## Homework 2 - Math 2568 (Spring 2020) Prof. Cueto

Due date: Friday January 24, 2020 (in class).

The sections and problem numbers refer to the course's textbook (L.W. Johnson, R.D. Riess, J.T. Arnold: *Introduction to Linear Algebra*, 5th edition, Pearson.)

Section	Assigned Problems	Problems to be turned in
$\S{1.3}$	1, 4, 6, 10, 14, 19, 21, 23, 26, 28	4,6,14,23,28
$\S{1.5}$	1, 8, 14, 22, 25, 29, 31, 34, 42, 48, 54, 68	8, 14, 25, 48, 68
§1.6	4, 7, 11, 13, 14, 20, 41, 42	4, 14, 20, 41, 42

**Extra Problem:** For what values of  $\lambda$  does the homogeneous  $2 \times 2$  linear system with coefficient matrix

$$A = \begin{pmatrix} \lambda - 4 & -1 \\ 2 & \lambda - 1 \end{pmatrix}$$

have infinitely many solutions? For those values of  $\lambda$ , write down the solutions to the system in vector form.