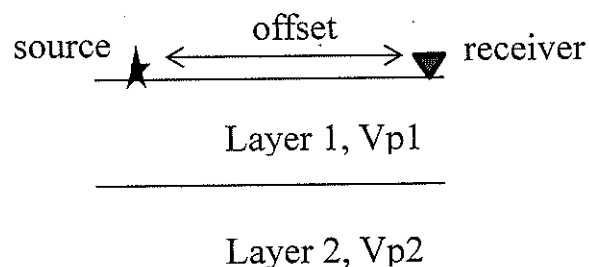


一、 名詞解釋 (20%)

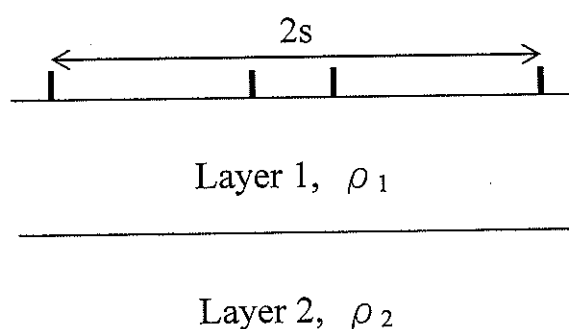
1. Geoid
2. Skin depth
3. Nyquist frequency
4. Curie temperature
5. Stacking velocity

二、 Show the travel time-offset curves of direct, reflected and refracted P-waves for a two-layer earth model shown as the following where V_{p1} and V_{p2} are the P-wave velocities of the layer 1 and 2, and $V_{p2} > V_{p1}$. (20%)



三、 What are the free-air and Bouguer corrections? What are the free-air and Bouguer anomalies? What are the implications of the free-air and Bouguer anomalies? (20%)

四、 A two-layer earth model shown as the following where ρ_1 and ρ_2 are the resistivities of the layer 1 and 2, doing a direct-current resistivity exploration, show the apparent resistivity (ρ_a)-current electrode separation (s) curves for $\rho_1 > \rho_2$ and $\rho_1 < \rho_2$. (20%)



五、 What events can you find in the following shallow seismic shot gather, estimate event's velocities and describe why they are? (20%)

