

Assignment 1 – Preparation for Quiz 1 of Sept. 19/20

Material: Sections 1.1, 1.2 [only addition/scalar multiplication of vectors in \mathbb{R}^n , theorem 1 (including proof of properties) and subspace], 1.3 and 1.4 (only definition of projection and of orthogonal projection).

1- Practice Problems #1 in MapleTA

Most of these problems are similar to A-problems in the sections 1.1, 1.3 and 1.4.

The problems on 1.2 are limited as we will cover the concepts introduced in section 1.2 in the last week of terms (when by then you will be able to do the actual required computations): so, only try A2 on page 25 (in addition to the ones in MapleTA).

Access to MapleTA can be found on the homepage of the course website on LEARN, at the bottom of the Announcements. For any technical help using MapleTA, please contact MapleTA Support (click on the link which can be found on the left side of the homepage of the course website on LEARN under Faculty Links).

Reminder: the assignments do not need to be submitted, there are no marks attached to them. You have unlimited number of attempts on MapleTA and you will have access to assignments until the end of term (they are good review for midterm and final exam). It is strongly advised to do the MapleTA practice problems without help from textbook, calculator, etc when reviewing material any examination (quiz/midterm/exam): however, you may use MapleTA as a study tool by completing a question, clicking on “How did I do?” on the left side of your screen, check the solution, and then try again that same question without any help to make sure you did understand how to do that question.

2- Do the proof of theorem 1 in Section 1.2

3- Do the proof of theorem 1 (property (4)) and #D4 in section 1.3