

Computational light scattering (PAP315)

Lecture 7b

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What you need for installing and running T-matrix code



 Linux/Mac/Windows+MSYS2 with GCC gfortran compile

T-matrix code, installation



- Go to course web page
- Download the three files tmdlp.f, lpd.f, lpd.f

- Compile with
 - gfortran -o tmat -O1 lpd.f tmd-lp.f

to get executable called "tmat"

T-matrix code, running



The code needs input parameters in a file. Download an example file default.in from the course page, as well as the article explaining the parameters

In the input file, there is always first a line with the parameter name, and then a line with its value.

- Run with the parameter file name as the argument:
 - ./tmat default.in
- Will produce files "test" and "tmatr.write"
- The file test contains the Mueller matrix of the scatterer