

Assignment 4

To be submitted on May 21, 2010 (Note new deadline)

Do Problem 7.10 in Loudon's book, that is, find the commutator

$$[\hat{a}_{k\lambda}(t), \hat{a}_{k'\lambda'}^\dagger(t)],$$

to second order in the constants $g_{k\lambda}$, using the expressions (7.7.2-4) in the book.

The solution should be submitted to Emil Lundh (lundh@tp.umu.se) no later than May 21, 15:00. If the solution is submitted electronically, I will only accept platform independent formats (pdf strongly recommended!). Answers on paper are of course also accepted.