# CALCULUS-BASED PHYSICS-1: MECHANICS (PHYS150-01): WEEK 5

Jordan Hanson October 9th - October 13th, 2017

Whittier College Department of Physics and Astronomy

WEEK 5 REVIEW

#### **WEEK 5 REVIEW**

### 1. Friction

- · Normal force and friction
- · Static, kinetic

# 2. Drag

Terminal velocity

## 3. Restoring Forces

- · Hooke's Law
- · Young's modulus
- · Shear modulus
- · Bulk modulus

WEEK 5 REVIEW PROBLEM

## **WEEK 4 REVIEW PROBLEMS**

...

- A:
- B:
- C:
- D:

WEEK 6 SUMMARY

#### **WEEK 6 SUMMARY**

- 1. Angular kinematics
  - · Angular displacement
  - Angular velocity
  - · centripetal acceleration
- 2. Newton's Law of Gravity and circular orbits
- 3. Kepler's Laws



#### **WEEK 6 SUMMARY**

- 1. Angular kinematics
  - · Angular displacement
  - Angular velocity
  - · centripetal acceleration
- 2. Newton's Law of Gravity and circular orbits
- 3. Kepler's Laws

## **ANSWERS**

### **ANSWERS**

· ...