Question 1 (15 points):

```
1 # license-plate array
2 .data
3 plates:
4     .asciiz "GFC-906"
5     .asciiz "FNL-909"
6     .asciiz "BTP-610"
7     .asciiz "GTC-883"
8     .asciiz "KCH-135"
9     .asciiz "JCW-320"
10    .asciiz "MPV-591"
11    .asciiz "MZL-574"
```

Each null-terminated string in the figure above corresponds to an Alberta license plate number. All license plates have the same number of characters. The first string in the list corresponds to `plates[0]`

1. (**5 points**) Write the shortest sequence of MIPS instructions that places the address of the first character of `plates[3]` into register `$a0`.

2. (**5 points**) Assume that register `$a1` contains an unsigned integer value k. Write the shortest sequence of MIPS instructions that places the address of the first character of `plates[k]` in `$v0`.

3. (**5 points**) Write the shortest sequence of MIPS instructions that loads the third character of `plates[5]` (this is the "W" character) into `$t0`.