Problem 8

Let’s assume equivalent cards will have same account number

A 🡨 list of cards with account numbers

Def equivalence(A)

IF len(A) == 0

Return -1

IF len(A) == 1

Return A[0]

IF len(A) == 2 and A[0] == A[1]

Return A[0]

ELIF len(A) == 2 and A[0] != A[1]

Return -1

n\_half = floor{len(A)/2}

A1 = equivalence(A[0,1,2….n\_half]): // first half of the list

A2 = equivalence(A[n\_half+1, ….n]): // second half of list

IF A1 == A2:

Return A1

count\_A1 = 0

count\_A2 = 0

FOR i in range(len(A)):

IF A[i] == A1:

count\_A1 ++

ELIF A[i] == A2:

count\_A2 ++

IF count\_A1 > n\_half + 1:

Return A1

ELIF count\_A2 > n\_half + 1:

Return A2

ELSE:

Return -1