

# Complex numbers 004

Problem has been graded.

$$\frac{\mathbf{V}_1 + 4j}{j} - \frac{\mathbf{V}_1 + 4j}{cj} + \frac{\mathbf{V}_1}{-4j} + \frac{\mathbf{V}_1}{4} = 0$$

Find  $\mathbf{V}_1$  in cartesian coordinates, i.e., find  $a$  and  $b$ :

$$\mathbf{V}_1 = a + bj$$

Solve without a calculator

Given Variables:

$c : 2$ .

Calculate the following:

$a$  (.):

-4



$b$  (.):

-4



Hint: Solve in cartesian coordinates.