

Notes:

1. Read **ALL** of the given notes.
2. Save the program in a file named **zad.S**. This is the only file that will be reviewed.
3. Write your **name**, **last name** and **your index number (student ID)** as a comment at the beginning of the file. If you do not write this information, your solution will not be graded.
4. Solutions which fail to compile will be graded with **0** points.
5. Make sure to write comments.
6. Use the practicum from the directory *ispitni_materijali* (**do not** make a copy in your home directory).
7. You are not allowed to take a break during the test. Leaving the classroom means you have finished the test.
8. During the test, teaching assistants can only provide information about the text of the assignment and help with the usage of programming tools.
9. The zad.S file should contain only the code of the subroutine, **without the data section**. If more variables are needed, use local variables.
10. **The classroom is under video surveillance.**
11. The test lasts 2 hours and 15 minutes.

Assignment:

Write an assembly subroutine that sets certain bits of a 32-bit value to 1, while all other bits are 0. The first argument of the subroutine is the address of an array which contains not more than 32 integer values. Each element of this array is the index of a bit which should be set to 1. The second argument is an integer value equal to the length of the array. The subroutine returns a 32-bit value with corresponding bits set to 1.

Notes:

Assume that there are no duplicates in the array of indexes.

Assume that all the values of the array are in the range from 0 to 31.

These assumptions should not be checked in the code.

Examples:

Unesite duzinu niza (maksimalno 32): 8

Unesite elemente niza u decimalnom zapisu:

```
niz[0]=0  
niz[1]=1  
niz[2]=2  
niz[3]=3  
niz[4]=4  
niz[5]=5  
niz[6]=6  
niz[7]=7
```

Izlaz: 00000000 00000000 00000000 11111111

Unesite duzinu niza (maksimalno 32): 3

Unesite elemente niza u decimalnom zapisu:

```
niz[0]=7  
niz[1]=6  
niz[2]=5
```

Izlaz: 00000000 00000000 00000000 11100000

For more examples, run the provided test examples. Apart from the given test examples, the program will be tested with additional examples during grading, so the program should be tested with various inputs.

The maximum number of points on this test is 20.