**Rust Assessment 2**

**Q-1 Vector is similar to dynamic array. The vector size may grow at run time. Answer the**

**following questions for the given code:**

1. **Where the vector will be stored: on heap or stack ?**
2. **Does the following code work ? Give reason.**

|  |
| --- |
| fn sum(vector: Vec<i32>) -> i32 {  let mut sum = 0;  for item in vector {  sum = sum + item  }  sum  }  fn main() {  let v = vec![1,2,3];  let s = sum(v);  println!("sum of {:?}: {}", v, s);  } |

1. **Is it copy or move ?**

**Q-2 Answer the following questions for the given code:**

1. **Where the a and b will be stored: on heap or stack ?**
2. **Does the following code work ? Give reason.**
3. **Is it copy or move ?**

|  |
| --- |
| fn sum(left: i32, right: i32) -> i32 {  left + right  }  fn main() {  let a = 42;  let b = 1;  let s = sum(a, b);  println!("this sum of {} and {} is {}", a, b, s); // no error!  } |