You may have seen the plus and minus signs and thought they would make the product real. The factors would need to be conjugates to result in a real product such as 97. Using FOIL shows that this is not the number 97.

$(4-9i)(9+4i) = (4)(9)+(4)(4i)-(9i)(9)-(9i)(4i) =$
$36+16i-81i-36i^2$

$= 36-65i-36(-1) = 36-65i+36 = 72-65i$