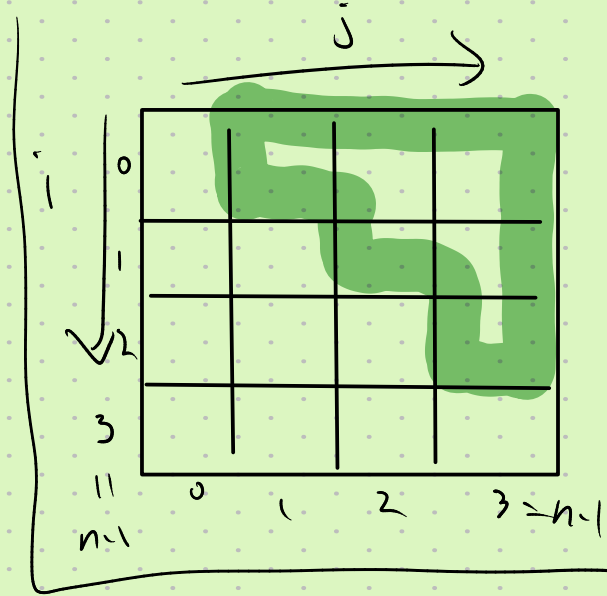


From last time: given vector V of integers + int t
 find indexes $i \neq j$ s.t. $V[i] + V[j] == t$.
 Idea: try everything (almost).

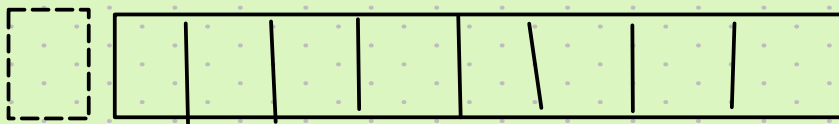
$$0 \leq i < j < n \quad (n = V.size())$$

Easy using for loops:

```
for (i = 0; i < n-1; i++) {
    for (j = i+1; j < n; j++) {
        // did (i,j) solve the problem?
        if (V[i] + V[j] == t)
```



Exercise: write a function "push-front" that
 adds a new value to the beginning of a vector.



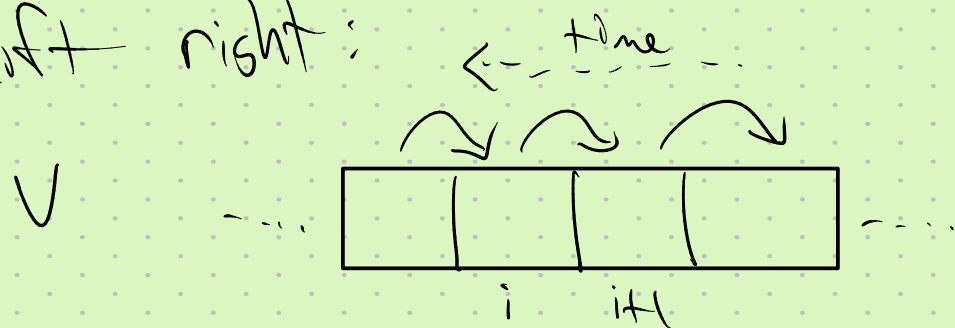
Can't just overwrite this.
 Some other variable might be there.

Strategy: shift all elements to the right by

one space, then add new element.

① Grow vector by 1. `push_back()` or `v.resize(n+1)`

② shift right:



$V[i+1] = V[i]$

③ Say x is the thing to add:
 $V[0] = x;$