CICLO DE BUSCA

t1: MAR <- (PC) t1: 0110000000000000000001000000 0000 00 00 0000

ULA <- (PC)

t2: memória <- (MAR) t2: 0000000000000000000000010010 0000 10 00 0000

t3: MBR <- (memória) t3: 1000000000000000000000100101 0000 01 00 0000

PC <- (ULA)

t4: IR <- (MBR) t4: 0000100000000100000000000000 0000 00 00 0000

CICLOS DE EXECUÇÃO

ADD S1, S2, S3 (REGISTRADOR COM REGISTRADOR)

t1: ULA <- (S3) t1: 0000000000100000000010000000 0000 00 00 0000

t2: ULA <- (S2) t2: 0000000010000000000010000000 0000 00 00 0000

t3: ULA <- (S1) t3: 0000001000000000000010000000 0101 00 00 0000

t4: S1 <- (ULA) t4: 0000010000000000000001000000 0000 00 00 0000

ADD S1, S2, X (REGISTRADOR COM CONSTANTE)

t1: MBR <- (memória) t1: 1000000000000000000000100101 0000 01 00 0000

t2: ULA <- (MBR) t2: 0000100000000000000010000000 0000 00 00 0000

t3: ULA <- (S2) t3: 0000000010000000000010000000 0000 00 00 0000

t4: ULA <- (S1) t4: 0000001000000000000010000000 0101 00 00 0000

t5: S1 <- (ULA) t5: 0000010000000000000001000000 0000 00 00 0000

SUB S1, S2, S3 (REGISTRADOR COM REGISTRADOR)

t1: ULA <- (S3) t1: 0000000000100000000010000000 0000 00 00 0000

t2: ULA <- (S2) t2: 0000000010000000000010000000 0000 00 00 0000

t3: ULA <- (S1) t3: 0000001000000000000010000000 0110 00 00 0000

t4: S1 <- (ULA) t4: 0000010000000000000001000000 0000 00 00 0000

SUB S1, S2, X (REGISTRADOR COM CONSTANTE)

t1: MBR <- (memória) t1: 1000000000000000000000100101 0000 01 00 0000

t2: ULA <- (MBR) t2: 0000100000000000000010000000 0000 00 00 0000

t3: ULA <- (S2) t3: 0000000010000000000010000000 0000 00 00 0000

t4: ULA <- (S1) t4: 0000001000000000000010000000 0110 00 00 0000

t5: S1 <- (ULA) t5: 0000010000000000000001000000 0000 00 00 0000