

## SS202 Aug 3:0

# **Introduction to Quantum Chemistry**

#### **Instructor**

Anshu Pandey Email: anshup@iisc.ac.in

#### **Teaching Assistant**

Email:

**Department: SSCU** 

Course Time:

Lecture venue:

Detailed Course Page:

#### **Announcements**

#### Brief description of the course

Entering Graduate students in Chemistry, Chemistry and Physics Undergraduates.

### **Prerequisites**

Understanding of Quantum Mechanics, Basic Mathematics

#### **Syllabus**

**Exact Solutions (revision)** 

Perturbation Theory(Time dependent and independent)

Hartree Fock Methods (Formalism and SCF procedure)

CI, MP

**DFT** 

Semiempirical Methods

#### **Course outcomes**

How quantum mechanics determines molecular shape; how molecular properties are computed.

### **Grading policy**

Typical: 10% Assignments, 20% Quizzes, 35% Midterm, 35% Endterm

# Assignments

#### Resources

Landau and Lifshitz

Schiff,

Cohen Tannoudji,

Szabo and Ostlund

Levine