

```
1  #!/usr/bin/env ruby -w
2
3  require "yaml"
4
5  # An address book
6
7  def prompt(addresses)
8    menu = "
9    1. Look for someone
10   2. Enter some data
11   3. Show all entries
12   4. Getouttahere (quit)
13   "
14
15   loop do
16     puts menu
17
18     # Chomp is used all over the place in order to get rid of newline characters (\n)
19     input = gets.chomp
20
21     next if input == nil
22
23     case input
24     when '1'
25       look_for_someone(addresses)
26     when '2'
27       enter_data(addresses)
28     when '3'
29       show_all(addresses)
30     when '4'
31       puts "Writing stuff down..."
32       begin
33         File.open("addresses.yaml", "w") { |f| YAML.dump(addresses, f) }
34         puts "Done! See you later!"
35       rescue
36         puts "Uh oh... there's been a problem, so you might have lost some data."
37       end
38
39       exit
40     else
41       puts "Please select a command from the menu"
42     end
43   end
44 end
45
46 def look_for_someone(addresses)
47   puts "Who or what would you like to look for?"
48   query = gets.chomp
49
50   # Look for it directly (fastest, constant time lookup)
51
52   if addresses.has_key?(query)
53     result = addresses[query]
54   else
55
56     # We couldn't find a direct lookup, so just hunt through everything else
57     found_entries = addresses.select do |key, value|
58       key.downcase.include?(query.downcase) || value.downcase.include?(query.downcase)
59     end
60
61     if found_entries.empty?
62       puts "Sorry, I couldn't find anything that matches your request."
63     else
64       # We got something.
65       result = ""
66       found_entries.each do |key, value|
67         result << "#{key}\t#{value}\n"
68       end
69       puts result
70     end
71   end
72 end
73 end
```

```
74
75 def enter_data(addresses)
76   puts "I'm gonna need a name, and some other address-like stuff, ok?
77   It'll happen in two steps. Be cool."
78
79   puts "\nPlease enter a name (and hit <return> when you're done.)"
80   name = gets.chomp
81
82   puts "\nGreat. Now enter some address-data all on one line. (Hit <enter> when you're done.)"
83   address = gets.chomp
84
85   if addresses.has_key?(name)
86     puts "\nWhoa whoa whoa... We've already got that guy in here. Are you sure you want to overwrite that entry?
87   Enter 'yes' or 'no':"
88     if gets.include?('y')
89       puts "Alright, I wrote over the entry."
90       addresses[name] = address
91     else
92       puts "Ok, I didn't do anything."
93     end
94
95   else
96     # A fresh new entry
97     puts "Entry added:"
98     puts "#{name}\t#{address}"
99     addresses[name] = address
100  end
101 end
102
103 def show_all(addresses)
104   addresses.each do |key, value|
105     puts "#{key}\t#{value}"
106   end
107 end
108
109 begin
110   addresses = YAML.load_file("addresses.yaml")
111 rescue
112   puts "No address file found. This must be your first time."
113   addresses = {}
114 end
115
116 puts "Hi, this is an address book. What would you like to do?"
117
118 prompt(addresses)
119
```