class Solution:

def addTwoNumbers(self, l1: Optional[ListNode], l2: Optional[ListNode]) -> Optional[ListNode]:

dummy = ListNode()

res = dummy

total = carry = 0

while l1 or l2 or carry:

total = carry

if l1:

total += l1.val

l1 = l1.next

if l2:

total += l2.val

l2 = l2.next

num = total % 10

carry = total // 10

dummy.next = ListNode(num)

dummy = dummy.next

return res.next