Two Perfect Shuffles

What happens to the top card if you repeat a series of in ('i') and out ('o') shuffles?

"oo"
Two "out" shuffles in a row.

The top card ('A') moves to position 0.

Since an "out" shuffle leaves the top card in the top position, any number of repeated "out" shuffles leaves the top card intact.

"oi"
An "out" shuffle followed by an "in" shuffle.

The top card ('A') moves to position 1.

The top card doesn't start moving until you do your first "in" shuffle.

"io"
An "in" shuffle followed by an "out" shuffle.

The top card ('A') moves to position ________.

"ii"
Two "in" shuffles in a row.

The top card ('A') moves to position ________.