

**Notable Geographers in APWH:** Complete missing portions of the following information and study the information for the duration of the course!

\***Thomas Robert Malthus** - English economist and cleric was the most famous pioneer observer of **population growth** with the publishing in 1798 of *An Essay on the Principle of Population*, known as the "dismal essay." He believed that the human ability to multiply far exceeds our ability to increase food production. He maintained that "a strong and constantly operating check on population" will necessarily act as a natural control on numbers. He regarded famine, disease, and war as the inevitable outcome of the human population's outstripping the food supply.

\***Warren Thompson (Demographic Transition Model)** - The **demographic transition model (DT)** is the transition from high birth and death rates to low birth and death rates as a country develops from a pre-industrial to an industrialized economic system. The theory is based on an interpretation of demographic history developed in 1929 by the American demographer Warren Thompson (1887-1973). Thompson observed changes, or transitions, in birth and death rates in industrialized societies over the previous 200 years. Most developed countries (MDCs) are in stage 3 or 4 of the model; the majority of developing countries (LDCs) have reached stage 2 or stage 3.

\***E.G. Ravenstein (Laws of Migration)**- earliest migration theorist. Ravenstein, an English geographer, used census data from England and Wales to develop his "Laws of Migration" (1889). He concluded that migration was governed by a "push-pull" process; that is, unfavorable conditions in one place (oppressive laws, heavy taxation, etc.) "push" people out, and favorable conditions in an external location "pull" them out. Ravenstein's laws stated that the primary cause for migration was better external economic opportunities; the volume of migration decreases as distance increases; migration occurs in stages instead of one long move; population movements are bilateral; and migration differentials (e.g., gender, social class, age) influence a person's mobility.

\***Boserup Hypothesis**- Boserup argued that population determines agricultural methods. A major point of her book is that "necessity is the mother of invention". It was her great belief that humanity would always find a way and was quoted in saying "The power of ingenuity would always outmatch that of demand". She also influenced debate on the role of women in workforce and human development, and the possibility of better opportunities of work and education for women.

According to Malthusian theory, the size and growth of the population depends on the food supply and agricultural methods. In Boserup's theory agricultural methods depend on the size of the population. In the Malthusian view, in times when food is not sufficient for everyone, the excess population will die. However, Boserup argued that in those times of pressure, people will find ways to increase the production of food by increasing workforce, machinery, fertilizers, etc. Although Boserup is widely regarded as anti-Malthusian, both her insights and those of Malthus can be comfortably combined within the same general theoretical framework

\* **Johann Heinrich von Thunen (Von Thunen Model)**- German scholar-farmer who developed the core-periphery model in the nineteenth century (economic determinism). In his model he proposed an "isolated state" that had no trade connections with the outside world; possessed only one market, located centrally in the state; and had uniform soil, climate, and level terrain throughout. He created this model to study the influence of distance from market and the concurrent transport costs on the type and intensity of agriculture.

**Halford Mackinder (Heartland Theory)**- Makinder was a political geographer who wrote a thesis and presented it before the Royal Geographical Society in London. In his article titled "The Geographical Pivot of History", he outlined his Heartland Theory. He suggested that whoever owns Eastern Europe and Western Asia has the political power and capital to rule the world. The Ukraine region could produce enough wheat and other agricultural products to sustain a large population - and feed its armies. Also, abundant raw materials such as coal, essential to develop a military and industrial base, are available in this region.

**Nicholas Spykman (Rimland Theory)**- a political geographer who wrote his own theory on world domination and politics. He was from the Netherlands and came to the U.S. to teach at Yale. He originated the Rimland Theory of containment and is known as the "godfather of containment". The Rimland Theory suggests that forming alliances is necessary to keep the Heartland in check. Because the Heartland is so powerful, no individual country can contain it by itself. So that is the reason for the establishment of NATO, SEATO, CENTO in response to the spread of communism around the world. Spykman believed that the heartland may control the land, but the Rimland will control the sea. The Rimland would use the oceans to contain the heartland, engaging in a battle between land and sea.



**Immanuel Wallerstein**- He has argued since 1980 that the United States is a 'hegemon in decline'. He was often mocked for making this claim during the 1990s, but since the Iraq War this argument has become more widespread. Overall, Wallerstein sees the development of the capitalist world economy as detrimental to a large proportion of the world's population. Similar to Marx, Wallerstein predicts that capitalism will be replaced by a socialist economy. Wallerstein rejects the notion of a "Third World", claiming there is only **one** world connected by a complex network of economic exchange relationships — i.e., a "world-economy" or "world-system" in which the "dichotomy of capital and labor" and the endless "accumulation of capital" by competing agents (historically including but not limited to nation-states) account for frictions. This approach is known as the **World Systems Theory**.

**Alfred Weber (*Industrial Location Theory*)**- German geographer who was a major theorist of industrial location. He devised a model of how to understand industrial locations in regard to several factors, including labor supply, markets, resource location, and transportation. Although his name cannot be located in your textbook, it is basically discussed on pages 381-393 (bulk-gaining / bulk reducing & site / situation factors).

**Walter Christaller (*Central Place Theory*)**- German geographer who in the early 1930s first formulated central-place theory as a series of models designed to explain the spatial distribution of urban centers. Crucial to his theory is the fact that different goods and services vary both in threshold and in range.

**W. W. Rostow** - in 1960 proposed a widely cited model for economic advancement. Generalizing on the "sweep of modern history," he theorized that all developing economies may pass through five successive stages of growth and advancement.

List and explain the 5 stages below:

- 1.
- 2.
- 3.
- 4.
- 5.

**John Borchert (Stages of Urban Development)** John Borchert's model: (1967); recognized four epochs in the evolution of the American metropolis based on the impact of transportation & communication:

- 1) Sail-Wagon Epoch (1790-1830) - associated with low technology
- 2) Iron Horse Epoch (1830-70); steam-powered locomotive & spreading rails
- 3) Steel-Rail Epoch (1870-1920); full impact of Ind. Rev. (steel), hinterlands expand
- 4) Auto-Air-Amenity Epoch (1920-70); gas-powered internal combustion engine
- High Technology Epoch (1970-today); expansion of service & information industries (not part of Borchert's model)

**Ernest Burgess (Concentric Zone Model of Urban Development)** Describe, draw & label!

**Chauncey Harris / E. L. Ullman (Multiple Nuclei Model of Urban Development)** Modern cities develop by peripheral spread of many nodes not one CBD, though the CBD still exists and is important. Cities within cities. Individual nodes of special function (commercial, industrial, port, residential) coalesce at margins.

**Homer Hoyt** - An economist who studied housing data for 142 American cities, presented his sector model of urban land use in 1939. He maintained that high-rent residential districts were instrumental in shaping the land-use structure of the city. Because these areas were reinforced by transportation routes, the pattern of their development was one of sectors or wedges, not concentric zones.