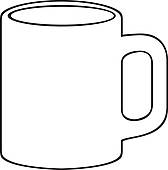
Absolute Zero: (**0 K**)

* Temperature of system at minimum possible internal energy “U”
  + Earlier thought all motions ceased but not true!
* Cannot go to or below 0 K
* Hot coffee is hotter than iceberg
  + Which has more internal KE?



Say: KE molecule of coffee = 6 and KE molecule of iceberg = 2

* KE internal energy of the coffee is 2\*6 = 12
* KE internal of the iceberg is 10 \* 2 = 20
* The colder iceberg has more internal energy because it has more molecules than the cup of coffee
* This will probably be on the test

Temperature Gauge:

* Skin is not a good sensor of temperature
* Example: tile and carpet
* Both are the same temperature of 70 F
* One foot on tile and other foot on the carpet
  + The temperature of your foot is escaping faster into the tile
    - Subjective sense that the tile is colder when in reality the two temperatures are the same
* T < body temperature
  + Tile feels cooler
* T > body temperature
  + Tile feels warmer