexe ⤶

        load     ⤶
loop:   load     ⤶
        mul      ⤶
        inc      r1 ⤶
        jump     loop  ⤶
⤶
$ assemble testprog ⤶
$ emulator testprog ⤶
No 'system.setup' in currecnt directory, reading '/usr/local/bin/system.setup'
instead
disc 1 from file 'maindrive disc', 6000 blocks
set SP to 0x80000000
set PC to 0x00000400
load file 'testprog.exe' starting at 0x00000400
> ⤶
   R0 = 0           R4 = 0           R8 = 0           R12= 0
   R1 = 0           R5 = 0           R9 = 0           SP = 0x80000000
   R2 = 0           R6 = 0           R10= 0           FP = 0x00000000
   R3 = 0           R7 = 0           R11= 0           PC = 0x00000400
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000400: (02100001)   LOAD    R1, 1   > ⤶

   R0 = 0           R4 = 0           R8 = 0           R12= 0
   R1 = 1           R5 = 0           R9 = 0           SP = 0x80000000
   R2 = 0           R6 = 0           R10= 0           FP = 0x00000000
   R3 = 0           R7 = 0           R11= 0           PC = 0x00000401
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000401: (02200022)   LOAD    R2, 34   > ⤶

   R0 = 0           R4 = 0           R8 = 0           R12= 0
   R1 = 1           R5 = 0           R9 = 0           SP = 0x80000000
   R2 = 34          R6 = 0           R10= 0           FP = 0x00000000
   R3 = 0           R7 = 0           R11= 0           PC = 0x00000402
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000402: (10120000)   MUL     R1, R2   > ⤶

   R0 = 0           R4 = 0           R8 = 0           R12= 0
   R1 = 34          R5 = 0           R9 = 0           SP = 0x80000000
   R2 = 34          R6 = 0           R10= 0           FP = 0x00000000
   R3 = 0           R7 = 0           R11= 0           PC = 0x00000403
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM
```

```
00000403: (08010000)   INC     R1    > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 35           R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000404
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM
   PC-4 = 0x000

00000404: (320F        4    > ⏎

   R0 = 0                              R8 = 0            R12= 0
   R1 = 35                             R9 = 0            SP = 0x80000000
   R2 = 34                             R10= 0            FP = 0x00000000
   R3 = 0                              R11= 0            PC = 0x00000401
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000401: (02200022)   LOAD    R2, 34   > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 35           R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000402
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000402: (10120000)   MUL     R1, R2   > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 1190         R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000403
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000403: (08010000)   INC     R1    > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 1191         R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000404
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM
   PC-4 = 0x00000401 = 1025

00000404: (320FFFFC)   JUMP    PC-4   > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 1191         R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000401
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000401: (02200022)   LOAD    R2, 34   > ⏎

   R0 = 0            R4 = 0            R8 = 0            R12= 0
   R1 = 1191         R5 = 0            R9 = 0            SP = 0x80000000
   R2 = 34           R6 = 0            R10= 0            FP = 0x00000000
   R3 = 0            R7 = 0            R11= 0            PC = 0x00000402
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM
```

```
00000402: (10120000)   MUL    R1, R2    > ↵

   R0 = 0         R4 = 0         R8 = 0         R12= 0
   R1 = 0x00009E2E   R5 = 0      R9 = 0         SP = 0x80000000
   R2 = 34        R6 = 0         R10= 0         FP = 0x00000000
   R3 = 0         R7 = 0         R11= 0         PC = 0x00000403
   FLAGS = 0x000          R SYS IP ~VM

00000403: (0801              > ↵

   R0 = 0                        R8 = 0         R12= 0
   R1 = 0x00009           R9 = 0         SP = 0x80000000
   R2 = 34                       R10= 0         FP = 0x00000000
   R3 = 0                        R11= 0         PC = 0x00000404
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM
   PC-4 = 0x00000401 = 1025

00000404: (320FFFFC)  JUMP   PC-4    > ↵

   R0 = 0         R4 = 0         R8 = 0         R12= 0
   R1 = 0x00009E2F   R5 = 0      R9 = 0         SP = 0x80000000
   R2 = 34        R6 = 0         R10= 0         FP = 0x00000000
   R3 = 0         R7 = 0         R11= 0         PC = 0x00000401
   FLAGS = 0x00000031: R ~Z ~N ~ERR SYS IP ~VM

00000401: (02200022)  LOAD   R2, 34   > [control-c]
> [control-c]
> [control-c]
$ ls -l testprog* ↵
-rw-r--r--  1 sratbag  class   81 Sep 21 17:34 testprog.ass
-rw-r--r--  1 sratbag  class   20 Sep 21 17:34 testprog.exe
$
```