

1499. Max Value Of Equation

You are given an array `points` containing the coordinates of points on a 2D plane, sorted by the `x`-values, where `points[i] = [xi, yi]` such that $x_i < x_j$ for all $1 \leq i < j \leq \text{points.length}$. You are also given an integer `k`.

Return *the maximum value of the equation* $y_i + y_j + |x_i - x_j|$ where $|x_i - x_j| \leq k$ and $1 \leq i < j \leq \text{points.length}$.

It is guaranteed that there exists at least one pair of points that satisfy the constraint $|x_i - x_j| \leq k$.

Example 1:

Input: `points = [[1,3],[2,0],[5,10],[6,-10]]`, `k = 1`

Output: 4

Explanation: The first two points satisfy the condition $|x_i - x_j| \leq 1$ and if we calculate the equation we get $3 + 0 + |1 - 2| = 4$. Third and fourth points also satisfy the condition and give a value of $10 + -10 + |5 - 6| = 1$.

No other pairs satisfy the condition, so we return the max of 4 and 1.

Example 2:

Input: `points = [[0,0],[3,0],[9,2]]`, `k = 3`

Output: 3

Explanation: Only the first two points have an absolute difference of 3 or less in the `x`-values, and give the value of $0 + 0 + |0 - 3| = 3$.

Constraints:

- $2 \leq \text{points.length} \leq 10^5$
- `points[i].length == 2`
- $-10^8 \leq x_i, y_i \leq 10^8$
- $0 \leq k \leq 2 * 10^8$
- $x_i < x_j$ for all $1 \leq i < j \leq \text{points.length}$
- x_i form a strictly increasing sequence.