## OVERVIEW: 1/8/2003

- ANNOUNCEMENTS / QUESTIONS
- LECTURE: Introduction to the discipline
- LECTURE: Core concepts of the spatial perspective.

# INTRODUCTION TO THE DISCIPLINE

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• Geography is destiny...

■ What is geography?

■ How does *human* geography derive from the above definitions?

■ How do geographers approach the questions of human geography?

What is unique among the skills developed and used by geographers?

## WHAT IS GEOGRAPHY?

• Pithy..

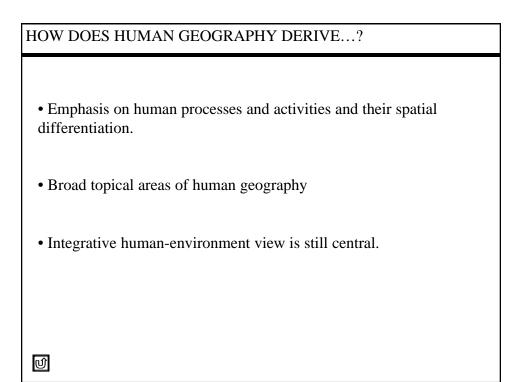
"Study of areal differentiation."

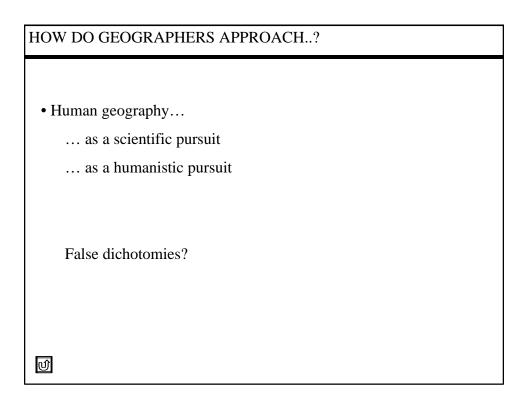
• John Nystuen (1963)

A description of "... spatial arrangements and associations of activities and processes in geographical space."

• Richard Morrill (1983)

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#### THE GEOGRAPHERS SKILL SET

• Collection, storage, and classification of spatial data and the unique nature of error or bias in the data.

• The construction, use, and interpretation of maps

• Ability to understand and interpret the implications of association among phenomena in places.

• Ability to recognize and interpret, at different scales, the relationships among patterns and processes

• Ability to define regions, evaluate methods of regionalization, and evaluation the validity of a given regionalization

•Ability to characterize and analyze changing interconnections among places.

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#### **Richard Morrill**

• "...it's object of analysis is the earth's surface, and ...it's purpose is to understand how that surface is structured or differentiated."

• "...geographic study is unified by a common concern with the meaning of place and the organization of space."

• Purpose expressed through questions

"(1) What is the structure or organization of the landscape and of flows that results from physical processes; how do these transform the landscape?

(2) What is the territorial structure or organization and the flows that result from social and economic processes? How do these transform the landscape?

(3) What is the relation between these physical processes and human settlement, behavior and development?

(4) How do the facts of spatial separation and of differential physical endowment condition the operation of social and economic processes and the character of places and regions?

(5) How can spatial process and structure best be analyzed and displayed?"

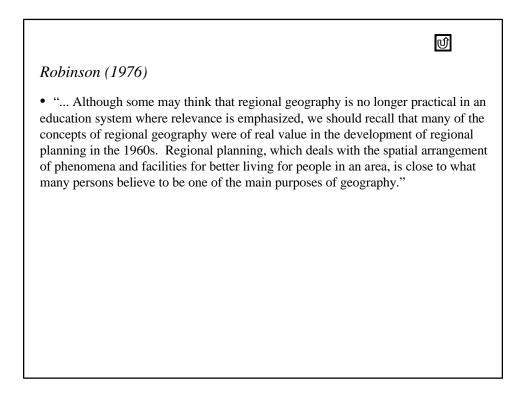
#### Richard Morrill (cont.)

• "...modern geography...[demonstrates]... that fundamental principles of humanenvironmental interaction and spatial organization hold across broad classes of physical and human processes. The special contribution of geography is not only that our theories, models and analytical techniques enrich and improve the theory and practice of other disciplines, but also that spatial processes, behavior, and differentiation are fundamental phenomena of central scientific importance and comprise the *core* of the discipline of geography."

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• "...space is not just an awkward inconvenience in our theories... but a basic organizing principle of existence, that the landscape manifests an incredible structure of both general pattern and unique character that requires interdisciplinary comparison and integration to understand."

•"...space — in the geometric sense of separation and relative location, in the environmental sense of the differential physical characteristics of areas and also in the humanistic sense of the unique identity of places — is the core of geography."



# CORE CONCEPTS OF THE SPATIAL PERSPECTIVE

## CORE CONCEPTS OF THE SPATIAL PERSPECTIVE

#### LEVEL I

1. Places have *location*, *direction*, and *distance* with respect to other places.

2. Places *interact* with other places

#### LEVEL II

3. The content of places is *rationally structured* 

- 4. Scale is important
- 5. Places may be generalized into *regions*.

#### LEVEL III

6. The physical structure and cultural content of place are *dynamic* not static.

7. Geographical problems are characterized by *historical*, *dimensional*, and *time-space tension* 

8. *Perception*, *cognition*, and *choice* are fundamental to the evolution of human landscapes and their interaction with the natural landscape

• "Of all the constraints in nature, the most far-reaching are imposed by space. For space itself has a structure that influences the shape of every existing thing. The idea that space has structure may sound strange, since we usually think of space as a king of nothingness ... as the passive backdrop for the lively play of all material things. It turns out that the backdrop is not so passive. The nothingness has an architecture that makes real demands on things. Every form, every pattern, every existing thing pays a price for its existence by conforming to the structural dictates of space." *Stevens* (1974) – quote from the introduction to Morrill's (1983) article.

• "What subset of....[concepts]...are necessary and sufficient to employ the geographical point of view?" - Nystuen (1963)

#### 1. LOCATION, DIRECTION, & DISTANCE

- ✤ (1a) absolute location (mathematical)
- ✤ (1b) relative location
- **♦** (1c) site
- ✤ (1d) situation
- ✤ (1e) absolute direction
- ✤ (1f) relative (relational) direction
- ✤ (1g) absolute distance
- (1h) relative distance

## 2. INTERACTION

• "first law of geography: everything is related to everything else, but near things are more related than distant things."

- Waldo Tobler (UCSB Emeritus Professor of Geography)

- ✤ (2a) spatial dependence
- ✤ (2b) distance decay
- ✤ (2c) friction of distance
- ✤ (2d) accessibility
- ✤ (2e) connectivity (adjacency, contiguity, position)
- **♦** (2f) network connectivity
- ✤ (2g) diffusion

## LEVEL II

- 3. The content of places is *rationally structured*
- 4. Scale is important
- 5. Places may be generalized into *regions*.

## 3. CONTENT OF PLACES IS RATIONALLY STRUCTURED

- Spatial structure is comprehensible.
  - ✤ (3a) density
  - **\*** (3b) **dispersion** (or concentration)
  - ♦ (3c) pattern:
- "...differential need for and ability of activities to compete for access to a central point."

• "...the need or preference for activities and people to be close together or apart."

- Morrill (1963)

## 4. SCALE IS IMPORTANT

- ✤ (4a) scale of analysis
- ✤ (4b) map scale

## 5. REGIONS

#### James McDonald (1966)

"For geographers seek regions as alpinists seek unconquered peaks: 'because they are there.' and the fact that their existence is in the correlative nature and ecological sensitivity for that geographer, rather than in a visible object of granite and ice, detracts not at all from the analogy. Both statements have deeper implications in psychology than in nature, and as the region has represented a challenge to each generation of geographers it may, in a sense, be said to be part of the soul of geography: forever sought, forever undefined."

## 5. REGIONS

#### Morrill (1983)

"..territory (space) becomes *efficiently* divided into similar areas ('cells') as a resolution of opposing forces: of the benefits of increasing size and the costs of maintaining 'control' over a greater distance."

territorial organization is conditioned by.. " the tension between an efficient structure which serves the greatest number at the least cost, and a social concern for equity of access so that none should be too badly off."

## 5. REGIONS (cont.)

- ✤ (5a) hierarchical region
- ✤ (5b) formal region
- ✤ (5c) functional (nodal) region
- ♦ (5d) perceptual region

## LEVEL III

- 6. The physical and cultural content of place are **dynamic** <u>not</u> static.
- 7. Geographical problems are characterized by *historical*, *dimensional*, and *time-space* tension
- 8. *Perception*, *cognition*, and *choice* are fundamental to the evolution of human landscapes and their interaction with the natural landscape

## 6. PLACE ATTRIBUTES ARE DYNAMIC

"...to understand fully the nature and development of places geographers must view them as the present result of past result of physical and cultural processes."

- Fellman, Getis, and Getis (1999)

Long-term changes in the landscape are the result of two opposing forces.. (1) separation as a stimulus to diversity, and (2) interaction across space that modifies diversity. Diffusion (interaction) propagates dominant characteristics over space; reinforces homogeneity.

- paraphrase Morrill (1983)

## 7. PROBLEMS: HISTORICAL, DIMENSIONAL, & TIME-SPACE

- ✤ (7a) historical tension
- ✤ (7b) dimensional tension
- ✤ (7c) time-space tension

## 8. PERCEPTION, COGNITION, & CHOICE

## ✤ (8a) perception

- ♦ (8b) cognition
- **♦** (8c) **choice**