

Ministry of Education and Science of Ukraine

National Technical University "KhPI"

Educational and Scientific Institute of Computer Science and Informational Technology

Department of Computer Engineering and Programming

Course: *Programming. Part1*

REPORT on the laboratory work #8

Topic: *"One-Dimensional Array Exercises"*

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Task 8

Explanation

To implement functions that work with arrays.

Command performed

```
mkdir lab_08
cd lab_08
...
gcc main.c && ./a.out
```

Algorithm

1. Created directory and main file for the laboratory work.
2. Realized generate and print array functions.
3. Realized each functions in the order.

```
capy@capybara-pc > ~/programming-labs/lab_08 > lab_08 gcc main.c && ./a.out
31 2 -9 16 20 33 11 19
Count of even numbers in array: 3
First negative element in array: -9
Array rotated to the left:
2 -9 16 20 33 11 19 31
Sorted array by absolute value:
2 -9 11 16 19 20 31 33
Median of the sorted array: 17.50%
```

Tools

- OS: WSL Ubuntu
- Compiler: gcc
- Editor: VS Code