



English

Data compression and archiving - the 'need to zip'

When working with digital tools a large volume of data is generated. This data most often needs to be shared with our collaborators. The quickest and most accessible way to send something is attaching it to an email. However, some file formats are very space consuming and when they are attached to an email this might lead to long processing delays.

In mail-servers, due to the asynchronous nature of email, processing is performed sequentially. This means that a message with a very large attachment(s) will monopolise the server and delay processing of any messages that follow.

To economise on the attachment(s) size, you can create a compressed archive that will contain the attachment(s) in it. This is commonly referred to as 'zipping-up' the attachment(s). Zipping up means using another piece of software and performing some processing on the file(s) you want to send, so as to create a single file and reduce its size. Once the file is created you can attach it to the email and send it

Archiving

Sending one larger file instead of many smaller ones is sometimes preferable, possibly faster and can be made more secure. Archiving a collection of files or folders means creating a single file that groups together those files and directories. Archiving does not manipulate the size of files. They are added to the archive as they are.

Compressing

Sending a larger file does mean longer delays, so you need to reduce the size. Compressing a file means shrinking the size of the file to economize in transfer.

Software used

There are software for archiving only, other for compressing only and (as you would expect) other that have the ability to archive and compress. There is a large variety of software of performing either of the two or both of these operations. There are many proprietary (paid) software as well as many free software.

The Windows 10 operating system provides a very easy way to zip-up any file (or folder) you want by using a utility program called 7-zip (Seven Zip). The program is integrated in the context menu which appears when you right-click on anything selected. Other free software is bandzip (<https://en.bandsoft.com/bandzip>), peazip (<https://peazip.org>)