```
D:\Python\Python\setroute\python.exe "D:\Python\Pycharm\setroute\PyCharm Community Edition 2021.2.3\plugins\python-ce\helpers\pydev\pydevconsole.py" --
       mode=client --port=52350
  2
  3
       import sys; print('Python %s on %s' % (sys.version, sys.platform))
       6
       PyDev console: starting.
  8 Python 3.9.7 (tags/v3.9.7:1016ef3, Aug 30 2021, 20:19:38) [MSC v.1929 64 bit (AMD64)] on win32
       main_ECCG_deterministic.py', wdir='E:/1 0000/3 00000/1 0000000/1 0000000/1 000000/1 LW_00001/4 0000/3 python_code/
10 Backend TkAgg is interactive backend. Turning interactive mode on.
11
       Waiting 5s.....
       Optimize the ./R 9 5.xlsx instance by ECCG for deterministic model
13
14
15
       Set parameter MIPGap to value 0.01
                Master protblem status = 2, is Optimal and MP obj = 346.0
16
       The initial lb = -inf
                                                   ub = inf
17
18
19
       The current iteration cnt = 0
20
                 The SP model was solved Optimal 2 and SPObj = 346.0
                Deterministic Sub problem Status= 2, is Optimal
21
22
                Master protblem status = 2, is Optimal
                                                             ub = 574.0
                 MPObj = 574.0 MP_delete_Hua_Obj = 346.0
24
                                                                                                                   Hua = 228.0
                                                                                                                                                   SPObi = 346.0
                                                                                                                                                                                   MP SP Obj = 228.0
                                                                                                                                                                                                                                        Deter SP Obj = 228.0
25
26
       ub - 1b = 0.0
27
28 Iteration cycle stopped by termination criterion 1: Because ub - lb \le eps, the iteration stop, and cnt = 0
29
             i: 0.0 1_i: 7.0 p_i: 19.0 aI_i: 29.0
                                                                                             sol_a_i: 29.0 sol_g_i: 0.0 d_i: 41.0 sol_taoi: 29.0 sol_deltai: 41.0 sol_deltai - sol_taoi: 12.0 sol_taoP
           29.0 sol_deltaP: 31.0 sol_deltaP - sol_taoP: 2.0 cl_i: 2998254.0 sol_c_i: 2998254.0 sol_gp_i: 0.0 total work: 3163728.0 wasted work: 0.
       6276418200300405
30
            i: 1.0 1_i: 5.0 p_i: 0.0 aI_i: 62.0
                                                                                     sol_a_i: 62.0 sol_g_i: 0.0 d_i: 72.0 sol_taoi: 62.0 sol_deltai: 72.0 sol_deltai - sol_taoi: 10.0 sol_taoP:
                    sol deltaP: 67.0 sol deltaP - sol taoP: 5.0 cI i: 2572578.0
                                                                                                                                               sol c i: 2572578.0 sol gp i: 0.0 total work: 2636440.0 wasted work: 0.
       2422281561499598
                                                                                         sol_a_i: 12.0 sol_g_i: 0.0 d_i: 29.0 sol_taoi: 12.0 sol_deltai: 29.0 sol deltai - sol taoi: 17.0 sol taoP:
            i: 2.0 l_i: 4.0 p_i: 5.0 aI_i: 12.0
        12.0 sol_deltaP: 17.0 sol_deltaP - sol_taoP: 5.0 cI_i: 4442483.0
                                                                                                                                             sol_c_i: 4442483.0 sol_gp_i: 0.0 total work: 4481948.0 wasted work: 0.
        149690491723688
          i: 3.0 1_i: 5.0 p_i: 14.0 aI_i: 25.0 sol_a_i: 25.0 sol_g_i: 0.0 d_i: 47.0 sol_taoi: 25.0 sol_deltai: 47.0 sol_deltai - sol_taoi: 22.0 sol_deltai - sol_taoi: 22.0 sol_deltai - sol_taoi: 25.0 sol_delt
32
                                                                                           sol a i: 25.0 sol g i: 0.0 d i: 47.0 sol taoi: 25.0 sol deltai: 47.0 sol deltai - sol taoi: 22.0 sol taoP
       2876947702204488
                                                                                            sol a i: 20.0 sol g i: 0.0 d i: 41.0 sol taoi: 20.0 sol deltai: 41.0 sol deltai - sol taoi: 21.0 sol taoP
            i: 4.0 1_i: 7.0 p_i: 26.0 aI_i: 20.0
          20.0 sol_deltaP: 25.0 sol_deltaP - sol_taoP: 5.0 cl_i: 5290648.0 sol_c_i: 5290648.0 sol_gp_i: 0.0 total work: 6591100.0 wasted work: 4.
       932606090030496
            i: 5.0 l_i: 6.0 p_i: 14.0 al_i: 2.0
                                                                                             sol_a_i: 2.0 sol_g_i: 0.0 d_i: 21.0 sol_taoi: 2.0 sol_deltai: 19.0 sol_deltai - sol_taoi: 17.0 sol_taoP: 2
                sol_deltaP: 5.0 sol_deltaP - sol_taoP: 3.0 cl_i: 4218868.0 sol_c i: 4218868.0 sol_gp_i: 0.0 total work: 6327456.0 wasted work: 7.
       9978607516196085
                                                                                         sol\_a\_i: 7.0 \quad sol\_g\_i: 0.0 \quad d\_i: 27.0 \quad sol\_taoi: 7.0 \quad sol\_deltai: 27.0 \quad sol\_deltai: 27.0 \quad sol\_deltai: 27.0 \quad sol\_taoi: 20.0 \quad sol\_taoP: 7.0 \quad sol\_deltai: 27.0 \quad sol\_deltai: 27.
35
             i: 6.0 1_i: 5.0 p_i: 9.0 aI_i: 7.0
             sol deltaP: 12.0
                                               sol_deltaP - sol_taoP: 5.0 cl_i: 5106454.0 sol_c_i: 5106454.0 sol_gp_i: 0.0 total work: 5272880.0 wasted work: 0.
       6312527499203472
            i: 7.0 1_i: 6.0 p_i: 20.0 aI_i: 7.0
                                                                                              sol_a_i: 7.0 sol_g_i: 0.0 d_i: 26.0 sol_taoi: 7.0 sol_deltai: 25.0 sol_deltai - sol_taoi: 18.0 sol_taoP: 7
36
                 sol deltaP: 13.0 sol_deltaP - sol_taoP: 6.0 cI_i: 4675387.0 sol_c_i: 4675387.0 sol_gp_i: 0.0 total work: 5009236.0 wasted work: 1.
       2662871144422023
            i: 8.0 1 i: 5.0 p i: 0.0 aI i: 22.0
                                                                                         sol a i: 22.0 sol g i: 0.0 d i: 46.0 sol taoi: 22.0 sol deltai: 45.0 sol deltai - sol taoi: 23.0 sol taoP:
37
                     sol_deltaP: 28.0 sol_deltaP - sol_taoP: 6.0 cI_i: 5916411.0 sol_c_i: 5916411.0 sol_gp_i: 0.0 total work: 6063812.0 wasted work: 0.
        5590910470179484
       Time: 88.000000
39
40
41
42
```