# Logbook

# 10/07/2021

I’ve decided to continue the development of the messaging application. The first goal is to re-work the message exchange to use symmetric (AES) encryption. This will pave the way for the implementation of file exchange, although how the file exchange will be implemented is yet to be decided.

Created new branch: Symmetric block

Current objective: implement symmetrically encrypted messages

## Later on

I decided that the client and server components were messy and would benefit from a refactor.

All networking will be moved away from client and server components and instead will reside in NetworkUtility. NetUtil is static and stateless, it is passed every object it needs in order handle transmission. This allows client and server components to focus on handling state rather than the details of how transmission are done.

Transmissions have been split into three categories (with send and receive for each one): plaintext, RSA and AES. It would be best to make all of these asynchronous, and now that they have been abstracted away it is much more feasible, I’ll spend some time experimenting, but for now I want to make move all networking functions as they are to NetworkingUtility, then I’ll consider making them asynchronous.

## Changes

Created NetworkUtility class  
Created NetWorkUtilityException (extends Exception)  
Moved networking code from ClientComp to NetworkUtility