

Suggested Answers to Review and Discussion Questions: Lesson 7

1. Students should discuss five important factors to be considered in site valuation. Several examples of these factors are listed below.
 - (1) Physical Characteristics, e.g., sloped vs. flat lot, views, water table
 - (2) Available Utilities and Amenities, e.g., availability of sewer, water, storm drains; also schools, parks, road conditions
 - (3) Zoning, what is permitted on the site in terms of use, density, etc.
 - (4) Site Improvement, i.e., any site work or improvements on the parcel
 - (5) Access/Egress, e.g., access from a major transportation artery for commercial sites, access to parking at lot
 - (6) Environmental conditions, e.g., site contamination, hazardous wastes

2. *Economic Factors* relate to the general state of the international, national, regional, and local economies. Demand and supply variables can have a substantial effect on the value of land and can vary significantly from one area to another.

Example: higher employment levels and wage rates in urban centres relative to rural areas will increase the value of urban land. The relatively small amount of urban land available for development will cause its value to be bid up.

Social Factors people tend to cluster in urban centres in groups governed by such demographic factors as age, education, and marital status. Prestige and desirability also play an important role in determining which areas are sought after by certain groups.

Example: older and wealthier groups will tend to live in more desirable areas, which may include areas with views, waterfront, or proximity to amenities such as parks. Whereas younger families will, in general, have lower incomes and be more concerned with price and proximity to schools, parks, recreation etc.

Legal, Governmental, and Political Factors at the national level, economic, fiscal, and monetary policies can either spur or retard economic growth and the demand for land. Provincial and local governments often provide incentives or disincentives for land development through such mechanisms as taxation, zoning, land use controls, and rent controls. At the local government level the quality of services, such as roads, schools, public transportation, and police and fire protection also affect demand.

Example: Provincial or local governments may increase the amount of land that will be developed by offering tax rebates to entice new business to the area. Municipal governments may build or improve roads to increase access to a new industrial area, thereby increasing its value.

Physical, Environmental, and Locational Factors consist of site and situation attributes. Site attributes focus on size, topography, and other physical features of a given parcel. Situation, attributes focus on the location of the parcel relative to other places, such as the central business district, freeway access, shopping, schools, the ocean, or a dump.

Example: Large level sites with good freeway access on the outskirts of a city will be more desirable to industrial users. Whereas land parcels on hillsides or near an ocean that provide views or more privacy will be more desirable for residential subdivision. In both cases, the value of the land will increase.

3. The text states that "stratification is the sorting of sales and other market data into homogeneous groups". The strata is determined by grouping geographic areas with comparable sales criteria and market influences (e.g., zoning). The benefit is that stratification ensures that land values will reflect the market data for similarly grouped bundles of land, and provide consistency between comparables.
4. Methods used to value land with insufficient sales:
 - Abstraction method
 - useful method in highly developed areas where there are a few, if any, vacant land sales
 - only as a method of last resort when sales data for both vacant and improved parcels are inadequate (even so, estimates still need to be carefully validated)
 - Allocation method
 - appropriate when there are insufficient land sales in a particular area, an appraiser can seek comparable areas with sufficient land sales and apply the land to value ratio of the comparable area
 - useful when estimated improvement values are not explicitly required in the analysis
 - should not be used to establish land values directly
 - Capitalization of Ground Rents
 - appropriate for farmland and commercial land leased on a triple net basis
 - not appropriate for outdated leases that are no longer representative of the current market
 - Cost of Development
 - appropriate for newly subdivided land or land ripe for subdivision
 - not appropriate for conservative analysis as it involves considerable speculation
5. (a) The land value of the developed property is \$100,000 and its total property value is \$300,000. Thus, the land-to-property-value ratio is $\$100,000 / \$300,000$, or 0.33 : 1.0
 (b) The range of indicated values for the subject parcel is approximately \$80,000 ($0.33 \times \$240,000$) to \$90,000 ($0.33 \times \$270,000$).
6.

Total hard and soft costs	\$470,000
Entrepreneurial profit @ 10%	\$47,000
Total costs	\$517,000

Indicated land value if all sales and costs occurred at one time:

Revenue from sales of lots	\$1,050,000
less: Total costs	\$517,000
Indicated Land Value	\$533,000

7. Answers to case law: *Kim v. Surrey (City)*, 2010 BCSC 1853
- (a) Short-term holding for future commercial use.
 - (b) A residence, small retail store and 4-unit motel. No value.
 - (c) In general, the per square foot price of land will be higher for a smaller property than for a larger property.
 - (d) Umlah – qualitative. Hooker – quantitative
 - (e) The court accepted Mr. Hooker's time adjustment analysis. It was based on paired comparable sales. Mr. Umlah's time adjustment was based on a housing price index, while the subject was a commercial development site.
 - (f) Both appraisers considered size, location and corner influence. Mr. Hooker also considered shape, zoning and other factors (such as the need for road dedication).
 - (g) Please refer to below:
 - (i) If sufficient market data is available, the quantitative approach is preferred to the qualitative approach as the Court commented that the former is more transparent to the reader.
 - (ii) The value conclusion is more suspect if it lies outside the range of values defined by the market comparables.
 - (iii) More reliability is placed on adjustments based on data relevant and comparable to the subject property (e.g., support time adjustment on comparable property or market segment data, not improved residential to vacant commercial).
 - (iv) Be consistent in the application of adjustments. Don't make arithmetic errors.
 - (v) Be thorough in the investigation of comparable sales, to determine all factors relevant to their analysis (e.g., road dedication requirement).
 - (vi) Be able to justify, not only the comparables used in the report, but the rationale to reject other market transactions as non-comparable.