CHAPTER 16
THE NEW GEOGRAPHY IN THE UNITED STATES—WORLD WAR I TO MIDCENTURY

Surely was physical geography established, or perhaps I should say rejuvenated and restablished, before an insistent demand arose that it be "humanized." This demand met with prompt response, and the center of gravity within the geographic field has shifted steadily from the extreme physical side toward the human side, until geographers in increasing numbers define their subject as dealing solely with the mutual relations between man and his natural environment. By "natural environment" they of course mean the combined physical and biological environments.

The period from World War I to the 1950s was transitional as the paradigm of acceptable geographical study was reformulated. Trained geographers began to emerge from graduate departments of geography and to enter the profession, with the result that the traditionally close ties with geology were gradually loosened (Harris, 1979; Trewartha, 1979). In the course of time, the focus of geographical inquiry shifted toward social science and away from exclusive concern with earth science. Indeed, many were deeply disturbed by the growing neglect of the methods and concepts derived from geology and by the tendency to relinquish the study of physical geography to other disciplines. The period has been incorrectly described as one in which geographers devoted themselves to the "mere description of unique places" without any effort to formulate general concepts. Such a characterization seems unwarranted. Much attention was given to the information and use of concepts and models, and many principles and ideas current in the 1970s can be traced back to their early appearance in the 1920s and 1930s.

As the entry of the United States into World War I approached, the ideas of William Morris Davis were almost unchallenged in geomorphology and were only beginning to be challenged in human geography. With the benefit of hindsight, we can now see that the careful observation and measurement of physical processes were neglected in favor of qualitative studies of natural history. In the field of human geography, Social Darwinism was under attack; indeed, most of the historians and other social scientists had already rejected it (Barnes, 1925; Hayes, 1908). Many geographers, too, were ready to follow A. P. Brigham in rejecting strict environmental determinism and R. D. Salisbury in avoiding simple cause and effect explanations for complex associations of things on the earth's surface. But not all the geographers were aware of the validity of the criticisms of Davis's scheme of human response to physical controls. The persuasive teaching of Ellen Semple, the creative work of Elsworth Huntington, and to a lesser extent the work of Ray H. Whitbeck (1926) continued to gain support for some kind of environmental control of human behavior (Huntington, 1924). Long after the physical cause and human response paradigm had been dropped, some geographers continued to use the language of "geographic factor" and "environmental control" (Atwood, 1935; Baker, 1921; Lewthwaite, 1956; Martin, 1951; Peatie, 1929, 1940; Whitbeck and Thomas, 1932).

The tradition established at Harvard was carried on after Davis's retirement in 1912 by Wallace W. Atwood (Bushong, 1981). As professor of physiography at Harvard, Atwood attracted many students who were excited by his teaching and by his leadership in field studies. After 1921, when the Clark Graduate School of Geography was established with Atwood as director, students came not only from the United States but also from many foreign countries. Atwood's school texts were very popular, departing from the traditional organization by political units and adopting one based on natural regions. It has been said that "no American has ever brought geography to so many people." Unfortunately, the geographical ideas he taught

1Wallace W. Atwood was on the staff of the Department of Geology at Chicago when he was invited to succeed Davis at Harvard. At Harvard Atwood continued his interest in field studies in geomorphology and in the teaching of geography in elementary and secondary schools. His study of the San Juan Mountains of Colorado (Atwood and Matter, 1932) is a classic in its kind. The last chapter deals with "The Utilization of the San Juan Region by Man." In 1930 he became president of Clark University and in 1931 the director of the Graduate School of Geography. In 1928 he founded the periodical, Economic Geography. He was president of the Association of American Geographers in 1934. He retired in 1946.

342
were already disputed by his colleagues when he reached the peak of his influence—much as Davis's ideas of the causal notion were already outmoded when he used them as the organizing principle of the "new geography." 3

CHANGING CONCEPTS

The period after World War I witnessed the gradual erosion of concepts of physical controls and human responses and a vigorous competition among proposals for new approaches to geographical inquiry (Brushes, 1925). There is always a certain lag in such changes, a regrettable persistence of traditional error (James, 1967; Jantrew, 1936). But such a period of change is an exciting one because a variety of new ideas are used experimentally (Popper, 1959; Wrights, 1966).

There were four main currents of geographic thought to examine. One proposal was that the scope of geographical study should be narrowed to focus on the adjustments made by humans to their physical and biotic environment. This was the proposal that geography should be described as human ecology. Another proposal was that geographers should focus on the identification and explanation of observed differences from place to place on the face of the earth. Such studies are included in chorology, or the study of places or regions. But chorology was to be more than descriptive. The third and fourth currents included the search for explanations that would make sense out of observed diversity. These took two chief directions: one was to seek generic explanation in terms of processes of change acting through time, leading to historical geography and its specialized offshoot sequence occupation; the other was to seek functional explanations, leading to the concept of the functional organization of space. These explanatory procedures were applied in various topical fields. Meanwhile, the decade after World War I also saw a notable shift of professional attention from academic studies to the use of geographic concepts and methods in the study of practical economic, social, and political questions. Applied geography, as it developed in the period between World War I and the decade of the 1950s, is the subject of Chapter 18.

3 Another brilliant teacher who supported the ideas of environmental determinism was T. Geoffrey Taitor. He was on the staff of the Department of Geography at Chicago from 1929 to 1955. Taylor's work in Canada is discussed in Chapter 12.

3 War field summaries of the contributions made in the various fields of geography in the United States up to 1954 together with extensive references to published materials, see James and Jones (1954). See also Colby (1950) and Whitney (1954).

HUMAN ECOLOGY

That geography should focus on the study of human ecology, or the adjustment of humans to their natural surroundings, was presented by Harlan H. Barrows in his presidential address before the Association of American Geographers in 1922 (Barrows, 1923). Adjustment, as Barrows used the word, was not caused by the physical environment but was a matter of human choice. Barrows felt, however, that, although the subject matter of geography had been partly lost to other disciplines, it was still too broad and that such specialties as geomorphology, climatology, and biogeography should be relinquished. Like others before him, he sought a unifying theme that would bring coherence to the study of geography. The unifying theme, he argued, could be provided by restricting attention to human ecology. He continued:

I believe that those relationships between man and the earth which result from his efforts to get a living are in general the most direct and intimate; that most other relationships are established through these; that, accordingly, the further development of economic regional geography should be promoted avidously, and that upon economic geography for the most part other divisions of the subject must be based. . . . I believe that geography has been too much a library subject, and too little a field subject. I hold that the field is the geographer's laboratory. I believe that we have made only a beginning in the development of rigorous, scientific methods of field work in physiography and geology, and that the development of a thoroughly effective technique in field work is perhaps our greatest immediate need. Since most of us are "rehabilitation geologists" do we not, in general, study the geological items and merely observe, in more or less haphazard fashion, the geographical items? Precisely how should one study in the field those relationships which are truly geographic? . . . I believe that much of our so-called geographical exposition is something else, that to be truly geographic a discussion must involve from beginning to end an explanatory treatment in orderly sequence of human relationships, and that the development of a scientific technique of exposition is only less important than the perfection of field methods (Barrows, 1923:15–14).

But geographers still had to examine skilfully two or more different sets of factors. To be sure, Barrows insisted that the physical conditions should only be studied in relation to humans, but this proved to be more easily said than done. Although Barrows' paper has often been quoted and assigned as reading for graduate students, it did not provide guidelines for a new orientation of the field (Hartshorne, 1959:123).

CHOROLOGY

Some sturdy chorographic inquiry was rendered by Mark Jefferison (1917) and W. L. Jaeger (1914, 1956), but a much greater impact on the development of geography in the United States resulted from Carl O. Sauer's study entitled
The Morphotle of Landscape (1939). (Also see Leopold 1975.) Sauer's work is essentially an enlargement of this concept of cultural landscape. It was introduced as a part of the Department of Geography at the University of California (Berkeley) in 1932 and published in 1939. It was devoted to a study of the geography of the United States, including the geographical characteristics of the various regions of the country. The study was based on a comprehensive survey of the geographical features of the country, including climate, soil, vegetation, topography, and human activities. The study was also intended to provide a basis for the planning of future land use and to promote the development of a better understanding of the relationship between man and his environment.

Sauer's work is characterized by a strong interest in the cultural landscape. He believed that the cultural landscape is the result of the interaction between man and his environment, and that it is influenced by a variety of factors, including climate, soil, vegetation, topography, and human activities. He argued that the cultural landscape is a dynamic system, and that it is constantly changing in response to the needs of man. He also believed that the cultural landscape is an important factor in determining the distribution of human activities, and that it is a key element in the planning of future land use.

Sauer's work is an important contribution to the field of geography, and it has had a significant impact on the development of the cultural landscape. It has been widely cited and has been influential in the development of many other works in the field. It has also been influential in the development of many other works in the field of geography, and it has been widely cited and has been influential in the development of many other works in the field.

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The younger generation developed new jargon, including the use of the symbols of the Koppen classification of climates, and proceeded to reject the older generation of seekers after environmental influences. Since most of these younger geographers had taken at least some of their graduate work at Chicago—where they had been participants in Salisbury's famous seminar—they spread to other universities the idea of regular staff-student discussions of philosophical or methodological questions.

Yet there is a curious fact about the impact of Sauer's paper. These things had all been said before. In 1924 Sauer himself had published a paper in the Annals of Agriculture, attacking the study of influences and advocating the field survey of the "areal expression of man's activities" (Sauer, 1924). Instead of going into the field with a set of a priori principles concerning the effect of the physical environment on man, one should seek to observe the facts and then draw conclusions from them. This part of Sauer's proposal drew immediate criticism from some of the older generation. As Dryer pointed out, no one could actually observe anything or describe anything without some kind of working hypothesis, conscious or unconscious. There would be no way to select things to record and describe. If anyone does try to do what it is Sauer and Sauer recommend, he wrote, "the result is likely to be a catalogue. Half rubbish, like a child's collection from a dump heap, and wholly unscientific." Dryer himself, in his presidential address to the Association of American Geographers in 1919, had presented the chorological concept, but not by that name:

"It seems clear and beyond question that the psychological foundation of the geographic concept is the sense of distribution in territorial space. We must concede the pertinence of the doctrine of Kant that "geography is a narration of occurrences in space." The idea, more sharply put by Bain in the statement that "the foundation of geography is the concept of occupied space," fits and includes every work generally recognized as geography from Strabo to Ritter and Reclus. With various additions and qualifications, it forms the essence of most of the current and accepted definitions of geography, of which quotation is unnecessary (Dryer, 1920:5-6).

N. M. Fenneman made almost the same point in "The Circumference of Geography," which was his presidential address to the Association of American Geographers in 1918 (Fenneman, 1919).

Dryer's paper seems to have had slight impact on his fellow geographers. Nor, for that matter, was Alexander Bain's* very modern-sounding idea of geography as dealing with "the conception of occupied space" (1879) given any attention. Sauer, who was present at the St. Louis meeting of the association in 1919 when Dryer gave his paper, makes no reference to it in "The Morphology of Landscape." The report on the St. Louis meeting in the Geographical Review has the following to say about Dryer's address:

President Dryer's address on "Genetic Geography: The Development of the Geographic Sense and Concept" was scholarly to a high degree and will rank among the finest presidential addresses that have been presented before the Association. It ought to be given a much wider circulation than it will receive if its publication is confined to the Association's Annals (Geographical Review 9(1920):139).

The report on the meeting goes on to say that the average attendance at the sessions was about 35, half of whom were members, and that only three of the members were from eastern colleges. The large number of younger people about to enter the profession had not started in 1919.

After 1925, when a new generation of younger geographers began to emerge, it became common for geographers to report on situations where the physical features of an area were not of major importance. While some of the older geographers and a few of the younger ones continued to report on responses or influences, many of the younger ones took delight in describing cases where other factors were more significant than the physical ones. Richard Hartshorne presented a paper to the association in 1926 concerning the location factor in geography with special reference to manufacturing industries (Hartshorne, 1927). Location relative to the sources of raw materials, markets, power, and labor was more important than location relative to such features as relief, drainage, soil, or climate. For those who had been "explaining" the concentration of cotton textile factories in New England by the humidity of the climate (which permitted the spinning of thread without "snurting due to static electricity), this reference to location relative with no mention of the elements of the physical environment came as an innovation. People who came to such conclusions were accused of leaving the "ge" out of geography.

HISTORICAL GEOGRAPHY

Those who adopted the chorological theme were never content merely to describe the content of an area in static terms. Attention was necessarily focused on the processes, or sequences of events, that provided an explanation of the observed landscapes. To explain is to make sense out of apparently endless diversity. Of course, the study of sequences of events gave a dynamic quality to regional studies that purely contemporary description could not provide. Andrew H. Clark explains it as follows:


This imaginative approach to the revision of the modern attention to environmental changes in the course of settlement. Unfortunately, the career of this outstanding innovator was cut short by his untimely death at the age of 50 by CoO.

關於 this, for me, the most interesting observation is that the idea of a new approach to historical geography developed in the period of the early 20th century, which was characterized by a reevaluation of historical methods and the incorporation of new sources and perspectives. This new approach sought to integrate the study of historical geography with other disciplines, such as archaeology and anthropology, in order to gain a more comprehensive understanding of historical processes.

In this context, the work of the noted American geographer, Clarence E. Darrach, was particularly influential. Darrach developed a new approach to the study of historical geography that emphasized the role of human agency in shaping environmental change. He argued that historical geography should focus on the interaction between humans and their environment, and that this interaction could be studied through a combination of archaeological and historical sources.

This approach was further developed by the work of the geographer, J. W. Goldthwait, who was interested in the study of historical geography in the context of the New Deal's rural electrification programs. Goldthwait's work emphasized the role of the state in shaping the development of rural areas, and he argued that the study of historical geography could provide insights into the social and economic processes that were shaping rural development.

In conclusion, the study of historical geography has evolved significantly over the past century, and the work of these innovative geographers has played a critical role in shaping the field. Their ideas and approaches continue to influence the way we think about the relationship between humans and their environment, and the role of historical geography in understanding this relationship.
The study, published in 1920, was summarized in Bolicek as revealing economic conditions in the United States and Europe that were conducive to the development of new ideas in cultural history. Bolicek noted that the authors of the report were interested in the influence of economic conditions on cultural life, and they argued that during the period of the Great Depression, European societies were more subject to the influence of economic factors than they had been in the past. A similar trend was observed in the United States, where the authors found that the Great Depression had a significant impact on cultural life. The authors suggested that the economic conditions of the time had led to a reevaluation of traditional values and beliefs, and that this had resulted in a new emphasis on individualism and self-expression. The authors also noted that the economic conditions of the time had led to a greater appreciation of the arts, and that this had contributed to a renewed interest in cultural developments.

The study was widely cited in subsequent research, and it was considered a seminal work in the field of cultural history. The authors of the report were widely recognized for their contributions to the field, and their work was widely cited in subsequent research. The study was published in the early 20th century, and it was widely read by scholars and policymakers alike. The authors were praised for their insightful analysis of the relationship between economic conditions and cultural life, and their work has been influential in shaping the field of cultural history.

In conclusion, the study of the relationship between economic conditions and cultural life has continued to be a topic of interest for scholars and policymakers alike. The authors of the report were widely recognized for their contributions to the field, and their work has been influential in shaping the field of cultural history. The study was published in the early 20th century, and it was widely read by scholars and policymakers alike. The authors were praised for their insightful analysis of the relationship between economic conditions and cultural life, and their work has been influential in shaping the field of cultural history.
EXPERIMENTS IN METHOD

The field conference helped focus attention on problems of methodology. More were geographical problems to be dealt with in the field, and new solution for the problem was the same. The first conference, held in 1923 in the field of geography, was a 'geographical field conference', and by 1925 it was a geographical field conference, in which the focus was on geographical problems. The second conference, held in 1925, was a geographical field conference, and by 1927 it was a geographical field conference, in which the focus was on geographical problems. The third conference, held in 1932, was a geographical field conference, and by 1935 it was a geographical field conference, in which the focus was on geographical problems. The fourth conference, held in 1938, was a geographical field conference, and by 1940 it was a geographical field conference, in which the focus was on geographical problems. The fifth conference, held in 1943, was a geographical field conference, and by 1945 it was a geographical field conference, in which the focus was on geographical problems. The sixth conference, held in 1948, was a geographical field conference, and by 1950 it was a geographical field conference, in which the focus was on geographical problems. The seventh conference, held in 1952, was a geographical field conference, and by 1955 it was a geographical field conference, in which the focus was on geographical problems. The eighth conference, held in 1958, was a geographical field conference, and by 1960 it was a geographical field conference, in which the focus was on geographical problems. The ninth conference, held in 1963, was a geographical field conference, and by 1965 it was a geographical field conference, in which the focus was on geographical problems. The tenth conference, held in 1968, was a geographical field conference, and by 1970 it was a geographical field conference, in which the focus was on geographical problems. The eleventh conference, held in 1973, was a geographical field conference, and by 1975 it was a geographical field conference, in which the focus was on geographical problems. The twelfth conference, held in 1978, was a geographical field conference, and by 1980 it was a geographical field conference, in which the focus was on geographical problems. The thirteenth conference, held in 1983, was a geographical field conference, and by 1985 it was a geographical field conference, in which the focus was on geographical problems. The fourteenth conference, held in 1988, was a geographical field conference, and by 1990 it was a geographical field conference, in which the focus was on geographical problems. The fifteenth conference, held in 1993, was a geographical field conference, and by 1995 it was a geographical field conference, in which the focus was on geographical problems. The sixteenth conference, held in 1998, was a geographical field conference, and by 2000 it was a geographical field conference, in which the focus was on geographical problems. The seventeenth conference, held in 2003, was a geographical field conference, and by 2005 it was a geographical field conference, in which the focus was on geographical problems. The eighteenth conference, held in 2008, was a geographical field conference, and by 2010 it was a geographical field conference, in which the focus was on geographical problems. The nineteenth conference, held in 2013, was a geographical field conference, and by 2015 it was a geographical field conference, in which the focus was on geographical problems. The twentieth conference, held in 2018, was a geographical field conference, and by 2020 it was a geographical field conference, in which the focus was on geographical problems.
FIGURE 29. A portion of Montfort area (from Finch, 1933).
DEFINITION OF THE FIELD

The definition of the field of geography which this paper endeavors to present is based on the assumption that geography has emerged as a field of study in its own right, separate from both history and economics. This definition is not based on any assumption about the nature of the field—whether it is a science or an art, or in between the two. Rather, it is based on the recognition that geography is a field of study concerned with the relationships between the natural and human environment, and that this relationship is studied through the analysis of spatial patterns and processes.

The central focus of geography is the study of the earth's surface and the relationships between the natural and human environment. This includes the study of the physical, cultural, and economic geography of various regions and their interactions. Geography is a multidisciplinary field that draws upon knowledge from a variety of other disciplines, including biology, geology, economics, and sociology.

The goal of geographic study is to understand the processes that shape the earth's surface and the relationships between the natural and human environment. This understanding can be used to inform decisions about land use, resource management, and environmental policy. Geography is a field that is relevant to a wide range of fields, including environmental science, urban planning, and international relations.

In conclusion, geography is a field of study that focuses on the relationships between the natural and human environment. It draws upon knowledge from a variety of other disciplines and is concerned with understanding the processes that shape the earth's surface and the relationships between the natural and human environment. Geography is a field that is relevant to a wide range of fields and is essential for informed decision-making in today's world.
AMERICAN GEOGRAPHY: INTENT, OBJECTIVE, AND PROGRESS

As the title suggests, "American Geography" is a study of the geography of the United States. It aims to understand the geographical factors that shape the nation's development, such as the climate, topography, and resources. The book covers the history of American geography, its methods, and its impact on public policy. It also discusses the role of geography in understanding social and economic issues.

The book is divided into several parts, each focusing on a different aspect of American geography. The first part, "Intheoretical and Methodological Foundations," introduces the theoretical framework and the methodology of American geography. The second part, "The Physical Environment," examines the physical characteristics of the United States and how they influence human activities.

The third part, "Human Geography," explores the interactions between people and their environment. It covers topics such as urbanization, migration, and cultural diversity.

The fourth part, "Growth and Development," focuses on the economic development of the United States and how geography has influenced it.

Finally, the fifth part, "Current Issues and Future Directions," discusses the current challenges facing American geography and the role it can play in addressing them.

Throughout the book, the authors emphasize the importance of understanding geography in making informed decisions about public policy and planning. They argue that a strong understanding of geography is essential for the well-being of the nation.

The book is written in a clear and concise style, making it accessible to readers with a wide range of backgrounds. It is intended for students, planners, and policymakers who want to understand the role of geography in shaping the United States.
a series of symposia for the discussion of geographical questions and eventually to publish a book on the results. Preston E. James and Clarence F. Jones were appointed to direct the project. With funds from the Social Science Research Council and the National Research Council a number of conferences were set up, each one to consider the controversial problems of the various parts of the field. The whole program called for wide discussion throughout the profession. The original drafts of chapters were read critically by members of the committees and were also presented to sessions of the Association and to university seminars throughout the country. The resulting book, therefore, represents the combined thoughts of between 100 and 200 geographers. In fact, a major accomplishment of the project was its stimulation of widespread discussion throughout the profession of the objectives, methods, and concepts of geography (James and Jones, 1954). The following is a list of the chapters and the principal author of each:

1. The Field of Geography, Preston E. James
2. The Regional Concept and the Regional Method, Derwent Whitley
3. Historical Geography, Andrew H. Clark
4. The Geographic Study of Population, Preston E. James
5. Settlement Geography, Clyde F. Kohn
6. Urban Geography, Harold H. Mayer
7. Political Geography, Richard Hartshorne
8. The Geography of Resources, J. Russell Whittaker
9. The Fields of Economic Geography, Raymond E. Murphy
10. Marketing Geography, William Applebaum
11. Recreational Geography, R. C. McMorris
12. Agricultural Geography, Harold H. McCarty
13. The Geography of Mineral Production, Raymond E. Murphy
14. The Geography of Manufacturing, Chauncy D. Harris
15. Transportation Geography, Edward L. Ullman
16. Climatology, John Leighly
17. Geomorphology, Louis C. Pelizier
18. The Geographic Study of Soils, Carleton C. Barnes
19. The Geographic Study of Water on the Land, Perrelli Meigs III
20. The Geographic Study of the Oceans, C. J. Burke and Francis E. Elliott
21. Plant Geography, A. W. Küchler
22. Animal Geography, L. C. Stuart
23. Medical Geography, Jacques M. May
24. Physiological Climatology, D.H.K. Lee

It is important that no one answer was to be expected regarding controversial issues. The purpose was to identify differences of opinion and, so far as possible, to eliminate differences among the definitions of words. The various chapters did not necessarily record an accepted version of geography, but they did express the variety of interests and points of view that were actually held by members of the profession at midcentury. Not the least important was the extensive bibliography of geographical writings included in each chapter (Woolridge, 1956; Woolridge and East, 1958).

Other articles analyzing or summarizing the geographical work of the period between World War I and the decade of the 1950s include: J. Brunhes (1925), C. Sauer (1927), A. E. Parkin (1934), R. Hartshorne (1935), C. Colby (1936), and G. Heifer (1938). Two books that reveal much American geography during this period include T. G. Taylor's collection of essays on Geography in the Twentieth Century, which was discussed earlier (Taylor, 1951); and J. K. Wright's story of the activities of the American Geographical Society from 1851 to 1951 (Wright, 1952).