## **Templates in functions**

Make a template operation *calculate\_sum* which takes two parameters of the same type, but can be any type) and returns the sum of the types.

Call it with int, string and a data class that you make. You will probably have to overload the + operator on that class.

Make a template operation *is\_sum\_higher\_than* which takes three parameters of the same type, a, b and compare. It returns true if the sum of a and b is higher than compare, otherwise false. You should simply allow the operators + and < on the types to decide what is higher and how the sum is calculated.

Call it with int, string and a data class that you make.

## Templates in classes

Make the class *MyPair* in its own .h file.

You should be able to construct an instance of MyPair with two parameters of two different types. They should become *first* and *second* in the class.

Implement the operations **get\_first**, **get\_second**, **set\_first** and **set\_second**. Set operations take a parameter (but are usually void, and return nothing) while get operations usually don't take a parameter but return the correct type of variable.