

# Large Message Proxy

Team Unknown Pleasures





# How our LMP works

## 1. Sending

- a. Message to be sent is serialized using Kryo
- b. Byte message is sliced into chunks
- c. To each chunk, meta information is prepended [12 bytes total]
  - i. an id of the overall message
  - ii. a sequential chunk id
  - iii. the total number of chunks
- d. Each chunk is sent individually to the receiving proxy using the standard `receiverProxy.tell()` method

## 2. Receiving

- a. Receiver maintains a buffer of all incoming large messages, identified by their id
- b. Message id, chunk id and total number of chunks is read from message
- c. Message data is added to the message buffer corresponding to the extracted message id
- d. When all chunks have been received, read and buffered, the reassembled message is de-serialized using Kryo and sent to the original receiver