(2) entrée $\mathcal{P}_{A_0} = r$, $\mathcal{P}_{A_1} = s$ } poly — conserve A0/A1

sortie 1°] si $r = s$ ou si $d = pgcd(r,s) =$ Cte — ne pas rien — EQ vrai

2°] si $d \neq$ cte et $r \neq s$ pour: A2 r_F | A3 s_F — NE vrai

$r_F = \lambda f_1^{\alpha_1} \cdots f_m^{\alpha_m}$

$s_F = \mu f_1^{\beta_1} \cdots f_m^{\beta_m}$

$f_1 \cdots f_m$ premiers entre-eux

```
XREDPP: BSR   XCMPP1
        BEQ   KJ78      → rts si P_A0 = P_A1
        BSR   XGCD      P_A2 = pgcd(r,s) = d
        TST.L (A2)                          [d]
        BNE   KJ79
        MOVE.L A2,A6    ↓ d = cte
KJ78 :  RTS
KJ79 :  MOVEM.L A0-A2 ,-(SP)
        MOVE.L A2,A1    P_A1 = d
        BSR   XCTDIV    P_A2 = r' = r/d     [r/d]
        MOVE.L A2,A0    P_A0 = r', P_A1 = d
        BSR   XREDPP
        BNE   KJ80
        MOVE.L 4(SP),A0 P_A0 = s  P_A1 = d
        MOVEM.L A2/A3,-(SP)
        BSR   XCTDIV    P_A2 = s/d          [s/d]
        MOVE.L A2,A1
        MOVE.L (SP)+,A0 P_A1 = s/d  P_A0 = d
        MOVEQ #1,D0     α = 1
        BSR   XREDPF
        BSR   XPSAF
        MOVE.L 8(SP),A0 (d)
        MOVEM.L A0/A2,-(SP)
        BSR   XPSAF
        MOVE.L A2,A3
        MOVEM.L (SP)+,A1/A2
                  d   (r/d)_F
```

A2 $(r/d)_F$ | A3 d_F

A2 D_F | A3 S_F

A2 $(r/d)_F$ | A3 d_F

[r] [s] [d]

```
KJ80: MOVE.L  4(SP),A0      P_A0=s  P_A1=d
      MOVEM.L A2/A3,-(SP)
      BSR     XCTDIV        } P_A1 = s/d
      MOVE.L  A2,A1
      MOVEM.L (SP),D0/A0    var_A0 = d_F
      MOVEQ #1,D0           x=1
      BSR     XREDPF
      MOVE.L  A2,A0         D_F
      MOVEM.L (SP)+,A1/A2   var_A1 = (r/d)_F
      MOVE.L  A3,-(SP)
      BSR     XCONCP
      MOVE.L  (SP)+,A1      var_A1 = (s/d)_F
      MOVEM.L A2/A6,-(SP)
      BSR     XCONCP
      MOVE.L  A6,A3
      MOVEM.L (SP)+,A2/A6
      MOVE.L  8(SP),A0
      BSR     XLB76
      MOVE.L  A3,A6
      MOVE.L  A0,A3
      BSR     XLB76
      MOVEM.L (SP)+,A0/A1/A2
      MOVEQ #1,D0
      RTS
```