

# FORCES

pp331-332

## Force

- Force – an action on a body which changes a body's state of rest or motion
  - “a push or pull”
  - Has magnitude and direction
    - Like Velocity

## How is the Velocity Changing?



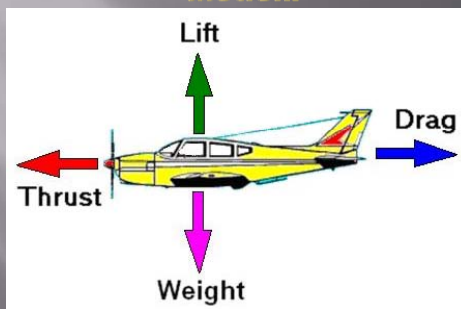
## What is making the velocity change?



## Forces Cause Change in Velocity



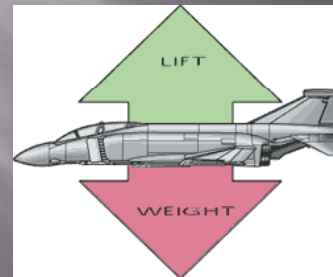
## Balanced Forces do NOT change motion.



### Balanced Forces can be Static



### OR Balanced Forces can move with Constant Velocity



### Unbalanced Forces

- Unbalanced forces do not cancel completely.
- If the forces are not balanced, the object's motion will change.
  - Rest to not rest
  - Speed up
  - Slow down
  - Motion to rest

