The ***enumerate()*** function retrieves both the index and corresponding element value at the same time, providing a cleaner and more readable solution.

Example of using for loop with range() and len() to iterate over a sequence which generates a position index.

Text

Description automatically generated with medium confidenceorigins = [4, 8, 10]

for index in range(len(origins)):

value = origins[index] # Retrieve value of element in list.

print(f'Element {index}: {value}')

Text

Description automatically generated with medium confidenceorigins = [4, 8, 10]

for value in origins:

index = origins.index(value) # Retrieve index of value in list

print(f'Element {index}: {value}')

The ***enumerate()*** function retrieves both the index and corresponding element value at the same time, providing a cleaner and more readable solution.

Text

Description automatically generated with medium confidenceorigins = [4, 8, 10]

for (index, value) in enumerate(origins):

print(f'Element {index}: {value}')

Text

Description automatically generatedseasons = ['winter', 'spring', 'summer', 'fall']

for (position, season) in enumerate(seasons):

print(f'{position} {season}')