## 9. \*Gladiator Inventory

As a gladiator, Peter has a cool **Inventory**. He loves to buy new equipment. You are given Peter’s inventory with all of his equipment -> **strings**, separated by whitespace.

You may receive the following **commands**:

* Buy {equipment}
* Trash {equipment}
* Repair {equipment}
* Upgrade {equipment}-{upgrade}

If you receive the **Buy command**, you should **add** the equipment at the last position in the inventory, but only if it isn't bought already.

If you receive the **Trash command**, **delete** the equipment if it exists.

If you receive the **Repair command**, you should **repair** the equipment if it exists and place it in the **last position**.

If you receive the **Upgrade command**, you should check if the equipment exists and **insert** after it the upgrade in the following format: "**{equipment}:{upgrade}"**.

### Input / Consrtaints

You will receive an **array of strings**. Each element of the array is a command.

* In the **first input element,** you will receive Peter's **inventory** – a sequence of equipment names, separated by space.

### Output

As **output**, you must print Peter's **inventory** on one line, **separated** by a space.

### Constraints

* The **command will always be valid.**
* The **equipment** and **Upgrade** will be strings and will contain any character, except **'-'**.
* Allowed working **time** / **memory**: **100ms** / **16MB**.

***Scroll down to see examples.***

### Examples

|  |  |  |
| --- | --- | --- |
| **Input** | **Output** | **Comment** |
| ['SWORD Shield Spear',  'Buy Bag',  'Trash Shield',  'Repair Spear',  'Upgrade SWORD-Steel'] | SWORD SWORD:Steel Bag Spear | We receive the inventory => SWORD, Shield, Spear  We Buy Bag => SWORD, Shield, Spear, Bag  Trash Shield => SWORD, Spear, Bag  Repair Spear => SWORD, Bag, Spear  We add Upgrade => SWORD, SWORD:Steel, Bag,Spear  We print the inventory. |
| ['SWORD Shield Spear',  'Trash Bow',  'Repair Shield',  'Upgrade Helmet-V'] | SWORD Spear Shield |  |