Physical Energy

There was given total physical energy H and total distance D. Five pace information speed and corresponding physical energy was given. Find the minimum time that is required in order to complete total distance D making sure that some of the physical energy does not exceed H.

Initially you have H amount of energy and D distance to travel. You may travel

with any of the given 5 speeds. But you may only travel in units of 1 km. For

each km distance traveled; you will spend corresponding amount of energy.

e.g., the given speeds are:

Cost of traveling 1 km: [4, 5, 2, 3, 6]

Time taken to travel 1 km: [200, 210, 230, 235, 215]

Find minimum time required to cover total D km with remaining H >= 0

1 <= H <= 4000

1 <= D <= 1000

Input:

14 6 5

4 200

5 210

2 230

3 235

6 215

Output:

1090