

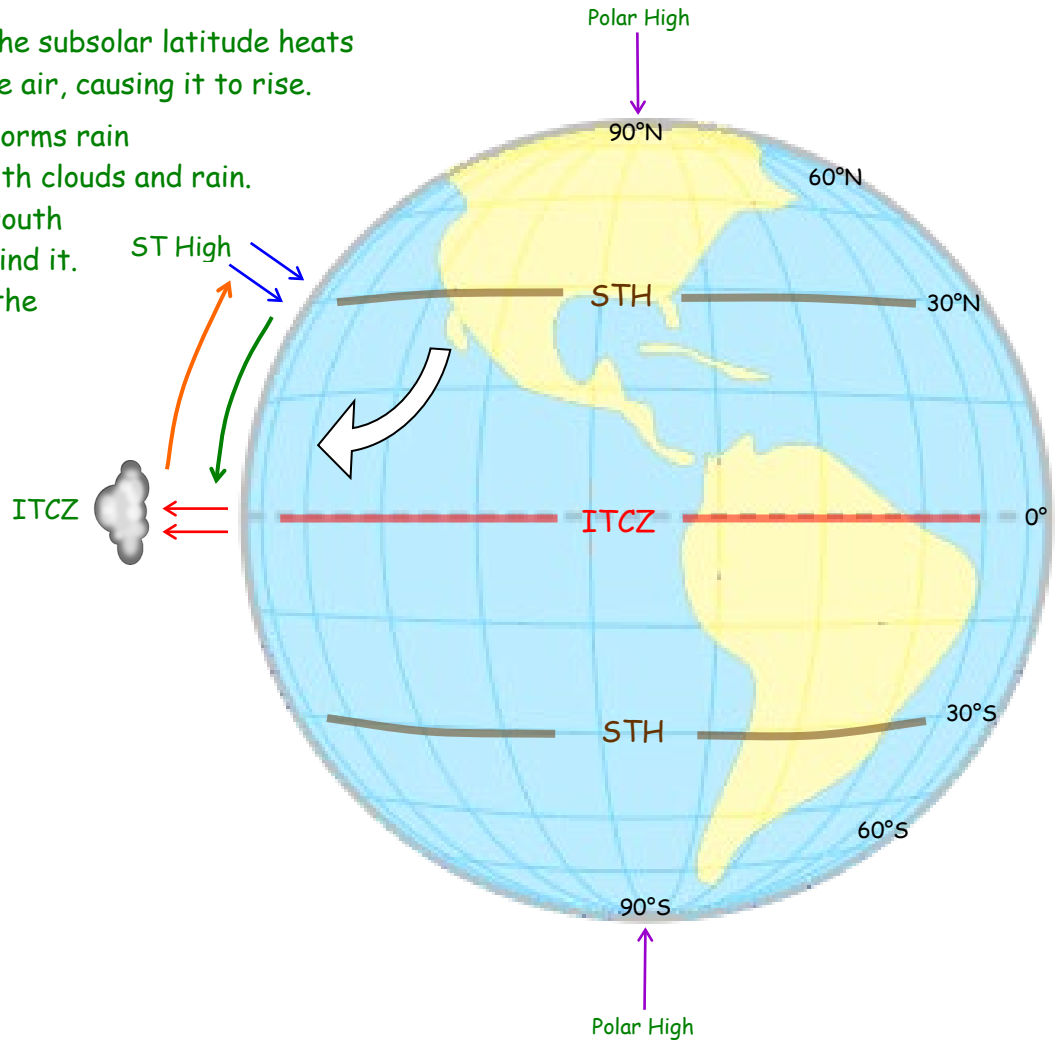
GLOBAL CIRCULATION MODEL

Using the left side of the globe, draw and label the vertical circulation of the atmosphere showing where air rises (ITCZ, Polar Front) and where it subsides (Subtropical and Polar highs).¹²

On the face of the globe, indicate the the NE & SE trade winds, westerlies and polar easterlies (the 60° latitudes are shown slightly low to give you room to draw).⁶ Explain the zones in the surrounding space.¹²

ITCZ: Solar insolation at the subsolar latitude heats the ground, which heats the air, causing it to rise.

- ◆ Moisture condenses & forms rain
- ◆ Band of low pressure with clouds and rain.
- ◆ Air spreads north and south as more air rises behind it.
- ◆ Air now dry air high in the troposphere.



ITCZ - InterTropical Convergence Zone
 Low pressure zone near subsolar latitude
STH - Sub-Tropical Highs Pressure Cells
 High pressure zones about 30° N and 30° S of ITCZ

Polar Fronts
 Low pressure zones about 60° N and 60° S of ITCZ
Polar Highs
 High pressure zones about 90° N and 90° S of ITCZ