

Meta Linguistic Abstractions (Part 2)

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Have u come across a Type which acts like Value, even if it is a reference?

- ????

The Answer is

- String data type in Java/Csharp

Why it is so?

- Most frequently used data type
- In place mutation, will make it less thread friendly
- The Solution is to make the type Obey “Value Semantics”

What exactly goes on under the hood?

- When any Mutable Operation happens , a new Value is created

Who owns an Object in a Collection Class ?

- Collection class refers the Object (Strictly does not own it)
- Aliasing is not a Problem in Garbage Collected Languages
- In a language like C++, Ownership semantics has to be strictly defined
- The types has to obey Value Semantics

What will u call a Collection which owns the Objects stored in it?

- The Answer is “Container”
- In a Container class, the Objects needs to Obey Value Semantics and the Container Owns the Object

IS there any Container Class library?

- The C++ standard library (aka Standard Template Library)
- When we create a library, it is better that the contents of the Collection Obey Value semantics (no “in place” mutation)

Q&A

- If any!