Vibrations & Control

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HW Set 3
Due 16 September 1999

1. Ogata, Problem B-3-9. Evaluate the effective damping for the case:

$$b_1 = 10\text{N}/(\text{m/s}), \quad b_2 = 20\text{N}/(\text{m/s}), \quad b_3 = 30\text{N}/(\text{m/s}).$$

2. Ogata, Problem B-3-10. Find the frequency (in Hz) for the case:

$$m = 10\text{kg}, \quad k_1 = 10\text{N/m}, \quad k_2 = 10\text{N/m}, \quad k_3 = 20\text{N/m}.$$

3. Ogata, Problem B-3-22