PHY 5669: Quantum Field Theory B, Spring 2010

March 30^{th} , 2010Assignment # 5
(due Thursday April 15^{th} , 2010)

- 1. Problem 72.1 of Srednicki's book.
- 2. Problem 73.1 of Srednicki's book.
- 3. Problem 73.2 of Srednicki's book.
- 4. Problem 73.3 of Srednicki's book.
- **5.** Verify Eq. (73.2) of Sredniki's book at 1-loop (using the $\overline{\text{MS}}$ renormalization scheme).

Extra Projects

These are suggested extra projects that will not be graded, but could be very beneficial to HEP graduate students. There is no deadline and you are welcome to come and discuss them with me at any time.

1. Follow up on Sections 50 and 60 by reading Sections 80 and 81 and solving the problems in Section 81.