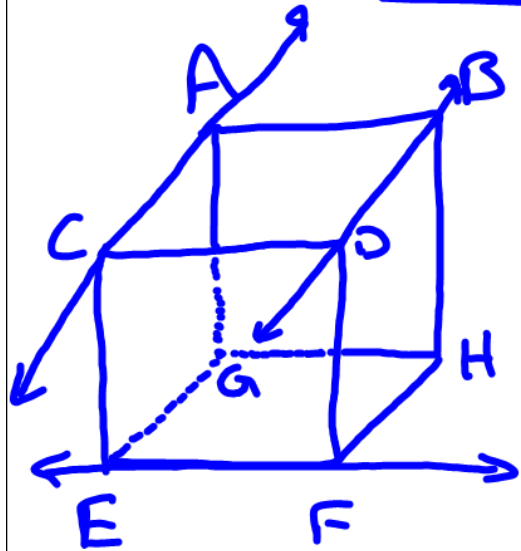


# 3.1 Pairs of Lines & Angles



## Parallel Lines

- Next to each other (coplanar)
- Never intersect

## Skew Lines

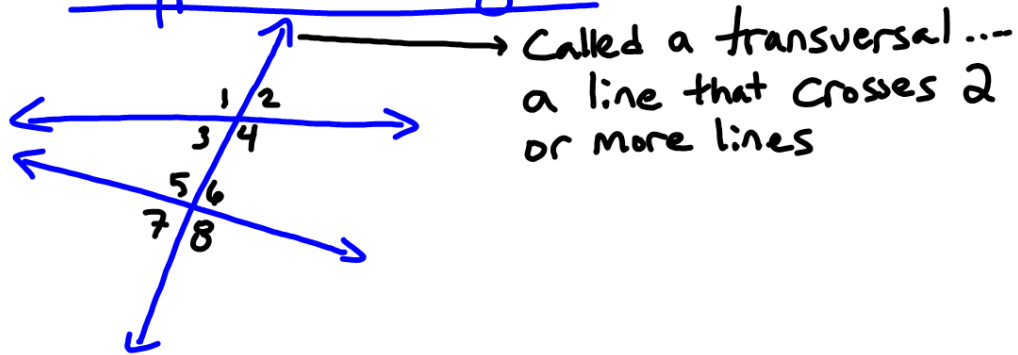
- Not in same plane
- Never intersect

$$\overleftrightarrow{AC} \parallel \overleftrightarrow{BD}$$

$$\overleftrightarrow{CE} \parallel \overleftrightarrow{DF}$$

$\overleftrightarrow{AC}$  &  $\overleftrightarrow{EF}$  are skew  
 $\overleftrightarrow{BD}$  &  $\overleftrightarrow{GH}$  are skew

# Types of Angles



Corresponding Angles -  $\angle$ 's on same spot of different lines.  
 $\angle 5 \hat{=} \angle 1, \angle 7 \hat{=} \angle 3, \angle 8 \hat{=} \angle 4, \angle 2 \hat{=} \angle 6$

Alternate Interior Angles - On inside of 2 lines & switch sides of transversal  
 $\angle 3 \hat{=} \angle 6, \angle 4 \hat{=} \angle 5$

Alternate Exterior Angles - Outside of 2 lines & switch sides of transversal  
 $\angle 1 \hat{=} \angle 8, \angle 2 \hat{=} \angle 7$

Consecutive Interior Angles - On inside & same side of transversal  
 $\angle 3 \hat{=} \angle 5, \angle 4 \hat{=} \angle 6$