1710. Maximum Units on a Truck

You are assigned to put some amount of boxes onto **one truck**. You are given a 2D array `boxTypes`, where `boxTypes[i] = [numberOfBoxesi, numberOfUnitsPerBoxi]`:

- `numberOfBoxesi` is the number of boxes of type `i`.
- `numberOfUnitsPerBoxi` is the number of units in each box of the type `i`.

You are also given an integer `truckSize`, which is the **maximum** number of **boxes** that can be put on the truck. You can choose any boxes to put on the truck as long as the number of boxes does not exceed `truckSize`.

Return *the **maximum** total number of **units** that can be put on the truck.*

Example 1:

Input: boxTypes = [[1,3],[2,2],[3,1]], truckSize = 4
Output: 8
Explanation: There are:
- 1 box of the first type that contains 3 units.
- 2 boxes of the second type that contain 2 units each.
- 3 boxes of the third type that contain 1 unit each.
You can take all the boxes of the first and second types, and one box of the third type.
The total number of units will be = (1 * 3) + (2 * 2) + (1 * 1) = 8.

Example 2:

Input: boxTypes = [[5,10],[2,5],[4,7],[3,9]], truckSize = 10
Output: 91

```python
def maximumUnits(self, boxTypes: List[List[int]], truckSize: int) -> int:
        boxTypes = sorted(boxTypes,key=lambda x:(-x[1],x[0]))
        cost = 0
        for number,units in boxTypes:
            if truckSize>0:
                if number<=truckSize:
                    cost = cost+number*units
                    truckSize=truckSize-number

                else:
                    cost = cost+truckSize*units
```

```
            truckSize=truckSize-number
    return cost
```