class Solution:

def searchMatrix(self, matrix: List[List[int]], target: int) -> bool:

n=len(matrix)-1

m=len(matrix[0])-1

row=0

col=m

while row<=n and col>=0:

if matrix[row][col]==target:

return True

elif matrix[row][col]<target:

row+=1

elif matrix[row][col]>target:

col-=1

return False