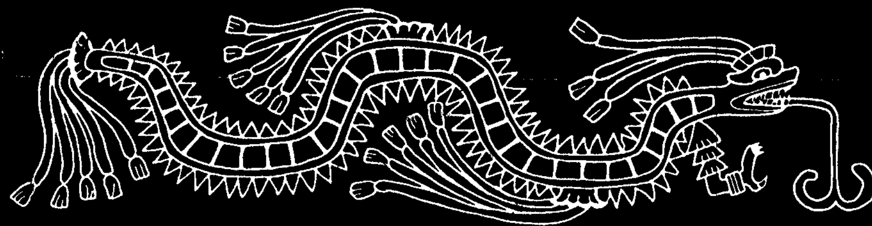

GREAT TOWNS AND REGIONAL POLITIES

IN THE PREHISTORIC AMERICAN SOUTHWEST, AND SOUTHEAST

E D I T E D B Y

Jill E. Neitzel

Great Towns and Regional Polities

in the Prehistoric
American Southwest and Southeast

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CHAPTER FIFTEEN

Examining Chiefdoms in the Southeast:

An Application of Multiscalar Analysis

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MULTISCALAR ANALYSIS IS A POWERFUL TOOL FOR studying long-term change in the archaeological record. In this chapter, I use this approach to evaluate the importance of variables traditionally used to explore culture change in the Late Prehistoric Southeast. My analyses rely on data for a series of geographic scales from a number of Mississippian societies. My goal is to help develop a better understanding of the emergence and subsequent development of the region's chiefdoms.

Chiefdoms were present throughout the Southeast less than half a millennium ago. Thus, unlike those parts of the world where the first states arose, their archaeological remains are comparatively recent, relatively well preserved, and only rarely covered by subsequent occupations, although they are seriously threatened by our own civilization's growth. In addition, an extensive ethnohistoric record describing these societies survives from the period of initial European contact.

The Southeast's archaeological data base is truly massive, and thanks to more than a century of near-continuous investigation, the region has one of the best documented archaeological records in the world from which to examine the evolution of chiefdom societies. Through 1994, for example, more than 180,000 archaeological sites were recorded in the lower Southeast, and of these almost 20,000 had components dating to the Late Prehistoric and initial contact era between ca. A.D. 800 to 1600. Hundreds of these late period sites have had at least some level of excavation, and dozens have been extensively excavated and reported. Particularly intensive bursts of fieldwork occurred during three periods: during the 1880s and early 1890s when some 2,000 mounds were examined by the Mound Division of the Bureau of Ethnology; during the public works era of the 1930s and early 1940s when dozens of large village and mound sites were completely excavated; and during the past quarter century, when tens of thousands of sites have been recorded and many hundreds intensively examined as a result of federally-mandated cultural resource management activity (Anderson 1997a; Bense 1994). This massive data base and long history of research have made the construction of fine-grained cultural sequences possible in many areas, permitting us to monitor closely changes that occurred as chiefdoms emerged and evolved.

How can this record be used to achieve the objectives of this paper? Multiscalar analyses proceed by examining at different geographic scales the effects of single (isolated) and multiple (interrelated) variables on individual societies and across multiple societies. Calls for the adoption of such a perspective in exploring chiefdom political changes are beginning to appear in the Southeast (e.g., Smith 1990:3, 8), as in other parts of the world (e.g.,

Earle 1991:4,13; Upham 1990:97). Applications in the Southeast have most typically examined evidence for prestige-goods exchange, status differentiation, warfare, or settlement variation (e.g., Blitz 1993; Hally 1993; Hally et al. 1990; Steponaitis 1991, Welch 1990a).

In this paper, I build on this previous work by presenting three examples of multiscalar analysis. First, a brief examination of the Mississippian occupations within a single drainage, the Savannah River basin, is provided to show how the archaeological record from individual sites and within given localities can only be understood by employing data from a number of geographic scales. Second, data from a number of Southeastern societies are compared to illustrate the insights that can be gained from a broad, general application of the multiscalar approach. Finally, the approach is used to evaluate and refine models of culture change surrounding Mississippian emergence, expansion, and collapse. My overall objective is to show that the adoption of multiscalar analysis is essential and ideally suited to the formulation and testing of models of long-term societal change.

Exploring Change in a Specific Locality

Research in the Savannah River basin of Georgia and South Carolina illustrates how use of a multiscalar perspective can elucidate the causes of culture change. To date, more than 500 Mississippian components have been identified in the basin, and extensive excavations have occurred at more than two dozen sites, including most of the known mound centers (Anderson 1990, 1994, 1996a; Anderson et al. 1986). Cultural sequences are detailed enough to permit the dating of components to within roughly 100 years. This degree of chronological control, in combination with the extensive survey and excavation data, makes it possible to examine culture change from a number of scales of analysis.

The Savannah River Basin Chiefdoms

Simple and complex chiefdoms rose and fell in the Savannah River basin over a span of four centuries. The initial appearance of simple chiefdoms is evidenced by the first Mississippian ceremonial centers sometime between A.D. 1100 and 1150 (Figure 15.1). By approximately A.D. 1200, simple chiefdoms were centered around sites with one or two mounds scattered throughout the basin. By A.D. 1350 (Figure 15.2), however, the political landscape changed dramatically. Most of the small centers were abandoned, and two major multimound centers, presumably the ceremonial and political foci of complex chiefdoms, were present in the central part of the basin. By A.D. 1400 or so (Figure 15.3), only one of these large centers was left in the central basin. Soon after A.D. 1450, it too collapsed and the central and lower basin was abandoned. Further upriver, small mound centers not only continued but may in fact have expanded, possibly as the result of population movement from lower in the basin.

The pattern of the lower portions of the basin being abandoned before those further upriver may have been linked to variation in the basin's size and productivity. The lower Savannah basin is quite narrow. It has few well-defined terraces along its margins and extensive pine forests in the interriverine area. In contrast, the upper Savannah basin is characterized by pronounced relief, better defined terraces, and a richer deciduous canopy. Thus, chiefdoms lower in the basin may have relied on a less productive resource base, making them more vulnerable to stress than their neighbors upstream.

The Broader Context of the Savannah River Basin Chiefdoms

Turning to a larger geographic scale, the Savannah River basin is comparatively small, and Mississippian societies occupying it may have been at something of a disadvantage in competition with groups occupying the much larger Oconee and Santee/Wateree basins to the north and south, respectively. In the sixteenth century these larger basins were occupied by powerful chiefdoms, which the Spanish described as the provinces of Ocute and Cofitachequi. De Soto expedition chroniclers amply document relations between the Ocute and Cofitachequi during the early historic era as being characterized by rivalry and enmity. This competition probably had a long history and may have taken place at the expense of the elites and commoners in the Savannah River chiefdoms who were caught in the middle.

Coupled with these broad scales, political conditions, the period between the late fourteenth through late fifteenth centuries was a time of moderate environmental deterioration, which would have placed the agriculturally-based Savannah River basin chiefdoms under considerable stress. Rainfall reconstructions derived from bald cypress tree-ring data indicate that growing season precipitation was below average over much of this inter-

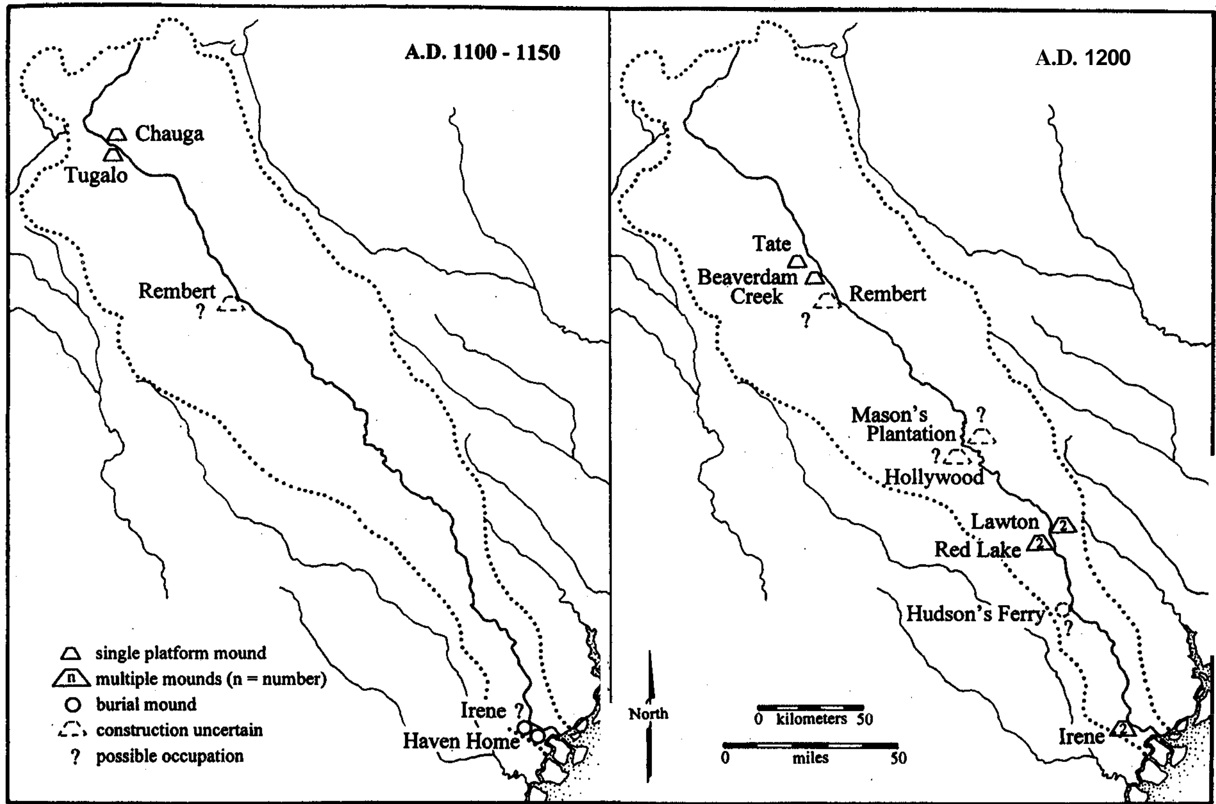

Figure 15.1. Political change in the Savannah River basin, A.D. 1100–1150 and A.D. 1200.

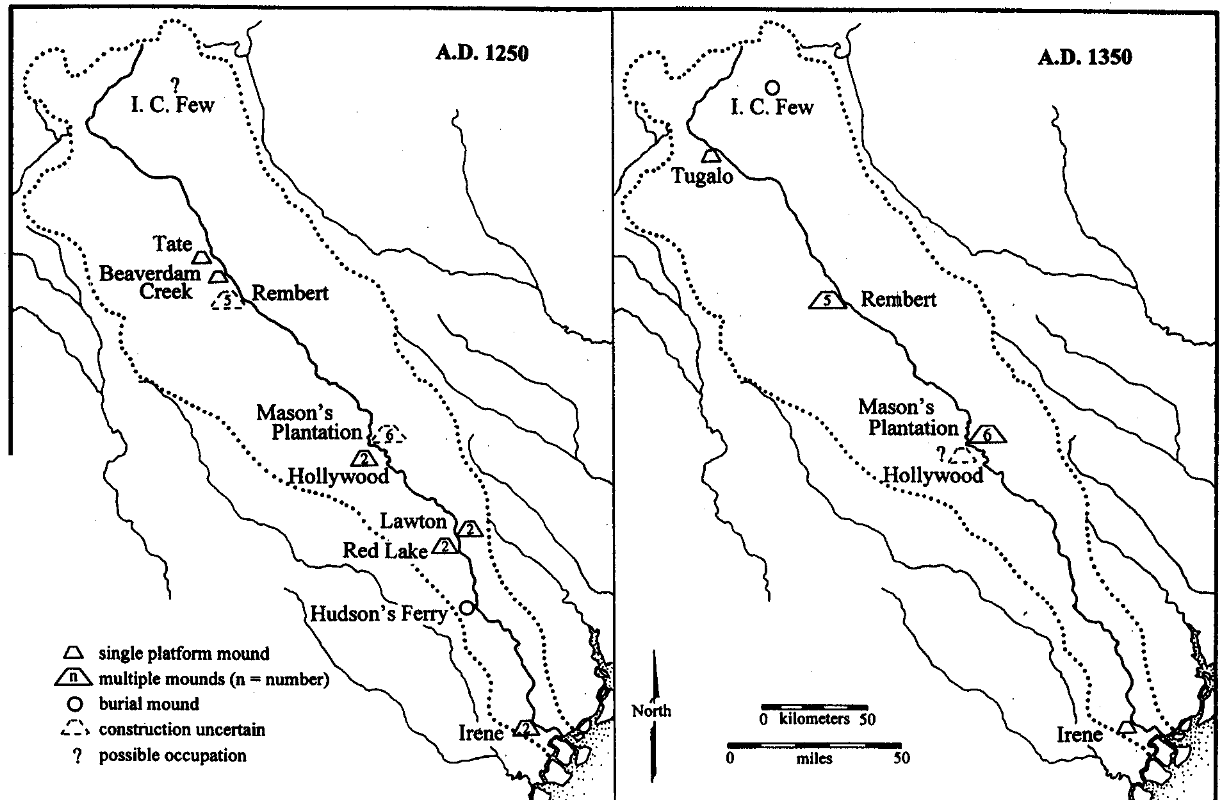

Figure 15.2. Political change in the Savannah River basin—A.D1250 and A.D. 1350.

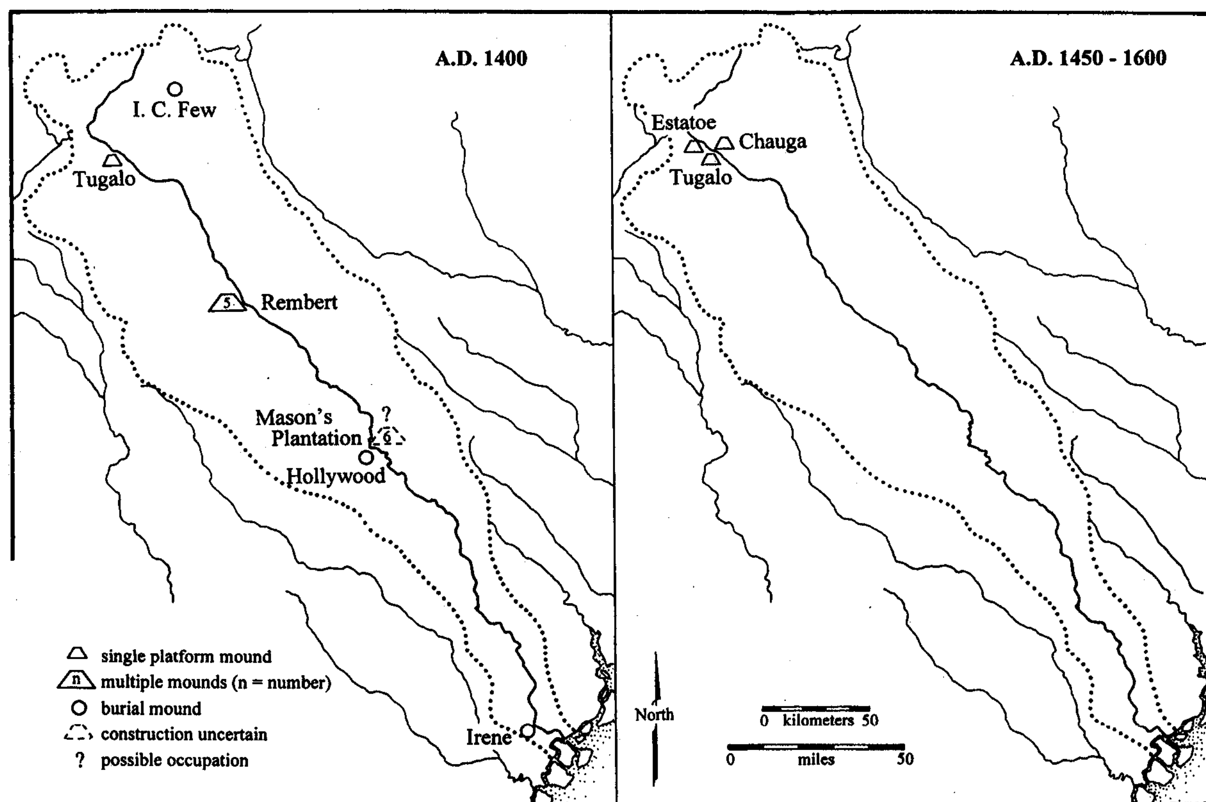

Figure 15.3. Political change in the Savannah River basin—A.D1400 and A.D. 1450–1600.

val (Anderson et al. 1995). Declining harvests would have hampered the ability of elites to mobilize tribute and may have forced an increased reliance on wild plant and animal resources from the interriverine buffer zones. However, this wild resource exploitation may have been difficult due to the presence of the powerful Ocute and Cofitahequi chiefdoms on the opposite sides of the buffer zones. The ultimate abandonment of the Savannah River basin suggests that the local chiefly elites failed to respond effectively to these broader scale, political and environmental challenges.

Site Types

At a smaller scale of analysis, five major site types can currently be identified in the Savannah River basin at one time or another over the Mississippian period. These include: 1) "vacant" ceremonial centers'or chiefly compounds (after Williams 1996) where little evidence has been found for permanent occupation by more than a few people, yet where large numbers of people apparently came together for short intervals for collective ceremonial activities; 2) permanently occupied ceremonial centers with large residential populations present year round; 3) organized villages occupied for extended periods; 4) isolated hamlets, also occupied for extended periods; and 5) short-term, presumably nonresidential sites where hunting, collecting, or other specialized activities occurred.

To make sense of events documented for any one of these site types requires that comparisons be made with

the other site types as well. For example, shifts in the locations of both villages and hamlets can be linked to the location and stability of regional ceremonial centers and to climatic conditions. When political conditions were stable and polities were at relative peace, and when the climate was favorable to the production of agricultural surpluses, people appear to have dispersed into a series of unfortified villages and hamlets, congregating periodically at otherwise "vacant" ceremonial centers. In contrast, when hostilities were pronounced, or when climatic conditions were unfavorable, population nucleation into larger fortified communities occurred.

While the need to compare developments at different site types, which represent embedded scales of interaction, may seem obvious, interpreting the results of such comparisons can be difficult. Take, for example, the case of hamlets that were common in parts of the basin whose distributional shifts have been linked, as noted previously, to the location and stability of ceremonial centers. However, the nature of this linkage is unclear. In the lower basin, early Mississippian hamlets were located both along and away from the river, while Middle Mississippian hamlets (from the period just prior to the abandonment of the lower basin) were located almost exclusively away from the main channel. This locational shift may have been a defensive measure—an attempt literally to hide from raiding groups, who favored the major transportation arteries. Alternatively, given that complex chiefdoms had emerged in the central basin during the Middle Mississippian, some of the observed population relocation may have been an attempt by local populations to avoid or lower their tribute burden.

Rucker's Bottom

Changes in the political landscape can be seen at a still smaller scale at Rucker's Bottom, the basin's one Mississippian village that has been intensively studied (Anderson and Schuldenrein 1985). Located in the central basin, this village was small throughout its occupation, never exceeding a hectare in size and with a population on the order of 90 to 150 people. These occupants were commoners, and skeletal analyses indicate that they were subject to considerable disease stress. This village was a part of a larger chiefdom, and the villagers were undoubtedly subservient to the elites ruling this society. However, the presence of communal buildings in both the early and later occupations of Rucker's Bottom indicates that at least some decision-making was under local control.

The archaeological record of Rucker's Bottom appears to reflect conditions in the larger polity and interpolity region. Changes in the larger political landscape are indicated in a number of ways. Settlement shifted from an open, roughly circular arrangement of houses around a central plaza during the twelfth and thirteenth centuries to a similar arrangement of structures around a plaza in the north-central part of the terrace during the fourteenth and early fifteenth centuries. This later community was fortified, first by a semicircular enclosure and later by a rectangular ditched and stockaded enclosure. During this time, Rucker's Bottom also grew larger, suggesting the increasing concentration or nucleation of local populations, perhaps as a defensive measure. The appearance and increasing complexity of the fortifications suggest that hostilities were occurring during the century before the abandonment of the central and lower basin. The causes of these hostilities were probably the broader scale political and environmental conditions discussed previously,

Analyses of a range of data categories at a still smaller scale, the household or feature level, help us to understand how and why something as dramatic as the abandonment of much of a river basin could have occurred. Paleosubsistence analyses undertaken at the Rucker's Bottom site suggest an increase in land clearing and a greater use of acorns in the years immediately before abandonment (Moore 1905). As climate was deteriorating locally and warfare was increasing, the villagers' response appears to have been to increase farming activity and the gathering of wild plant resources like acorns, probably to make up for harvest shortfalls or surpluses lost to raiding.

During most of Rucker's Bottom's history, maize storage is assumed to have been in aboveground facilities, or barbacoas, like those reported by the early Spanish explorers. Many small circular and rectangular post arrangements have been excavated and interpreted as possible storage sheds or corn cribs (Judge 1991). In the last village occupation prior to site abandonment, these structures were located in prominent positions in the village, adjacent to the probable council house and near the rectangular palisade wall. Anyone accessing these facilities would have beeg clearly visible, something that may have facilitated their defense from raiders. What appear to be massive subterranean storage features were also constructed at the site during its final occupation, suggesting a desire to hide food supplies or restrict their use.

Summary

Elsewhere I have argued that the dramatic changes observed in the late prehistoric archaeological sequence of the Savannah River basin were caused by a complex array of factors (Anderson 1994, 1996a,b). These include: 1) weaknesses inherent to chiefdom organizational forms in general, such as divisive factional competition centered on chiefly succession and the allocation of wealth and power; 2) shifts in the structure of the local and regional political organization; and 3) short- and long-term changes in climate, and their effects on local and regional patterns of resource availability.

While my explanations require additional testing, what I have presented here should illustrate how investigating'the causes of culture change can proceed at many different scales and with many kinds of data. In fact, accurately interpreting the local archaeological record in the Savannah River basin would probably not be possible without a multiscalar perspective.

Exploring Culture Change at the Regional Level

Comparative analyses of Mississippian chiefdoms can be productive in two ways. First, by placing individual chiefdoms in their broader contexts, such analyses can make developments within those chiefdoms more understandable, as in the Savannah River basin. Secondly, by revealing the similarities and differences among Mississippian chiefdoms, such analyses can provide the basis for formulating explanatory models of culture change for the Southeast in general. In this section, comparative data on a series of Mississippian chiefdoms are presented in a multiscalar format. The following section uses these data to consider the problem of formulating models of culture change.

The data considered here consists of qualitative summary information on organizational change, agricultural intensification, populationldemographic trends, prestige-goods exchange, craft specialization, and warfare for a dozen localities selected to maximize geographical and organization diversity across the Southeast (Figure 15.4). The scales or levels of analysis encompass the household, community, chiefly polity, and interpolity regions (see Earle 1991:4).

Qualitative summary data rather than quantitative values are used because this is the kind of information most typically available in the published literature. While a number of exceptional analytical studies exist that have explored some of these variables quantitatively, they have typically focused on small samples or on only one or a few localities, rendering comparative analyses difficult. Thus, for example, while population estimates and settlement spacing have been calculated for every known center and village within the Coosa polity (Hally et al. 1990), this kind of data remains to be developed elsewhere in the Southeast. Fortunately, detailed quantitatively-based analyses are appearing with increased incidence, offering great hope for the future. Examples of such studies include analyses of site size or mound volume across the region (e.g., Holley, Chapter 2; Muller, Chapter 11), of mound center longevity and spacing (e.g., Scarry, Chapter 5; Hally 1993, 1996b), and of prestige grave-good incidence over time (e.g., Anderson 1994; Steponaitis 1991; Welch 1991). The value of the qualitative data considered here is that it permits comparisons of multiple variables, cases, and scales. Even the simplest comparisons reveal important trends, which currently cannot be discerned in more focused, quantitatively-based studies.

Organization

Evidence for organizational change has received intensive study across the region, and a number of attributes have been associated with the emergence, expansion, and collapse of chiefly polities (Table 15.1). Architectural correlates of chiefdom emergence in the Southeast include, for example, the disappearance of council houses and the appearance of elite residences both atop and away from mounds, presumably reflecting changes from collective/egalitarian to hierarchical/elite decision-making apparatuses. In contrast, chiefdom collapse is correlated with the disappearance of elite residences and sometimes with the reappearance of council houses.

Fortifications, besides signaling periods when conflict was widespread (such as during the Late Mississippian period), are also observed when chiefdoms first appear in some areas (i.e., in northeast Arkansas at the Zebree site, at several centers along the Savannah River, and at Town Creek in North Carolina). This suggests that Mississippian emergence was not an altogether peaceful development and, at least in some areas, involved competition or conflict between groups.

The occurrence of fortifications also provides clues about regional political relationships later in the Missis-

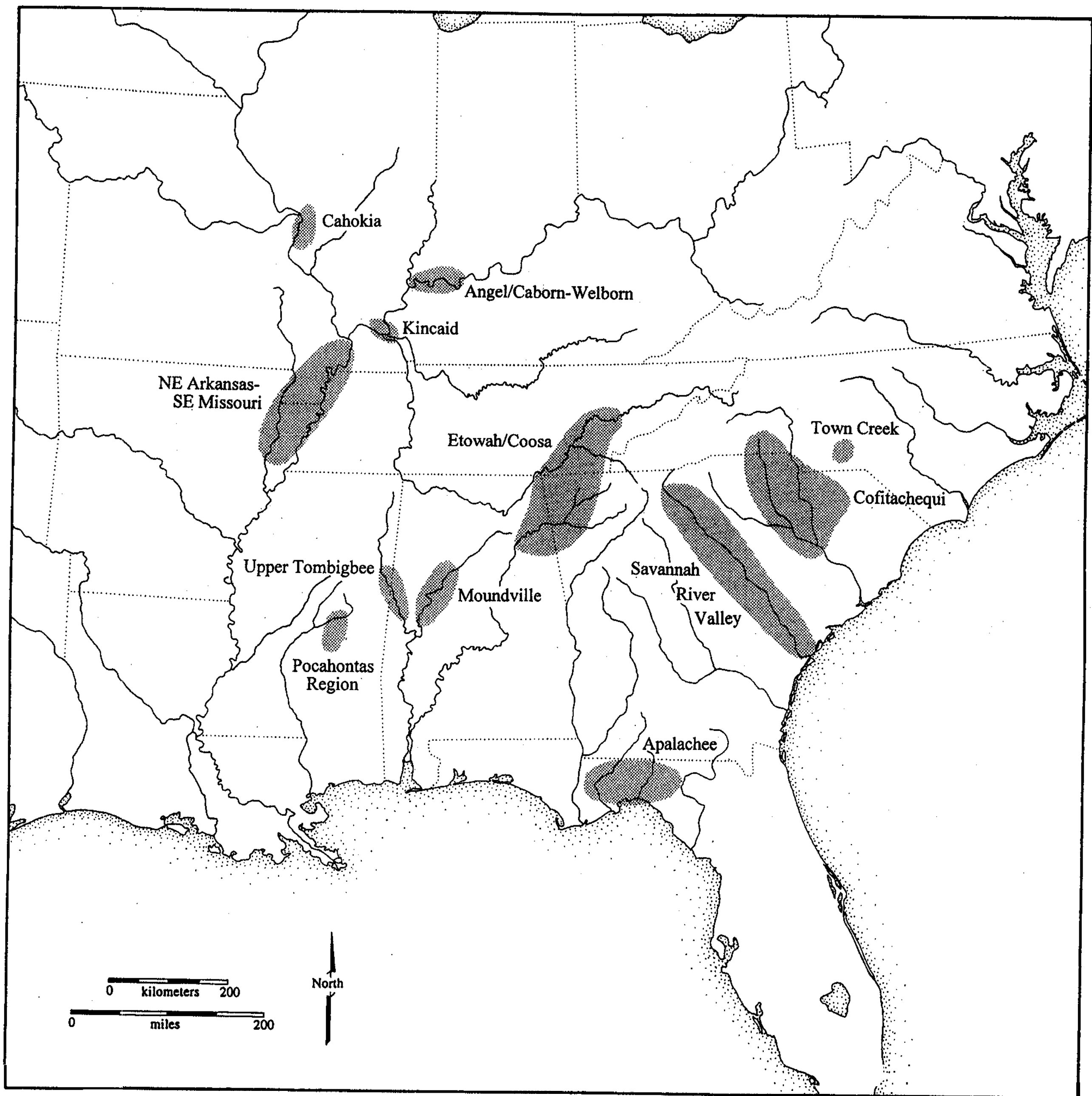

Figure 15.4. Areas used in comparisons.

sippian era. The expansion of the complex chiefdom at Moundville, for example, appears linked to the disappearance of fortifications at centers in nearby areas (i.e., at Lubbub Creek along the Tombigbee), and the outright disappearance of societies from other areas (Welch 1990b, 1991). This suppression of potential rivals seems to have been a common strategy by elites in complex Mississippian chiefdoms.

Individual construction stages in Southeastern mounds are commonly thought to reflect successional episodes, specifically demarcating the replacement of one chief by another. Taken collectively, periods when mound stages were being added without interruption are viewed as probable measures of polity duration, or the lifespan of politically successful chiefly lineages at a given center. Mound stage construction appears to have occurred about once a generation or so at many sites. Since more than four to six successive stages are only rarely present without major interruption, some researchers have suggested that Southeastern chiefdoms usually did not last more than 50 to 150 years (Anderson 1994; Hally 1993, 1996b).

Just as centers were occupied, abandoned, and sometimes reoccupied, so too were much larger parts of the region at various times during the Mississippian era. The abandonment of chiefdoms over large parts of the central Mississippi Valley and along the central and lower Savannah River in the Late Mississippian period are among the most dramatic examples of sweeping organizational change known from the region (Anderson 1994, 1996a,c; Williams 1990).

Demography

While little firm data exists as to the actual numbers of people present in various parts of the Southeast, evidence about settlement distributions is on secure footing in many areas (Table 15.2). During the period of Mississippian emergence appreciable demographic variability is evident across the region, with little evidence for uniformity in either settlement change or population growth. In some areas, for example, small villages were replaced by a dispersed hamlet/center settlement pattern (i.e., in the American Bottom around Cahokia and in western Alabama around Moundville), while in other localities dispersed populations aggregated into larger villages and centers, at least for portions of the year (i.e., in southwestern Indiana around Angel and along the upper Tombigbee in Mississippi near Lubbub Creek). While population growth may have been occurring at this time, population reorganization is what stands out in the archaeological record.

Comparable settlement variability likewise characterizes localities where chiefdoms have time-depth. In parts of the region the only settlements away from major centers are small farmsteads and hamlets, while in other areas hamlets and villages, or just villages may occur away from the centers. The larger polities in terms of numbers of people are typically the most complex organizationally, a pattern characteristic of pre-state societies throughout the New World (Feinman and Neitzel 1984).

Major population change unquestionably occurred during the Mississippian era, with particularly dramatic examples including large scale abandonments like those noted previously or the dramatic expansion in the size of some centers (i.e., at Moundville and Cahokia). Whether these large scale changes reflect actual population growth or decline within the larger region, or merely population relocation or reorganization, is unknown.

Subsistence

Agricultural intensification is clearly associated, on a broad level, with the emergence of chiefdoms across the region (Table 15.3). Examining specific cases, however, it appears that the adoption of intensive maize agriculture preceded the Mississippian emergence in some areas (i.e., along the upper Tombigbee, in northern Florida), paced it in others (i.e., in the American Bottom, in the Savannah River Valley), and did not occur until appreciably later in still other areas (i.e., in northeast Arkansas). The adoption of intensive maize agriculture appears to have spread across the region faster than Mississippian political organization itself. However, in areas unusually rich in wild food resources, maize did not become a major element of the diet until after Mississippian emergence, even in areas where Mississippian political organization arose early, as in the central Mississippi Valley (i.e., in northeast Arkansas at Zebree).

Subsistence resource procurement likewise tended to be highly diversified in unusually rich locales, while in other areas it became increasingly focused over time (i.e., directed to a few crops and game species). A possible reason for this contrast is that the labor requirements associated with agricultural intensification may have forced a restriction of hunting effort to one or a few species offering a high rate of return (Speth and Scott 1985). Interestingly, when complex Mississippian societies collapsed, use of maize may have declined as well. This is

clearly the case at the Irene site along the lower Savannah River (Larsen et al. 1992), although the pattern is by no means universal. Over the region it appears that the appearance of intensive agriculture may be more closely linked to major patterns of population growth than to the emergence of chiefdom organization.

Population skeletal health, a direct measure of the effectiveness of provisioning systems, appears closely tied to organizational complexity across the region. Population health for all segments of Mississippian society was generally better in the most complex chiefdoms than it was in simpler societies, unless the less-complex chiefdoms were located in resource-rich areas (e.g., Hatch 1987; Powell 1988). This patterning also appears related to societal stability and longevity. Typically, the largest chiefdoms were among the longest-lived, indicating that they had developed highly successful strategies for reducing subsistence-related stress. These strategies were most likely tied to maximizing production of and control over subsistence surpluses. Finally, more than maize was involved in the subsistence tributary base of the Mississippian political economy. Evidence for the provisioning of elites with choice game such as deer meat has been recovered in some areas (i.e., Savannah River Valley, upper Tombigbee drainage) (Jackson and Scott 1995).

Prestige Goods Exchange

Prestige goods exchange and use varied appreciably over the region (Table 15.4). Distributions of specific goods indicate that interaction spheres existed and varied in size, and that regional political geography shaped the flow of goods. The larger centers appear to have constrained the use or even the receipt of prestige goods by populations at smaller centers, both in areas under their direct control and in adjoining polities. Thus, the emergence of the presumed Moundville paramount chiefdom after A.D. 1200 is tied to a diminution in prestige-good incidence in smaller societies to the west, along the Tombigbee and in the Pocahontas region of Mississippi (Blitz 1993; Steponaitis 1991). Prestige goods flowed to major centers of power where they would have proven useful to the elites. How these exchange systems actually operated, however, is poorly known at the present.

An interesting consequence of the apparent centralization of control over long distance exchange was that extralocal materials or "prestige goods" came to be viewed differently in societies of differing levels of complexity. Elites in the more complex Mississippian chiefdoms exercised considerable control over the use of prestige goods in their own societies, often restricting the use of specific goods to particular social segments. In these societies prestige goods were used to signal status, with specific goods or items viewed as insignia of rank. In contrast, prestige goods in less complex chiefdoms tended to occur (if they occurred at all) more widely over all segments of society and were viewed as wealth items.

The maintenance of prestige goods exchange networks across the region does not appear to have been crucial to the successful operation of many Mississippian chiefdoms. Exchange waxed and waned over time and was quite important during some periods and less so during others. From a pronounced peak in the thirteenth century, when the Southeastern Ceremonial Complex was at its height (Muller 1989), evidence for long-distance exchange declined markedly in the fifteenth and sixteenth centuries. However, even given this decline, many chiefdoms both large and small continued to function in the Late Mississippian period. Even during earlier periods there is evidence from a number of areas that ceremonial centers continued to be occupied, and mound stages continued to be added, well after a major decline in prestige goods incidence occurred (Anderson 1994; Steponaitis 1991; Welch 1991).

Craft Specialization

Evidence for the existence of full-time craft specialists, something often advanced as a hallmark of fairly complex society, is ambiguous over the region (Table 15.5). There is little doubt, however, that the specialized manufacture of a wide range of goods by small segments of the population occurred in a number of Southeastern societies. In most cases, however, this production appears to have been a part-time affair conducted as one part of everyday life. Evidence for the existence of full-time craft specialists supported by an elite is not obvious, although an extensive and sometimes quite impassioned debate does admittedly exist on the subject. Modifying a "rule" advanced by Yoffee (1993:69) to encompass similar arguments about whether or not states are present in an area. I suggest that since we can argue heatedly about whether or not craft specialization occurred, it probably did not at any level of importance (that is, if it occurred enough to matter, the evidence would be dear cut). The comparative data does indicate that considerable variation occurred in the production and use of specialized goods over the region. In some polities these goods were apparently produced by

elites, or at least made at elite centers, while in other societies they were more widely produced at farmsteads, villages, and centers, possibly by elites and commoners alike.

Warfare

Mississippian chiefdoms appear to have both constrained warfare and given it reign in new forms over the region (Table 15.6). The Mississippian emergence witnessed a decline in warfare compared with the preceding Late Woodland period in some areas (i.e., at Moundville and along the Tombigbee), while in other areas it was accompanied by the appearance of fortifications around sites, suggesting disagreements with local or nearby groups.

Differing solutions to perceived threats were adopted throughout the Mississippian era. In some areas populations nucleated. In others they remained dispersed, yet converged on fortified centers during periods of conflict. Additionally, in some areas attempts were apparently made to conceal stored food reserves during periods of unusual stress.

There appear to have been periods when warfare occurred with greater or lesser intensity across the region as a whole. The Late Mississippian in particular appears to have been a time of increased strife across the region. Settlement nucleation, improved fortifications, and an increased incidence of weapons trauma on skeletal remains has been observed at this time in a number of areas, suggesting increased frequency or intensity of conflict. This is probably directly tied to the decline of the region-wide prestige goods exchange network that occurred following the Middle Mississippian period. This network would have facilitated interaction and alliance formation between elites in differing polities, fostering cooperation rather than conflict. A decline in mound building also occurs during the Late Mississippian period, and it has been suggested that societal energies were increasingly directed to defense rather than to ceremonialism.

Evaluating Models of Culture Change in the Southeast

The data presented in the preceding section provide a basis for developing explanatory models for culture change in the Southeast, models that may offer insights for archaeologists working in other parts of the world as well. In the Southeast, the three questions that have been the focus of efforts to formulate explanatory models all pertain to the general topic of chiefdoms. First, how and why did such societies evolve in the Southeast? Second, once chiefdoms appeared, how and why did they spread? Finally, how and why did these societies collapse, individually and collectively? Each of these questions is considered below.

Models of Chiefdom Emergence

In the introduction to a volume addressing the problem of how and why chiefdoms arose in the Southeast, Smith (1990:1–2) noted that the major frameworks advanced to explain the Mississippian emergence comprised a seeming polar opposition, what he called the homology/analogy dilemma. The homology or "historical relatedness" position sees the emergence of chiefdoms across the region as due to the movement of people or innovations from a central core area, with their survival or selection due to the adaptive advantage of new organizational forms. The alternative, analogy or "process" position views the Mississippian emergence as "independent and isolated cultural responses to similar challenges" (Smith 1990:2). Although the record of Mississippian emergence is superbly documented in many localities, Smith (1990:1–2) has observed that it is "far from clear to what degree this broadly similar process of cultural transformation was due to developmental interaction between river valley societies in transition, as opposed to their independent response to similar developmental constraints and opportunities." Explanatory mechanisms or frameworks are not well worked out, although the role of a few key variables have been explored, such as the use of maize or other domesticates (i.e., the impact of agricultural intensification), demography (i.e., the impact of population growth and pressure), and trade (i.e., the importance of elite/prestige goods exchange). Recognizing that "there is no single, simple, all encompassing and comforting theoretical explanation for the Mississippian emergence" (Smith 1990:2–3), Smith has argued that the best way to identify and evaluate the factors that led to the Mississippian emergence is through the adoption of a multiscalar analytical approach that:

> **. . . seeks out and accommodates information from the full range of nested levels, ranging from basic economic unit households up through regional systems . . . [we] need to simultaneously consider and pursue explanations of Mississippian origins on a number of nested levels [employing] multiple, if partial, explanations from a variety of theoretical perspectives (Smith 1990:3,8).**

Whatever brought about the emergence of chiefdoms across the Southeast, the simple comparison of developments in a number of localities **highlights** the inadequacy of prime-movers, or single causal factors (Table 15.1–15.6). Patterns of organizational change varied appreciably during the period of Mississippian emergence. In some areas such as the American Bottom, small villages were replaced by a center-hamlet dichotomy, while in other areas such as along the Savannah River, hamlets were replaced by nucleated **villages** and centers (Table 15.1). Population distributions appear to have varied widely over the region, rendering it difficult to accept that any one trajectory or critical threshold was required before chiefdoms could emerge (Table 15.2). Likewise, agricultural intensification, leading to either population growth and pressure or storable surpluses promoting elite prestige goods exchange, has been suggested as a factor in the emergence of chiefdoms. However, comparative analysis makes it clear that in differing areas the adoption of intensive agriculture preceded, was contemporaneous, or even postdated the Mississippian emergence (Table 15.3). Arguments linking the Mississippian emergence to agricultural intensification or population pressure—usually focusing on the control of subsistence-generating resources like prime agricultural soils or hunting territories—are particularly hard to accept since large portions of the region remained unoccupied even after intensive agriculture was widely adopted and chiefdoms were present over much of the landscape. Settlement distributions appear to have been shaped as much as by political as by environmental conditions.

The importance of prestige goods exchange likewise appears to have varied greatly over the region (Table 15.4). The data clearly indicate, however, that the growth of political centralization and the development of prestige goods exchange networks in the Southeast were closely linked. Accordingly, the purpose of exchange may not have been merely to promote alliance formation (e.g., Brown et al. 1990:253), but also to facilitate the accumulation of wealth and power in the hands of individuals and lineages. It is possible that demand for prestige goods may have contributed to agricultural intensification and organizational changes by generating increased requirements on subsistence production (i.e., to generate and control the surpluses needed to acquire prestige goods). While trade was indeed "an instrument of political activity" (Brown et al. 1990:255), its result was the accumulation of power, which was maintained for its own sake. However, once chiefdoms were in place, and elite power was centralized and reasonably secure, the importance of trade goods for the maintenance of elite authority declined. As Drennan (1991:281) has it, once chiefdoms are in place, long-distance trade "provided the plumes of the chiefly peacock, not its basic diet." The decline of the Southeastern Ceremonial Complex after ca. A.D. 1250 may reflect such a broad-scale evolutionary process.

The variable of prestige goods exchange illustrates how the timing and interrelationships between many variables need to be considered to understand Mississippian emergence. At Emergent Mississippian sites like Range in the American Bottom (Kelly 1990a), shifts in community plan over time evidence increasing social differentiation, including the probable emergence of ranked population subsets. A recently favored explanation for this emergent ranking has been elite competition and associated prestige goods exchange, leading to the accumulation of wealth and power and the development of permanent status differences within privileged lineages. However, this explanation has little empirical support, since the documented occurrence of elite/prestige goods in emergent Mississippian settings is minimal. Extensive elite exchange did occur throughout the region by early Mississippian times (ca. A.D. 1000–1100), peaked by ca. A.D. 1200 or so, and declined after that. Thus, while prestige goods exchange apparently was not the cause for the emergence of chiefdoms, it may have played an important role in their subsequent development.

The Spread of Mississippian: Timing and Precursors

While chiefdoms emerged across the Southeast within no more than 300 years, from ca. A.D. 900 to 1150 or so, there is an apparent time-transgressive west to east spread of the adaptation in the region (Table 15.7; Figure 15.5). Chiefdom societies are present after ca. A.D. 900 in the central Mississippi River Valley, but do not appear in places like Moundville until ca. A.D. 1050, and only after ca. A.D. 1100–1150 in the Carolinas. While few now believe that waves of chiefly elites moved out of a central/lower Mississippi River Valley heartland, it may be that chiefdom organizational forms in the late prehistoric era did indeed first arise in this area, and spread through a process of both competitive emulation and defensive reaction (Anderson 1997b).

Given the scarcity of evidence for chiefdom organizational spread through migration (something now suggested in only a few areas such as at Macon Plateau in central

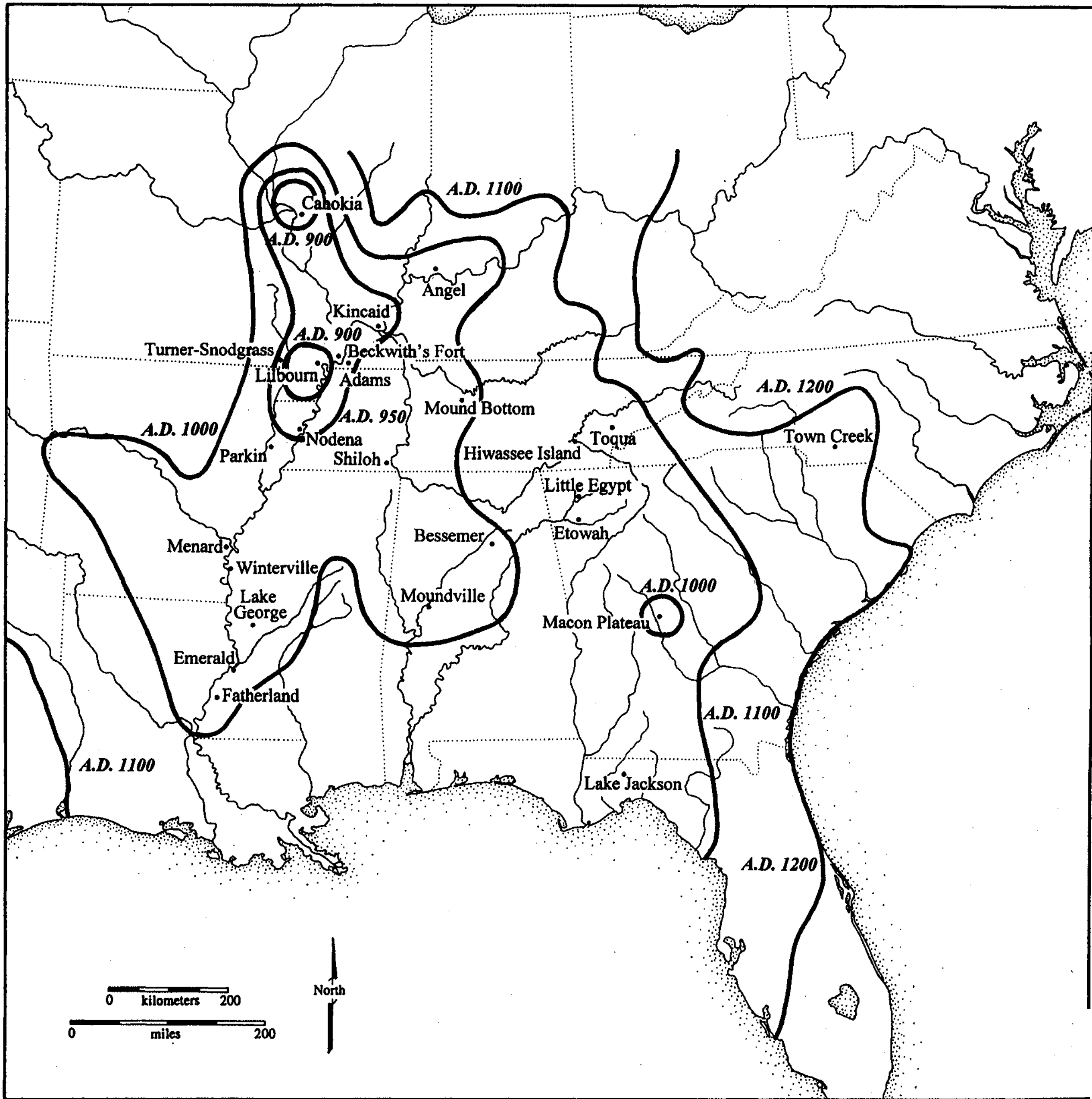

Figure 15.5. Inferred spread of chiefdoms in the Southeast.

Georgia or at the Zebree site in northeast Arkansas) and the fairly dear indication for in situ development in many areas, a direct movement of people as the primary cause of the Mississippian emergence over the region is unlikely. Instead, the spread of chiefly organization was more likely something of a reactive process. Following arguments by Carneiro (1970, 1981), if the first chiefdoms were predatory, chiefdoms may have emerged across the region as a defensive reaction. Alternatively or additionally, they developed to allow privileged lineages to participate more effectively in expanding trade and status-based, power-enhancing games through a process of competitive emulation.

We need to look very carefully at preexisting conditions, the long historical trajectories leading to the critical two centuries when the Mississippian emergence occurred. Until quite recently there has been an unfortunate tendency for researchers to simplify Middle and Late Woodland organizational complexity (but see Nassaney and Cobb 1991), with the result that the Mississippian emergence appears all the more impressive and disjunctive. However, many of the largest mound and other earthen constructions and some of the most elaborately furnished burials in the region occur well before the Mississippian era at Middle or Late Woodland centers like Pinson, Kolomoki, Lake George, and Toltec. We need to consider the kinds of organizational forms that could have produced these remains, and how their existence shaped subsequent developments.

Likewise, care must be taken to differentiate between the evolution and spread of chiefdom organizational forms over the region and the spread of Mississippian ideology (Pauketat and Emerson 1997). The former (i.e., chiefdom-like societies) appears to have emerged in the ninth and tenth centuries, if not before, in some areas. The latter (i.e., Mississippian ideology and religion) appears to have developed or crystallized in the tenth and eleventh centuries, after chiefdoms themselves had emerged in a number of areas, and Cahokia seems to have been the primary center where this took place. "Mississippian" increasingly is thus coming to be recognized as an ideological/religious system that a number of the region's chiefdoms participated in, and whose origin and spread owe a great deal to the early and dramatic emergence of Cahokia (Anderson 1997b; Emerson 1997; Knight 1986; Pauketat 1994, 1997; Pauketat and Emerson 1997).

Models of Chiefdom Development and Decline

By ca. A.D. 1100 or shortly thereafter the Southeast was dotted with simple and complex chiefdoms from east Texas and Louisiana to the Carolinas and north to the Ohio River. Over the next four centuries complex chiefdoms rose and fell over the region, with Moundville, Cahokia, Spiro, and Etowah being four of the better-known societies that collapsed well before contact. Elsewhere I have argued that cycling—the emergence and collapse of complex chiefdoms amid a regional landscape of simple chiefdoms—is an inherent property of chiefdoms (Anderson 1990, 1996a; 1997b). David Hally (1996b:124–125), in an important extension of research on chiefdom emergence and collapse and cycling theory, has shown with a large archaeological sample from the Georgia area that simple chiefdoms, like complex chiefdoms, are also extremely fragile and short lived, and themselves "'cycled' between birth and death." We are now at the point where we can examine and compare the historical trajectories of a large number of chiefdoms in the region, to understand better how processes like cycling operate to produce cultural change (e.g., Drennan 1991; Earle 1991:4; Upham 1990:97; Wright 1986).

Why one or more Mississippian societies in the Eastern Woodlands never developed into state-level polities is also a question of some interest, since chiefdoms elsewhere in the New World made this transition. Comparative studies have shown that state formation does not automatically occur when a threshold population size/density is reached (Upham 1990). More typically, the response is system collapse and downward cycling. Thus, thresholds of population size/density were reached repeatedly throughout prehistory; but only rarely and in a few parts of the world did successful organizational responses occur. These selection events, however, never happened in the Southeast.

The societies of the Eastern Woodlands apparently developed in isolation, with little or no direct contact with other New World states, precluding the likelihood of secondary state formation. The nearest state-level societies were in central Mexico at a considerable distance and separated by major geographic barriers. Currently no conclusive evidence of any kind has been found for direct or regular contact between the Middle American states and the Mississippian or pre-Mississippian societies of the Eastern Woodlands (see Cobb et al. Chapter 13). The only Latin American artifacts reaching the Eastern Woodlands were domesticates such as corn and beans, and they apparently spread gradually from group to group.

The development of increasingly complex societies may have been hindered in many parts of the Eastern

Woodlands by their physiographic and resource structure. Although the area occupied by Mississippian chiefdoms was quite large, larger in fact than nuclear Mesoamerica, comparatively small portions of this broad area were suitable for the emergence and development of agricultural/game-based chiefdoms. These portions were (typically) river floodplains, most of which were not only narrow but also widely spaced.

Both of these characteristics would have discouraged state formation. Narrow valleys could not contain multiple, densely packed, complex chiefdoms, a condition favorable for state formation. Also, the distances between individual chiefly societies would have made the formation of stable, multipolity aggregates difficult. It is true that some Mississippian chiefdoms apparently exerted influence over considerable areas. However, their direct administrative control appears to have been within fairly small areas.

Mississippian chiefdoms did exhibit one characteristic that comparative studies have identified as conducive to state formation—the prevalence of warfare often involving the unification of a number of chiefdom-level societies through conquest and subsequent administrative reorganization (Wright 1986). Among Mississippian chiefdoms, low intensity warfare, which occasionally gave way to major episodes of apparent conquest or extermination, was a way of life. Some have suggested in fact that increasing competition and conflict among chiefly centers occurred over the course of the Mississippian period. If true, it may be that European contact truncated trends that otherwise would have led to state formation.

Two other trends observed among Mississippian chiefdoms could also be suggested as precursors of state formation. One is the apparent gradual change from sacred, cooperatively base forms of political control to secular, more authoritarian forms. The other is settlement nucleation, which may have been related to the apparent pattern of increased warfare.

I think that if European contact had not occurred, it is probable that conquest-based states would have eventually emerged in at least some parts of the Eastern Woodlands. In my view, the most likely location would have been the central and lower Mississippi River Valley, one of the largest and most ecologically rich areas in the Southeast where large numbers of complex chiefdoms were closely packed together in the landscape. Elsewhere, the wide spacing of chiefdoms would have made conquest difficult and state formation much less likely.

Unfortunately for Mississippian populations, European contact did occur and within a century chiefdom level society had ended across much of the Southeast. It has traditionally been thought that Mississippian chiefdoms underwent a general collapse or "devolution" prior to contact, a view largely shaped by the abandonments observed at such major centers as Cahokia, Etowah, and Moundville. This regional decline has been variously attributed to the collapse of interregional exchange networks, climatic changes such as the onset of the Little Ice Age, or even population pressure. Such views are no longer widely held. We now know, for example, that the chiefdoms observed in the interior by the Spanish at the time of initial contact in the mid-sixteenth century, such as Cofitachequi or Coosa, were likely as large and as powerful as almost any that existed previously in the region. Very real changes did occur over the Southeast in the centuries before contact, such as a decline in mound construction and long-distance exchange and an increase in warfare and settlement nucleation. However, these trends are better explained as the long-term consequences of chiefly cycling than as the result of evolutionary collapse.

The post-contact Mississippian collapse cannot be fully understood through reference to the chiefdom organizational systems existing previously. The native social systems were simply overwhelmed by the combined effects of a variety of external forces, including introduced diseases and unavoidable competition with foreign populations possessing adaptationally advantageous technological, organizational, and ideological systems. Any long-term developmental trends among Mississippian chiefdoms, wherever these trends may have been headed, were truncated by European contact.

Conclusions

An excellent series of articles outlining the theoretical and methodological approaches brought to the study of Mississippian societies was published in a recent issue of *Southeastern Archaeology*, celebrating the fiftieth anniversary of the Southeastern Archaeological Conference. As Peebles (1990:25) noted in an article devoted exclusively to work on the Mississippian period, there has been "a sustained development of models of the Mississippian" in the region. These approaches have included the development of ecological/adaptationist models helping us to understand why certain locations within

the landscape were repeatedly selected (e.g., Griffin 1967; Larson 1972; Smith 1978); analyses of population health, trauma, and demography, indicating the effects of organizational change on the lives of the inhabitants of these cultural systems (e.g., Hatch 1987; Milner et al. 1991; Powell 1988); and evaluations of the role of iconography and ritual in the maintenance of authority structures (e.g., Brown 1985; Knight 1986; Sears 1961,1973). In the same issue Watson (1990:43–50) and Dunnell (1990:18–19) recounted some of the research themes and accomplishments of Southeastern archaeology, which have included advances in areas as diverse yet interrelated as artifact classification and chronology, cultural historical reconstruction, trade and exchange (particularly raw material sourcing studies), paleoclimatic reconstruction, and the reconstruction of prehistoric lifeways and subsistence systems.

The contributions of Southeastern archaeology to anthropological theory, particularly the exploration of cultural evolution, however, were not viewed as profound. For example, Dunnell (1990:19) described research on the subject of the origins of cultural complexity in the region as "little more than searching for surrogates to warrant calling one or another units a tribe, chiefdom, or state" with "no new paradigm on the horizon." As I have attempted to demonstrate in this paper, and as the other Southeastern papers in this volume make clear, this assessment is simply not correct, at least as far as the contemporary research picture is concerned.

Southeastern archaeologists are currently taking full advantage of the exceptional opportunities offered by the Mississippian archaeological record to explain political change in chiefdom-level societies. They are performing sophisticated analyses of extensive survey and excavation assemblages, with fine-grained cultural chronologies, and with detailed paleoenvironmental data. The results of this work indicate that the emergence, development, and collapse of chiefdoms within the Southeast were due to a variety of factors, of which climate, regional resource structure and physiography, and local and regional political conditions all appear to have played a part.

The question now confronting Southeastern archaeologists is where do we go from here? In this paper, I have attempted to show how the study of cultural complexity, particularly long-term change in chiefdom societies, can proceed. To model political change in the Late Prehistoric Southeast, we need to control for the effects of many variables at many scales of analysis, In applying the multiscalar approach, we must of necessity be multidisciplinary and diachronic.

From the topics briefly explored in this paper, we have seen that any explanatory model of Mississippian emergence and subsequent development must incorporate a wide range of variables. Some of these variables are the physical environment, including climate and regional physiographic and resource structure; demography, including the question of whether threshold values triggering change exist; subsistence, particularly the relationship between agricultural production and surplus mobilization; the nature of local and regional sociopolitical organization, including long-term historical or developmental trajectories; and internal and external exchange networks, particularly the location and operation of prestige-based systems.

We need to look at the big picture and the small, and let our observations from each analytical level inform our research on the other levels. Multiscalar analyses highlight the fact that the causes of culture change in chiefdom society are multifaceted and multivariate. That is, change comes about through the action of a wide range of factors operating at many levels or scales simultaneously, and whose measurable effects vary appreciably depending upon the scale selected for analysis. While some variables admittedly play a greater role than others, it is becoming clear that only rarely do single causal mechanisms bring about change. Accordingly, our analyses—and, ultimately, the theoretical models built from them—must encompass multiple causal mechanisms (i.e., independent as well as interrelated variables and lines of evidence) and at the same time be plausible, logical, and verifiable.

The Southeast is an ideal region for investigating long-term change in chiefdom level societies. If present work is any guide, it is clear that in the years ahead Southeastern archaeologists will be offering increasingly well grounded explanations of how and why the region's complex prestate societies evolved.

ACKNOWLEDGMENTS

My thanks to illustrator Julie Barnes Smith for drafting Figures 15.1–15.5.

See following pages for Tables 15.1–15.7.

Table 15.1. Evidence for Organizational Change at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Area/ Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)'	Replacement of small villages with dispersed households upon onset of Early Mississippian.	Increasingly formalized arrangements of houses around plazas, centralized storage facilities over course of the Emergent Mississippian (data from Range).	Main polity in place for ca. 250 years; outlying centers exhibit varied (often volatile) occupational histories. Residential areas replace ceremonial precincts prior to Cahokia abandonment. Population peaks in Stirling phase, but moundbuilding/ palisade construction continues if not increases prior to collapse.	Threat zone/symbolic tribute likely exacted from immense area (far beyond the area under direct control of the chiefdom). Elite social stratum developed early, in the Lohmann phase, w/ marked social differentiation (i.e., Mound 72).
Zebree/Parkin/ Nodena NE Arkansas/SE Missouri[2]	Small Late Woodland hamlets and villages replaced with nucleated villages in Emergent Mississippian.	Nucleated villages replaced by villages and dispersed hamlets in Middle Mississippian.	Direct placement of Late Woodland Community at Zebree site. Appearance of fortified nucleated towns and centers in Late Mississippian.	
Kincaid Southern Illinois[3]	Numerous dispersed farmsteads.		No secondary centers (perhaps suppressed by primary center).	
Angel/Caborn-Welborn Southwest Indiana[4]			Replacement of center/village settlement hierarchy with separate(?) villages.	
Pocahontas Region Mississippi[5]			Contemporaneous, contrasting mound burial patterns (mounds wlprimary burials and few grave goods vs. mounds w/mostly isolated skulls and elaborate grave goods) suggest distinct social groups or segmentary organization.	Stability throughout sequence indicated; persistence of simple chiefdoms. Many small centers, no paramountcies.,
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Most people live in dispersed farmsteads for much of the year. Population concentrations at local center infrequent, probably for ceremonial/ social functions, or during warfare.		Food storagelfeasting at local center in vicinity of mound. Paired ceremonial(?) structures replaced by low platform moundlplaza complex in Early Mississippian (Summerville I). Stability throughout sequence indicated; persistence of simple chiefdoms.	Intensive interaction w/Moundville indicated in Summerville II/ III (extensive Moundville Engraved pottery, suppression(?) of fortifications). Area abandoned ca. A.D. 1600.
Moundville Western Alabama[7]	Nucleated Late Woodland (West Jefferson phase) villages replaced by dispersed farmsteads in Early Mississippian (Moundville I phase). Nucleated villages reappear in Late Mississippian (Moundville IV) following Moundville collapse.	Burial population at Moundville increases markedly as residential population declines from Moundville I to Moundville III. Burial population declines in late Moundville III times, coupled w/an expansion of cemeteries at outlying centers.	Occupation at paramount center declines markedly after Moundville I. (Dense residential zone about small center replaced by large, planned civic-ceremonial precinct). Superordinate segment of population apparently increases from ca. 1-2% to 5% between Moundville I and III.	Paramount chiefdom apparently stable for ca. 250 years. Threat zone likely over large area (far beyond the area under direct control of the chiefdom).

Table 15.1. (continued)

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
Etowah/Coosa Northwest Georgia[8]		Earth-embanked structures (council houses?) replaced by platform mound/plaza complex in Early Mississippian. Organized communities (houses around plazas) characterize Late Mississippian.	Mound centers <17 km or >31 km apart in Coosa polity. Centers rarely occupied for more than 100-150 years.	Occupation at Etowah interrupted twice (before and after Wilbanks phase complex chiefdom).
Savannah River Chiefdoms Georgia/South Carolina[9]	Household shape changes from round to square between Early and Middle Mississippian times.	Earth-embanked structures (council houses?) replaced by platform mound/plaza complex in Early Mississippian. Council houses present in villages in both simple and complex chiefdoms (data from Rucker's Bottom).	Council house replaces platform mound following chiefdom collapse (data from Irene). Major occupational shifts sometimes signaled by pronounced mound construction activity (i.e., placement of rock or shell coverings).	Rise and fall of complex chiefdoms evident over the course of the Mississippian. Much of basin abandoned after ca. A.D. 1450.
Lake Jackson/ Apalachee Northern Florida[10]		Council houses evident in both historic and late prehistoric period.	Simple chiefdoms in Early Mississippian, replaced by complex chiefdoms ca. A.D. 1200. No precursor Late Woodland groups; polity derived from Chattahoochee River area?	Main polity in place for ca. 300 years. Centers shifted location and some were abandoned in Lake Jackson Velda phase transition.
Cofitachequi Central South Carolina[11]			Historic 16th polity very complex in 1540, may have declined appreciably by 1566-1568 (De Soto, Pardo expeditions).	Contraction of polity in 15th and 16th centuries. Tributary/threat zone immense in A.D. 1540 (>300 km).
Town Creek Central North Carolina[12]			Vacant fortified center throughout period of occupation used for ceremony and protection?	Mississippian organization disappears after ca. A.D. 1400.

Notes for Tables 15.1–15.7

[1]Kelley 1990a; Milner 1986,1990; Pauketat 1994; Pauketat and Emerson 1997
[2]Morse and Morse 1983
[3]Muller 1978, 1986a
[4]Green and Munson 1978; Muller 1986a
[5]Steponaitis 1991
[6]Blitz 1993; Steponaitis 1991:208–209
[7]Peebles 1986, 1987a,b; Powell 1988; Scarry 1986; Steponaitis 1991; Welch 1990a, 1996
[8]Hally and Rudolph 1986; Hally et al. 1990; King 1991; Smith 1987
[9]Anderson 1994b; Anderson et al. 1986; Anderson et al. 1995
[10]Scarry 1990a,b; 1996; Chapter 5
[11]DePratter 1991; Hudson 1990
[12]Coe 1995

Table 15.2. Evidence for Population Trends at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)[1]	House size increases over time, size increase dramatic in later Mississippian (date from Range).	Village size increases over course of Emergent Mississippian (data from Range). Villages replaced by center/hamlet dichotomy in Lohmann phase.	Populations increasing through Early Mississippian, followed by (apparent) gradual decline; area largely depopulated after Sand Prairie Phase.	Largest population levels in Eastern Woodlands at peak? Area largely depopulated after ca. A.D. 1350–1400.
Zebree/Parkin/Nodena NE Arkansas/SE Missouri[2]	Villages/hamlets centers in Early and Middle Mississippian.	Village size increases over the course of the Mississippian from ca. 150 to several hundred or more.	Nucleated towns replace dispersed villages/hamlets in Late Mississippian.	Dramatic abandonment of SE Missouri and much of NE Arkansas's western lowlands after ca. A.D. 1450.
Kincaid Southern Illinois[3]	Hamlets of from 1–3 houses each widespread.	Groups of 8–15 houses comprise small hamlets or villages.	Polity population ca. 4,000?	
Angel/Caborn-Welborn Southwest Indiana[4]	Hamlets, small villages (1 ha) in Late Woodland.	Center, large and small villages in Angel phase replaced by discrete villages in Caborn-Welborn phase.	Angel center ca. 1,000 people; large village ca. 350 people; small 25-75 people; hamlets 10-15 people.	Caborn-Welborn phase large and small villages replace Angel phase central town/dispersed settlement system.
Pocahontas Region Mississippi[5]	Most population lives in small hamlets 0.1 to 0.8 ha in extent.		Small numbers of people lived near mound centers.	No evidence for Late Woodland or Contact era settlement.
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Movement between farmstead/local centers fluid. Farmsteads evince lesser degree of site permanence than local centers.	No villages.	Population at local center (Lubbub Creek) very low (Summerville I: 5-30 people) (Summerville II/III: 25-90 people) (Summerville IV: 10-35 people).	
Moundville Western Alabama[7]	Dispersed households become widespread and replace small nucleated villages with Mississippian emergence.	Nucleated villages reappear in late Moundville III, as Moundville center declines.	Moundville resident population declines markedly after Moundville I (based on sheet midden debris). Moundville burial population increases markedly after Moundville I.	Depopulation of areas to north and northeast w/emergence of Moundville complex chiefdom.
Etowah/Coosa Northwest Georgia[8]		Most towns had between zoo–300 people present.	Individual chiefdoms composed of 4-7 towns in Coosa paramountcy. Paramount chiefdom composed of ca. seven simple/complex chiefdoms.	Individual chiefdoms of the Coosa paramountcy occupied by up to ca. 5,000 people.
Savannah River Chiefdoms Georgia/South Carolina[9]	Hamlets throughout drainage during Early/Middle Mississippian era.	Villages ca. 1 ha., 120–150 people (data from Rucker's Bottom). Village size increased ca. 25% over course of Middle Mississippian (data from Rucker's Bottom).	Minor centers ca. 1-2 ha in extent; major centers ca. 2-5 ha in extent.	Growth in number of sites and centers from Early to Middle Mississippian in drainage, marked decline thereafter.
Lake Jackson/Apalachee Northern Florida[10]	p [illegible] p living in dispersed farmsteads.	Numerous scattered settlements tied to major town/ceremonial centrals.	Total polity population estimated at between ca. 10,000 and 30,000.	Gradual population increase over time.

Table 15.2. (continued)

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
Cofitachequi Central South Carolina[11]	Poor data, dispersed farmsteads suggested in some periods.	Poor data; small (1–2 ha) villages observed near major centers.	Large central towns (up to zo ha).	Population contraction during Late Mississippian, abandonment of outlying centers and areas.
Town Creek Central North Carolina[12]		Small (1–2 ha) villages away from local center.	Small local center (ca. 2 ha).	Chiefdomlarea abandoned after Middle Mississippian.

[1-12]See notes for Table 15.1

Table 15.3. Evidence for Agricultural Intensification at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)'	Increasing use of starchy seeds in Late Woodland. Maize use increases markedly after ca. A.D. 750.		Intensified maize production paces Mississippian Emergence.	
Zebree/Parkin/ Nodena NE Arkansas/SE Missouri[2]	Increased species diversity evident in Emergent Mississippian sites.	Corn evident in Emergent Mississippian but not a major dietary constituent until Middle Mississippian times (trace element data).	Population skeletal health better in Emergent Mississippian populations than in later times.	
Kincaid Southern Illinois[3]	Hamlets occupied much of the year with evidence for highly diversified resource exploitation.			
Angel/Caborn-Welborn Southwest Indiana[4]				
Pocahontas Region Mississippi[5]			Agricultural intensification assumed to accompany chiefdom emergence.	
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Maize intensification begins in Late Woodland (Miller 111), becomes marked in Early Mississippian (Summerville I). Maize use declines, nut use increases Late Mississippian (Summerville IV). Late Woodland food resources diversified, procurement becomes more focused in Early Mississippian.	No villages.	Late Woodland populations evince greater dietary stress than Early Mississippian populations. Population skeletal health good over all Mississippian phases. Hamlet/local center faunal data (deer element distributions) indicate provisioning of elites(?)at centers.	
Moundville Western Alabama[7]	Maize common at hamlets.	Faunal data from Moundville and farmsteads (deer element distributions) indicate provisioning of elites at centers. Trace element evidence suggests elites may have eaten more meat than commoners.	Population skeletal health good over all Mississippian phases (over both elites and commoners). Considerable dietary stress indicated following collapse of Moundville polity (Alabama River Phase).	
Etowah/Coosa Northwest Georgia[8]			Population skeletal health good over all Mississippian phases (over both elites and commoners).	
Savannah River Chiefdoms Georgia/South Carolina[9]	Maize intensification appears with Mississippian. Maize is not present in any quantity in the Late Woodland.	Increasingly focused procurement of game over course of Mississippian (data from Rucker's Bottom). Maize use decline, nut use increases over course of Mississippian (data from Rucker's Bottom).	Maize use declines at Irene with organizational decentralization. Commoner population skeletal health improves w/emergence of complex chiefdom (data from Rucker's Bottom).	Spring rainfall variation apparently linked to crop yields/political stability of local societies. Evidence for forest clearing indicated through pollen, wood charcoal diversity data (data from Beaverdam Creek).

Table 15.3. (continued)

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
		Maize use paces Mississippian emergence, declines w/collapse (data from Irene).	Commoner population skeletal health poor compared with elites at nearby center (data from Rucker's Bottom, Beaverdam Creek).	
Lake Jackson/ Apalachee Northern Florida[10]			Maize use appears in Late Woodland, but does not become important until Early Mississippian.	
Cofitachequi Central South Carolina[11]			Maize common in Middle and Late Mississippian contexts at major center (data from Mulberry).	
Town Creek Central North Carolina[12]			Maize evident at most site types.	

[1-12]See notes for Table 15.1

Table 15.4. Evidence for Prestige Goods Exchange at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)'		Extralocal pottery and other materials found at large and small sites through later Mississippian periods.	Elite burials characterized by elaborate grave goods, many of extralocal raw materials.	Ramey Incised pottery found in low incidence over a large area. Greatest interaction in Emergent Mississippian and Stirling phases.
Zebree/Parkin/ Nodena NE Arkansas/SE Missouri[2]			Extensive shell bead blanket found on elite burial at Zebree.	
Kincaid Southern Illinois[3]				
Angel/Caborn-Welborn Southwest Indiana[4]				
Pocahontas Region Mississippi[5]			Extralocal material incidence and diversity greatest in Early Mississippian; marked decline after ca. A.D. 1200.	Rise of Moundville to east and Lake George and Anna to west may have constrained prestige goods exchange.
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Shell beads are mostly of local shell in Late Woodland, majority are of marine shell in Early Mississippian Finewares (and rarely, extralocal wares) occur at both hamlets and local center.	No villages.	Prestige goods treated as wealth items in Early Mississippian, do not appear restricted to superordinate segment. Prestige goods incidence in burials declines after Early Mississippian at both farmsteads and local center.	Rise of Moundville to east appears to have constrained prestige goods exchange.
Moundville Western Alabama[7]	Prestige good use appears restricted exclusively to centers.	Extralocal shell and greenstone use increases just prior to emergence of single mound sites; prestige goods found at these sites during the Early Missippian. Extralocal pottery incidence declines after Moundville I.	Prestige goods incidence in burials increases during Early Mississippian; peaks at Moundville I/II transition; declines during Moundville II/ III; gone by Moundville IV. Elaborate prestige goods serve as insignia of rank (i.e., copper).	Nonlocal pottery minimal from east, suggesting major cultural boundary; nonlocal pottery more common from areas to west and lower midwest. Rise of Moundville tied to reduction in prestige goods exchange in smaller surrounding chiefdoms.
Etowah/Coosa Northwest Georgia[8]			Elaborate prestige goods serve as insignia of rank (i.e., copper).	Moundville pottery nonexistent, suggesting major cultural boundary. Etowah ceramics earliest Mississippian evidence at many sites over South Appalachian area.
Savannah River Chiefdoms Georgia/South Carolina[9]		Shell beads, copper artifacts found with elites at centers; shell beads, more mundane items found with commoner burials at villages and hamlets.	Additional mound stages constructed at several centers following a marked decline in prestige goods incidence in burials (data from Hollywood, Chauga, Beaverdam Creek).	Pottery from western Southeast found with Hollywood burials.
Lake Jackson1 Apalachee Northern Florida[10]			Increasing number and diversity of extralocal goods in burials evident at Lake Jackson	Interregional trade in prestige goods prominent ca. A.D. 1100-1200, trade disrupted ca. A.D. 1400.

Table 15.4. (continued)

Archaeological Culture Area/ Locality	Household	Community	Chiefly Polity	Interpolity Region
			in Middle Mississippian, suggesting increasing elite power.	
Cofitachequi Central South Carolina[11]			Elaborate cawed mica artifacts found at major center (data from Mulberry).	
Town Creek Central North Carolina[12]				

[1-12]See notes for Table 15.1

Table 15.5. Evidence for Craft Specialization at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)[1]	Part-time household production of specialized craft goods indicated, including use of extralocal materials.		Ambiguous evidence for specialized production at centers.	Major regional center/node for prestige goods exchange.
Zebree/Parkin/ Nodena NE Arkansas/SE Missouri[2]		Bead manufacture restricted to areas within communities (data from Zebree).	Communities might produce specialized products (i.e., salt collection).	
Kincaid Southern Illinois[3]				
Angel/Caborn-Welborn Southwest Indiana[4]				
Pocahontas Region Mississippi[5]				
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Household production of chunky stones indicated.	No villages.	Fineware, greenstone, and shell bead manufacture appears restricted top local center.	
Moundville Western Alabama[7]	Household manufacture of shell beads widespread in Late Woodland (as suggested by microdrill occurrence).	Extralocal goods processed at centers (greenstone, copper, mica, and graphite).	Engraved vessels may be made solely at major center; most specialized production restricted to major center in Moundville II/III phases.	Major regional centerlnode for prestige goods exchange.
Etowah/Coosa Northwest Georgia[8]		Citico gorget co-extensive w/ Coosa; may indicate extent of marriage/alliance network.	Manufacture of copper prestige goods at major center indicated.	Major regional centerlnode in prestige goods exchange network?
Savannah River Chiefdoms Georgia/South Carolina[9]	No evidence for craft specialization.	No evidence for craft specialization (local manufacture of pottery, stone tools indicated).	Production of carved soapstone pipes appears restricted to local center (data from Beaverdam Creek).	
Lake Jackson/ Apalachee Northern Florida[10]			No evidence for standardized production of shell beads.	
Cofitachequi Central South Carolina[11]			Evidence for mica processing found to be highly restricted in central community (data from Mulberry).	Major regional centerlnode in prestige goods exchange network.
Town Creek Central North Carolina[12]				

[1-12]See notes for Table 15.1

Table 15.6. Evidence for Warfare at Different Spatial Scales in the Late Prehistoric Southeast

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
American Bottom (including Cahokia and FAI 270 Project area)'			Cahokia center proper fortified throughout much of its existence.	Extent of Cahokia domination over surrounding macroregion uncertain; likely cast a long "threat" shadow.
Zebree/Parkin/ Nodena NE Arkansas/SE Missouri[2]		Fortifications around earliest Mississippian community; suggestion that replacement of Late Woodland populations l organizations occurred (data from Zebree).	Fortifications (ditch and stockade lines) around major Late Mississippian communities.	Intensive competition between centers documented ethnohistorically.
Kincaid Southern Illinois[3]		Storage in underground pits in Early Mississippian (concealed?).	Main site palisaded.	Indication that household populations converge on main center during periods of conflict (large area at center defended, more than the small resident population would need).
Angel/Caborn-Welborn Southwest Indiana[4]			Angel site palisaded; no clear evidence for fortification in Caborn-Welborn?	Outlying populations converge on center during periods of conflict?
Pocahontas Region Mississippi[5]				Complex chiefdom formation constrained by other such societies?
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	Late Woodland burials exhibit high incidence of trauma (parry fractures, embedded points); much lower in Early Mississippian.	No villages.	Local center had a bastioned palisade in Summerville I, this disappeared in the Summerville II/III; fortifications reappear in Summerville IV. Miller III (Late Woodland) storage in concealed pits; Summerville I (Early Mississippian) storage in above-ground corn cribs.	Outlying populations converage on center during periods of conflict?
Moundville Western Alabama[7]	Late Woodland burials exhibit high incidence of trauma; this decreased in Moundville I through early Moundville III, then increased again.	Elite burials exhibit less evidence for trauma (injury) than nonelites at Moundville.	Moundville extensively fortified from Moundville I through III phases. Nucleated villages reappear in late Moundville III, possibly for defense.	Moundville appears to have dominated polities (i.e., had a large threat zone) over an appreciable area; suppression of nearby societies indicated.
Etowah/Coosa Northwest Georgia[8]		Fortifications around 16th century towns (data from King Site).	Etowah center massively fortified with ditch and bastioned stockade.	Rivalry with Alabama chiefdoms documented ethnohistorically.
Savannah River Chiefdoms Georgia/South Carolina[9]	Hamlets in lower/central Savannah relocated away from major drainages w/rise of complex chiefdoms nearby.	Fortifications appear, become more elaborate at previously unfortified village prior to its abandonment (data from Rucker's Bottom).	Fortifications at local centers noted early, late in occupational histories (data from Irene, Chauga, Tugalo).	Abandonment of central, lower basin after A.D. 1450

(continues on overleaf)

Table 15.6. (continued)

Archaeological Culture Areal Locality	Household	Community	Chiefly Polity	Interpolity Region
		Storage concealed in underground pits prior to site abandonment (data from Rucker's Bottom).	Evidence for increased incidence of trauma prior to abandonment of Irene.	
Lake Jackson/ Apalachee Northern Florida[10]	Dispersed, unfortified hamlets.	Violent factional competition between members of the nobility documented ethnohistorically.	Major centers were unfortified.	Chiefdom was feared and respected over a wide area in the 16th century, as documented ethnohistorically.
Cofitachequi Central South Carolina[11]		Suggestion for fortifications around local villages (data from Ferry Landing).	Fortification ditch at major center (data from Mulberry).	Rivalry with chiefdoms in central Georgia (Ocute) documented ethnohistorically.
Town Creek Central North Carolina[12]		Fortifications around outlying villages.	Fortifications around local center.	Furthest expansion of Mississippian to the north along the Atlantic Slope.

[1-12]See notes for Table 15.1

Table 15.7. The Emergence and Collapse of Mississippian Chiefdom Organizational Forms in the Late Prehistoric Southeast

Archaeological Culture	Date of Initial Chiefdom Appearance	Date of Ultimate Collapse/Abandonment
Cahokia (including FAI 270 project)[1]	ca. A.D. 850–900 (American Bottom Area)	ca. A.D. 1300 (Cahokia proper)
Zebree/Parkin/Nodena NE Arkansas/SE Missouri[2]	ca. A.D. 900–950 (Zebree)	Post Contact (16th century?) (Parkin/Nodena)
Kincaid Southern Illinois[3]	ca. A.D. 900–1000	ca. A.D. 1500
Angel/Caborn-Welborn Southwest Indiana[4]	ca. A.D. 1950 (Angel)	ca. A.D. 1700 (Caborn-Welborn)
Pocahontas Region Mississippi[5]	ca. A.D. 1000	ca. A.D. 1500?
Upper Tombigbee Chiefdoms Northeast Mississippi[6]	ca. A.D. 1000–1050	European Contact?
Moundville Western Alabama[7]	ca. A.D. 1000 (Black Warrior drainage)	ca. A.D. 1500 (Moundville)
Etowah/Coosa Northwest Georgia[8]	ca. A.D. 1100–1150	ca. A.D. 1350 (Etowah) ca. A.D. 1565–1600 (Coosa)
Savannah River Chiefdoms Georgia/South Carolina[9]	ca. A.D. 1100–1150	ca. A.D. 1450 (central and lower basin)
Lake Jackson/Apalachee Northern Florida[10]	ca. A.D. 1050–1100	ca. A.D. 1450 (paramount center)
Cofitachequi Central South Carolina[11]	ca. A.D. 1150–1200	ca. A.D. 1600? (Cofitachequi)
Town Creek Central North Carolina[12]	ca. A.D. 1150–1200	ca. A.D. 1400

[1-12] See notes for Table 15.1

CHAPTER SIXTEEN

Multiscalar Analyses of Middle-Range Societies:

Comparing the Late Prehistoric Southwest and Southeast

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IN WHAT WAYS WERE SOCIOPOLITICAL DEVELOPMENTS in the Late Prehistoric U.S. Southwest and Southeast similar? In what ways were they different? Addressing these two questions has been a primary goal of this volume. Another goal has been to demonstrate how a multiscalar analytical approach can be used to address such questions. The results, as seen in the various papers in this volume, are significant not only for what they tell us about the prehistories of the Southwest and Southeast, respectively. They are also significant for what they reveal about the regularities and diversity of middle-range societies and the process of cultural evolution.

This chapter summarizes the results of the Southwest-Southeast comparisons presented in the preceding chapters and considers the broader implications of those results. It begins by contrasting the two areas' archaeological research traditions. Next, the cultural similarities and differences evident at different spatial scales are summarized. Then, the possible effects of the two areas' environmental characteristics are considered. Finally, the implications that Southwest-Southeast comparisons have for the study of middle-range societies and cultural evolution in general are discussed.

ARCHAEOLOGICAL RESEARCH TRADITIONS

Southwestern and Southeastern archaeology share several general similarities in their historical development. For both, the first century of research was dominated initially by the collection of museum specimens and then by culture historical concerns. Throughout this time, fieldwork in both areas was directed primarily to the biggest, most spectacular ruins, an emphasis that hindered recognition and interpretation of cultural variability. Consequently, the kinds of sites where most prehistoric peoples lived (e.g., hamlets and villages) were ignored. On those rare occasions when sociopolitical organization was considered, early researchers in both areas generally saw late prehistoric societies as being similar to contemporaneous indigenous societies — that is, egalitarian.

The past two decades of research in both the Southwest and Southeast have seen increased emphasis on the investigation of sociopolitical organization, an effort facilitated by the vast amount of new fieldwork that has occurred over this interval. In both areas this interest has prompted a reevaluation of earlier conclusions about egalitarianism and a greater concern for intra- and intersocietal variation. As a result, both Southwestern and Southeastern archaeologists have been able to identify evidence of organizational complexity in their respective areas. The

existence of chiefdoms in many parts of the Southeast is now almost universally accepted, and the presence of similarly elaborate organizational forms has been inferred for some parts of the Southwest. More recently, the most extreme claims for complexity in both areas (i.e., for state-like organizational forms) have themselves begun to be reevaluated, as seen in current work at Chaco and Cahokia.

While they share these general similarities, Southwestern and Southeastern archaeological research traditions differ in two significant ways. The first concerns their reliance on ethnography *vs.* ethnohistory. The second involves culture area systematics.

Ethnography vs. Ethnohistory

Early interpretations about the supposed egalitarianism of Late Prehistoric Southwestern societies were derived primarily from ethnographic analogy. The justification for this use of analogy was the egalitarian architectural continuity observed in the northern Southwest between the Prehistoric and Historic periods. The assumption was made that this architectural continuity reflected organizational continuity as well. Thus, ethnographic descriptions of modern Southwestern groups as living in socially and politically independent communities with an egalitarian organization were thought to apply to prehistoric groups as well. However, as Southwestern archaeologists have become increasingly interested in prehistoric sociopolitical organization, the validity of this assumption has been questioned. A primary reason has been the recognition of archaeological evidence for complexity, such as site hierarchies, burial differentiation, high population densities, intensive agricultural systems, and specialized forms of public architecture, all of which are lacking ethnographically.

Whereas ethnographic studies have had a significant impact on Southwestern archaeology, ethnohistoric studies have not. In fact, it has only been recently that Southwestern archaeologists have begun systematically to examine early historic accounts of indigenous peoples. Unfortunately, these documents are often vague and contradictory with key variables of interest to archaeologists being poorly described. In addition, they share with Southwestern ethnographic accounts the inadequacy of dealing with societies that were significantly less complex than some evidenced archaeologically.

Unlike the Southwest, the role of ethnography in archaeological interpretations of the late prehistoric Southeast has until quite recently been virtually nonexistent. The reason is that even the earliest ethnographies were typically done of displaced peoples whose cultures had been drastically altered by several centuries of Euroamerican domination, extermination, and removal. These alterations undoubtedly contributed to the absence of any obvious continuity, architectural or otherwise, between prehistoric groups and those studied by ethnographers.

While Southeastern archaeologists have virtually ignored ethnography, they have relied heavily on ethnohistory. In marked contrast with the Southwest, the Southeast's ethnohistoric record is enviably rich with extensive accounts dating back in some areas to the period of initial European contact in the sixteenth century. Early ethnohistoric studies, as exemplified by the writings of John R. Swanton (e.g., 1911, 1922, 1946), tended to conflate several centuries of accounts. They concluded that, with the notable exception of unusual cases like the Natchez, Southeastern societies at contact were egalitarian. However, as interest in sociopolitical organization has grown and archaeological evidence for organizational complexity has accumulated, researchers have begun to study the available ethnohistoric documents more systematically and critically.

The picture of a more complex sociopolitical organization drawn from the Southeast's earliest ethnohistoric accounts has been consistent with the archaeological record but with the added advantage of containing information about individuals and activities impossible to detect archaeologically. Thus, for example, the Southeastern ethnohistoric record has provided insights into such topics as the motivations and machinations of preeminent leaders and how polities sometimes joined to form everything from loose confederations to complex/paramount chiefdoms. This kind of information has given Southeastern archaeologists a much more detailed understanding of late prehistoric sociopolitical organization than their Southwestern counterparts who, at least for their most complex societies, must rely on the archaeological record alone.

Culture Area Systematics

Another significant difference in Southwestern and Southeastern archaeological research traditions concerns the definition of culture areas. Late Prehistoric period societies occupying the geographic entity of the U.S. Southeast have typically been given one cultural desig-

nation—Mississippian. While some cultural variation has been documented, the most notable cases occur on the margins of the region (e.g., Caddoan, Calusa, Timucua, Siouan-Algonkian), and have not (except perhaps the Caddo) been considered part of the Mississippian phenomenon. Thus, Southeastern archaeologists often use the terms Mississippian and Late Prehistoric Southeast interchangeably.

For the geographic entity of the Southwest, in contrast, no single cultural designation has been applied, and the same is true for the area's most complex societies. Instead, archaeologists have subdivided the Southwest into a number of discrete culture areas or traditions, of which the Anasazi, Mogollon, and Hohokam are the best known.

This difference in classification raises a series of related questions. Does it reflect fundamental differences in prehistoric culture, including sociopolitical organization, within different parts of the Southwest? Or is it simply the product of different archaeological research traditions? If the difference in classification does in fact reflect prehistoric behavior, then why did late prehistoric Southwestern cultural traditions never attain the same geographic extent as the Mississippian cultural tradition in the Southeast? This question is especially pertinent to the underlying structure and objectives of this volume, because it suggests that the most informative macroscale for Southwest-Southeast comparisons may not be between the Southwest as a whole and the Southeast as a whole but rather between individual Southwestern cultural traditions and the entire Southeast.

Multiscalar Comparisons

The multiscalar comparisons of the preceding chapters have revealed some general similarities and several fundamental differences in the societies of the late prehistoric Southwest and Southeast. These similarities and differences are summarized here for the range of scales considered in this volume: the great town, the polity, the macroregion, and beyond.

Great Towns

Big sites in both the Late Prehistoric Southwest and Southeast had large scale public architecture that would have required the mobilization of group labor to build. In both areas, these structures, or the empty space formed by them, served as the centerpieces of settlement layout, giving all big sites a central focus. These structures also created a cultural landscape within which sociopolitical and ceremonial activities occurred. As discussed by Holley and Lekson (Chapter 3), further similarities also characterize both Mississippian and Classic period Hohokam sites as well as the Pueblo Bonito complex and Cahokia.

Together these similarities are balanced by two fundamental differences. The first concerns spatial and temporal variation. Throughout the Southeast during the entire Late Prehistoric period, an essentially similar site plan of mounds erected around a plaza was duplicated at all major settlements. The only marked variation was in various aspects of size—sites varied in their physical extent, numbers of mounds, sizes of mounds, and numbers of occupants.

In contrast, the Late Prehistoric Southwest was never characterized by a single site plan. There were instead regionally distinct architectural forms and layouts whose distributions generally correlated with the Southwest's major environmental subdivisions. Furthermore, shifts in architecture and layout occurred through time, with the most dramatic example being the transition from the Sedentary to Classic period Hohokam.

The second difference in Southwestern and Southeastern big sites lies in the function of their large scale public architecture. Throughout the Southwest, the function was social. Ballcourts, plazas, kivas, great kivas, and even perhaps great houses all served as arenas of communal ritual. Except for Classic period platform mounds, unambiguous evidence for residential differentiation was generally absent. In contrast, the focus of public architecture throughout the Southeast was elite individuals, and there is substantial evidence for residential differentiation. The layout of platform temple and mortuary mounds around plazas was intended to highlight the position of the elite both in life and death.

Polities

The big sites in both the Southwest and Southeast were part of multi-site organizational systems that in this volume have been called polities. These were the maximal independent sociopolitical units to which people belonged. The similarities in studying Southwestern and Southeastern polities are both methodological and substantive. Methodologically, archaeologists in both regions confront similar difficulties in interpreting site hierarchies and defining polity boundaries. Substantively, researchers have documented several similarities

in the two regions' polities. Economically, polities in both areas depended primarily on intensive agriculture, involving the same nonindigenous cultigens of corn, beans, and squash; local domesticates, while assuming greater importance in some areas, do not appear to have been critical to the provisioning of these societies. In both areas, significant labor investments were made in constructing public architecture. In both, craft production seems to have been at most a part-time activity, producing both sumptuary and utilitarian goods. Finally, in both, the polities that arose during the Late Prehistoric period did not last. Rather, they emerged, existed for some length of time, and then declined until they ultimately disappeared.

Underlying these general similarities are three significant differences: one involves the differential emphasis in social ranking, another relates to variation in basic polity organization; and the last concerns the reasons for polity collapse.

Evidence for ranking

The social relationships underlying Southeastern polities were characterized by a pronounced emphasis on ranking, and in the Southwest they were not. Consequently, the node at which the polity was expressed differed. In the Southeast, it was through the office of the chief; in the Southwest it was through allegiance to places or communities and was reinforced through collective ceremonials. These differences can be viewed as those between polities and ritualities, labels that highlight how the primary integrating mechanisms in the two regions differed.

In the Southeast, the archaeological evidence for social ranking is highly visible, pervasive, and redundant. High status individuals and their families were obviously and repeatedly distinguished from commoners in where they lived, what they wore, and how they were buried. As mentioned in the preceding great town comparisons, public space and architecture at Southeastern centers were clearly associated with elites, serving to highlight their special position both in life and death. Typically, these individuals and their families resided on or near temple/domiciliary mounds and were interred in elaborate mortuary facilities (i.e., mounds, temples, or special cemetery areas) along with a variety of status markers and consistent symbols of leadership. Such mortuary differentiation had a long tradition in the prehistoric Southeast, with perhaps the best-known precedents being Hopewellian and Adena burial practices.

The archaeological evidence for social ranking in the late prehistoric Southeast has been corroborated by ethnohistoric research, which has also documented a high degree of competition for political power among contact-era Mississippian elites. While power and status were to varying degrees ascribed to certain family lines, who actually assumed preeminent positions among those eligible was determined in large part by achievement. The power of successful leaders was considerable—they could mobilize labor, control agricultural surplus, live sumptuously, and even (in some societies) enforce or oversee human sacrifice in special circumstances. These powers made leadership positions highly desirable, and provided the motivation for intense competition.

In stark contrast with the Southeast, evidence for social differentiation in the Southwest is infrequent, inconsistent, and relatively hard to discern archaeologically. Only a few cases (e.g., Chaco, the Classic period Hohokam, and Paquimé) exhibit any clear evidence for ranking and this evidence is usually not redundant. As was described previously, most Southwestern public architecture had a community orientation rather than the obvious and widespread association with elites as in the Southeast. The only Southwestern case with clearly identified elite residences is the Classic period Hohokam. Archaeologists disagree about whether or not Chacoan great houses were elite residences; similarly the evidence from Paquimé is ambiguous.

While there are a few high status burials in the Southwest, they are notable because they are rare. Only at Paquimé is there a robust pattern of ascribed status. The few rich burials at Classic period Hohokam sites, Chaco, and Paquimé are associated with public architecture, but because they are so few, the association does not seem to have been as institutionalized as in the Southeast. None of the Southwestern cases exhibit consistent status markers and symbols of leadership as seen throughout the Southeast.

In general, marked social differentiation in the late prehistoric Southwest seems to have been rare and relatively short-lived. When it did occur, there is varying evidence for control of agricultural surplus and the ability to mobilize labor. The evidence for human sacrifice is significantly less than in the Southeast. While the overall emphasis seems to have been egalitarian, competition for power probably did occur but apparently more infrequently and to a lesser degree than in the Southeast.

Polity organization

Southwestern and Southeastern polities also differed in the extent to which their basic organization varied. Because of the common site plan found throughout the Southeast, archaeologists have been able to apply one model of polity organization throughout the area. This building block model has as its basic unit a center and its surrounding villages and hamlets. It varies primarily in how multiples of the basic unit are combined. Simple polities consisted only of the basic unit—the center and its surrounding sites. In more complex polities, one of the basic units dominated others through a vertically-organized administrative and social hierarchy.

A building block model, employing centers and their surrounding villages and hamlets, can also be applied to polities throughout the Southwest. However, in the Southwest, the model is characterized by two kinds of variation not evident in the Southeast—one in the content of the basic building blocks and the other in the way building blocks combine to form polities. Due to the previously discussed variation in Southwestern site plans, the basic unit of the building block model differs depending on location and time period. In addition, unlike the Southeast, clear evidence for vertically organized, administrative and social hierarchies occurs infrequently. The more common pattern is what Johnson (1980) has called a sequential hierarchy in which power and control relations are spread horizontally. This difference in vertical *vs.* horizontal power relations is clearly related to the differential emphasis on social ranking in the two regions.

Polity collapse

In both the Late Prehistoric Southwest and Southeast, polities emerged, existed for some length of time, and then declined until they ultimately disappeared. The ranges of polity duration in the two areas varied. In the Southeast, durations range from roughly 100 to 400 years. A relatively simple polity oriented around a single mound center might last just a few generations. At the other extreme, the most complex polities, which encompassed a hierarchy of mound centers, sometimes lasted several centuries.

In the Southwest, the range of polity duration was greater. The minimum duration was probably less than in the Southeast, lasting perhaps only a generation or two. For the most complex polities, the minimum spans of less than 300 years proposed for Chaco and Paquimé fall within the high end of the range defined for Southeastern polities. However, some Hohokam centers, and probably their associated polities, have documented spans of 500 or more years, which exceed the maximum duration of the most complex Southeastern polities. The longevity of these Hohokam polities can probably be attributed to their deep sedentism, resulting from the tethering of irrigation canals.

Southwestern and Southeastern archaeologists have used different labels and proposed different explanations for polity collapse, and associated population shifts, in their respective areas. Southwestern archaeologists have used the term abandonment to characterize the depopulation of various sites, localities, and regions in the post-A.D. 1150 period. Proposed explanations cite various combinations of interrelated variables, such as climate change, resource exhaustion, and population and organizational growth beyond the minimal carrying capacity of highly variable environments.

Southeastern archaeologists have generally characterized polity collapse and its associated population shifts as the result of chiefly cycling. According to this explanation, centers and polities emerged, grew, and declined for a variety of (largely) interrelated reasons, of which the most important was elite competition for power. This competition within and among chiefly factions in the region's centers and polities is thought to have occurred throughout the Southeast.

Is Southwestern abandonment the same as Southeastern chiefly cycling? We would say for the most part no. In the Southwest, the greater emphasis on group solidarity rather than on individual competition for power together with the very few clear instances of complex polities would have made cycling, such as seen in the Southeast, less likely. This is not to say that cycling never occurred. Again, the issue is scale. While chiefly cycling was probably not a macroregional process characterizing the Southwest as a whole, it may have been an important component of change in areas associated with complex polities with multiple centers, such as Chaco and the Classic period Hohokam.

Macroregional Interaction

Macroregional interaction in the Southeast was qualitatively different from that in the Southwest in both its geographic extent, intensity, and historical precedents. The Late Prehistoric Southeast comprised a single, large

macroregion that contained numerous, clearly hierarchical polities whose proximity with one another and resulting interactions created a politically complex and dynamic cultural landscape. Not only was this macroregion extensive, but the interactions comprising it were redundant. There was cultural unity as evidenced by common architectural plans and artifactual styles, there was religious unity provided by Mississippian ceremonialism and iconography (as exemplified by the Southeastern Ceremonial Complex), and there was long-distance exchange of both status and religious goods. Within this widespread pattern, competition and conflict added a dimension of volatility to the interactions among polities. Intensive and extensive macroregional interaction had a long history in the Southeast, dating as far back as Middle Archaic times (8,000–6,000 B.P.), with pronounced peaks during the Poverty Point, Hopewellian, and Mississippian eras.

In comparison to the Southeast, macroregional ties at the scale of the Southwest as a whole were weaker and more tenuous. Only one kind of linkage, the long-distance exchange of status goods, seems to have been operating throughout the Southwest, and only some of this interaction appears shaped by members of the region's small number of more complex polities. Unlike the Southeast, these pan-Southwestern exchange networks of the Late Prehistoric period had a short history. They were not in place until the first millennium A.D. and had no earlier precedents.

It is only when one considers particular areas within the Southwest, rather than the Southwest as a whole, that evidence for more intensive and redundant interactions can be seen. It is at this smaller scale that the cultural uniformity that characterized the Mississippian world existed and that cults developed. If polity boundaries are defined conservatively, it is at this scale that regular interactions among at least a moderate number of polities can be seen. For example, if great houses were the centers of independent polities, rather than components in a unified Chacoan system, then their close proximity may have made interactions among them quite dynamic and volatile. The same may be true of relations between the Hohokam platform mound sites of the Phoenix Basin.

Beyond the Southwest and Southeast

Some polities participating in the Late Prehistoric Southwestern and Southeastern macroregions had more distant ties as well. These broader connections consisted almost entirely of long-distance exchange. Various Southwestern polities traded with populations in northwest Mexico, California, the Great Basin, and the western Plains. In the Southeast, various Mississippian polities traded with groups in south-central Florida, the south Atlantic seaboard, the upper Midwest, and the eastern Plains.

The area that had the greatest and most long lived influence on the Southwest was Mesoamerica. The earliest direct evidence of these broader ties is the introduction of Mesoamerican cultigens before 1000 B.C., and continued contacts of varying duration and intensity occurred throughout the following millennia resulting in a list of Southwestern-Mesoamerican similarities (artifactual, architectural, stylistic, religious, and hundreds of Mesoamerican trade goods) that is so impressive that some have questioned whether the Southwest should in fact be considered part of Mesoamerica.

Unlike the Southwest, no outside area seems to have significantly affected the prehistory of the Southeast. Developments at all spatial scales have generally been viewed by Southwestern archaeologists as local rather than something stimulated by events or peoples coming from outside the region. In marked contrast with the Southwest, there is no time in Southeastern prehistory for which there is indisputable evidence for trade or other influences from Mesoamerica. There are vague similarities in artifacts, architecture, site plan, and iconography, but these are best explained as the product of a common cultural ancestry, and intermittent and clinal (i.e., down-the-line) interaction perhaps extending as far back as Paleoindian times, which was diluted and/or elaborated to varying degrees in different areas. While some of the Late Prehistoric Southeast's major cultigens, such as maize probably did ultimately originate in Mesoamerica, their adoption appears to have been a gradual process, perhaps even via contacts with Southwestern groups.

The issue of Southwestern-Southeastern contacts remains to be fully addressed. We know that late prehistoric polities in the eastern ranges of the Southwest and the western margins of the Southeast both maintained trading relationships with nomadic groups in the intermediate Plains area. Whether or not this trade resulted in any direct or indirect contacts between Southwestern and Southeastern groups is unknown at present. What does seem certain is that if such interaction did occur, it had little significant, archaeologically obvious impacts on sociopolitical developments in either area.

The World-Wide Scale

Both the Late Prehistoric Southwest and Southeast were characterized by two sets of roughly contemporaneous developments that suggest that archaeologists need to consider even broader spatial scales in their research on these two areas. The first is the emergence of the two areas' largest, most primate centers, Chaco and Cahokia, at roughly the same time. The decline of these two centers and their respective polities may be roughly contemporaneous. These corresponding developments coincided with the beginning and end of a period of generally favorable climate worldwide. Lasting from roughly A.D. 850–1250, this Medieval Optimum or Neo-Atlantic period was followed by a deterioration in global climate variously called the Pacific/Neo-Boreal or "Little Ice Age" (e.g., Bryson 1988; Bryson and Murray 1977; Wendlund and Bryson 1974).

Another global scale process that affected both areas at approximately the same time and with the same consequences was a cultural one: the arrival of Europeans to North America. In both the Southwest and Southeast, European contact brought population decimation and massive culture change.

Comparing Scales

The goal of multiscalar analysis is to compare developments at different scales with one another to see how they may have been interrelated. In both the Late Prehistoric Southwest and Southeast, there are clear linkages between the characteristics of great towns, polities, and the macroregion. The sizes of big sites were correlated with the preeminence of their associated polities. The kinds of public architecture constructed at big sites reflected the relative importance of social ranking *vs.* group solidarity within the broader polity. The emphasis on social ranking within polities, with the number and complexity of those polities, in turn affected macroregional interaction. Thus, developments had different scales and were highly interdependent. The lesson for archaeologists is that to get as complete a picture as possible of a particular prehistoric society, whether it is in the Southwest, Southeast, or elsewhere, all scales need to be studied and then compared.

Explaining the Differences

The preceding multiscalar comparisons of Late Prehistoric Southwestern and Southeastern societies have revealed two fundamental differences: one in the relative emphasis on social ranking in the two areas and the other in the extent and intensity of macroregional interaction. Both differences can be explained largely by differences in the two areas' natural environments. However, environmental characteristics alone do not explain everything. The effects of these characteristics are to impose constraints and offer opportunities. It is the interactions of social variables within the context of these constraints and opportunities that ultimately produce the trajectories of change evident in different areas.

Environmental Comparisons

The natural environments of the Late Prehistoric Southwest and Southeast shared two similarities. First, as mentioned previously, both experienced the relatively favorable climatic conditions associated with the Medieval Optimum or Neo-Atlantic period and the deterioration of global climate that began around A.D. 1250. Second, in both environments water was a critical environmental variable determining where prehistoric populations lived and in what numbers.

Counterbalancing these similarities were several important differences in water availability, physiographic structure, and relative diversity. The Southwest is a harsher, less productive, and riskier environment than the Southeast. Its climate is arid, and precipitation is not only low but highly variable. Consequently, although prehistoric agriculture could be very successful in good times, it was not consistently a reliable subsistence strategy. In contrast, the Southeast is characterized by a moist temperate climate, which makes agriculture both a highly productive and (for the most part) a fairly reliable subsistence strategy.

The Southwest and Southeast also differ in physiographic structure, as created by and reflected in their respective river systems. In the Southwest, the major rivers are few, not very interconnected, and often intermittent in their flow. Thus, the best places to live prehistorically were small in number and widely scattered across a relatively inhospitable landscape. In contrast, the Southeast is spanned by a highly interconnected network of large permanent rivers and their tributaries. Consequently, the best places to live there prehistorically were numerous, closely spaced in a relatively hospitable natural landscape, and linked by easy routes of communication and transportation.

The Southwest and Southeast also differ in the relative diversity of their natural environments. The South-

west can be subdivided into several major zones, most notably the desert, plateau, and mountain, whose differences in elevation are in turn correlated with pronounced differences in temperature, rainfall, and vegetation. Biomass of use to human populations throughout the Southwest is quite varied and in some areas minimal. In comparison, the Southeast is a relatively homogeneous environment, with consistently higher biomass. While latitudinal and longitudinal variation can be defined based on temperature and precipitation, respectively, this variation is fairly continuous. Relatively distinctive macroenvironmental zones, with pronounced differences in biota, such as those seen in the Southwest, are absent.

The Environment and Social Ranking

Differences in the availability of water and biomass of use to humans in the Southwest and Southeast undoubtedly affected the relative emphasis on social ranking in both areas during the Late Prehistoric period. In the harsh, unpredictable, and less productive environment of the Southwest, subsistence would have been a constant concern. Consequently, the most adaptive social strategies would have been those that emphasized cooperation within (and to a lesser extent between) groups in order to even out risks of food shortage. In fact, these are the kinds of strategies that are most evident archaeologically. Throughout the Southwest, the emphasis on polity formation and functioning was the corporate group, not the individual, and the primary ties were ceremonial, fostering cooperation within and between groups. Surplus production would have been possible at some times in some locations, making social ranking possible at some places in the short term. However, ranking was never widespread and where it occurred apparently could not be sustained. Thus, the Southwest's environmental characteristics apparently contributed to an overall pattern of egalitarianism marked by just a few notable examples of ranking, examples whose archaeological indicators are not as clear-cut or consistent as those in the Southeast.

In contrast with the Southwest, the Southeast's rich, productive, and reliable environment not only made subsistence not an overriding concern from early on but offered a high potential for consistent surplus production. This potential would have provided individuals with seemingly ideal opportunities to enhance their social position through competition. As a result, there was a sustained and widespread emphasis on social ranking in the Southeast; and the focus of polity formation and functioning was the chief and proximate elites whose positions were generated through competition within and between ranked kinship lines. This competition contributed to the late prehistoric Southeast's political landscape being much more dynamic than that of the Southwest.

The Environment and Macroregional Interaction

Both the relative diversity and physiographic structure of the Southwestern and Southeastern environments affected macroregional interaction in the Late Prehistoric period. In both areas, macroregional interaction, as evidenced by the limits of major cultural traditions, corresponded to environmental zones. In the Southwest, there were several such zones, each with its associated cultural tradition. In the Southeast, similar environmental divisions were absent, and intensive macroregional interaction, as evidenced by the Mississippian cultural tradition, were pan-Southeastern.

Contributing to these differences was the two areas' physiographic structure, which hindered broad scale macroregional interaction in the Southwesr and promoted it in the Southeast. The Southwest's relatively few, not very interconnected, and often intermittent rivers provided few really good places to live and made travel and communication by water difficult. As a result, complex polities were few and widely spaced. Interaction among them was less intense and less extensive than that seen among Southeastern polities. In addition, there was less conflict, which made the overall social landscape less volatile and dynamic than in the Southeast.

In contrast, the Southeast's highly interconnected network of large permanent rivers provided many good places to live, which were closely spaced and linked by easy routes of communication. As a result, there were numerous complex polities, and macroregional interaction was both far-flung and intensive. In addition, the frequency of conflict made the overall social landscape volatile and dynamic.

The Limits of Environmental Determinism

Environmental characteristics dearly contributed to the differential emphasis on social ranking and the different patterns of macroregional interaction in the Late Prehistoric Southwest and Southeast. However, we would reject purely environmental explanations for these differences. While environmental differences explain a lot, the effects of social variables are also critical in both the Southwest

and Southeast. Environmental conditions set the stage, offering possibilities and imposing constraints. However, it was the interaction of social variables that determined whether the possibilities were realized.

Three brief examples, one from the Southwest, one from the Southeast, and one that applies to both areas, illustrate our point. First, the longer duration of those Southwestern polities that practiced large scale irrigation was due in part to environmental conditions (e.g., water flow, appropriate expanses of arable land) which made canal irrigation possible. In addition, corporate-solidarity enhancing mechanisms, such as the ball game, could have helped channel intra- and interpolity individual and factional competition into socially desirable (and therefore less destabilizing) ends.

A second example is the greater volatility and dynamism of the Late Prehistoric Southeast's cultural landscape. These characteristics were the product of not only the region's environmental characteristics but also of the interaction of the region's emphasis on social ranking, the reliance on competition for achieving high rank, and the proximity of numerous complex polities.

A last example of the inadequacy of environmental determinism is the effects that global climate change had on cultural developments in both the Late Prehistoric Southwest and Southeast. As was mentioned previously, the roughly simultaneous emergence and decline of Chaco and Cahokia coincided with two major climate shifts, the first to favorable conditions and the second to more difficult conditions. The fact that these correlations occur at both Chaco and Cahokia suggest the possibility that climate was a factor in their developmental histories. Yet while climate may answer questions about timing, it cannot account for why Chaco and Cahokia were located where they were. Environmental factors other than climate may have been responsible, or some kinds of social variables, or the interaction between environmental characteristics and social variables.

There are also other questions about the rise of Chaco and Cahokia that cannot be explained by climate change alone. For example, why were Chaco and Cahokia qualitatively different from preceding and succeeding large sites in size, complexity, and impact on the regional landscape? After Chaco and Cahokia had peaked and gone into decline, what came after—even if possessing similar organizational properties—never approached these primate centers in size and architectural elaboration. Were Chaco and Cahokia as large as they were because they were the first? This may not be a question that can be answered by referring to climate change alone.

In both the Southwest and Southeast, the collapse of Chaco and Cahokia was followed by the spread of regional and macroregional cults. These cults may have been a response either to deteriorating climatic conditions or to the leadership and spiritual vacuum created by the disappearance from the cultural landscape of Chaco and Cahokia, both of which seem to have been ideological and political centers.

These examples demonstrate that while environmental characteristics are important, and may in some cases be very important, they alone cannot provide a complete explanation for why the Late Prehistoric Southwest and Southeast were similar and different in the ways they were. Social variables, or more specifically the interactions among them, were also critical. Simple environmental determinism is inadequate. Instead, we strongly advocate a multi-variate systemic model that incorporates both environmental and social factors and focuses on the interactions among them all.

Broader Implications

The differences characterizing the Late Prehistoric Southwest and Southeast have implications for studies of middle-range societies and the process of cultural evolution in general. Traditionally, both ethnographers and archaeologists have approached the task of explaining societal variation and change by classifying societies in a sequence of cultural evolutionary stages. However, the polities of the Late Prehistoric Southwest and Southeast illustrate the inadequacy of such stages for understanding middle-range societies and reinforce the need for alternative approaches to the study of cultural evolution.

The Problem of Classification

In the most widely used cultural evolutionary typology (Service 1962), middle-range societies encompass the societal types of tribe and chiefdom. The differential emphasis on social ranking in the Late Prehistoric Southwest and Southeast highlights a significant problem with using such categories. Namely they constrain our recognition of differing organizational systems and our understanding of how they formed and operated (see Blanton et al. 1996; Earle 1987a, 1991; Feinman and Neitzel 1984:40–45; Spencer 1987:379–383, 1990).

This problem is not so obvious in the Late Prehistoric Southeast. Among Southeastern archaeologists there is an almost universal consensus that most if not all of the late prehistoric societies of their area were chiefdoms. The diagnostic characteristics of chiefdoms, as traditionally defined, are readily apparent, including the obviousness and persistence of ranked kin groups and ascribed leadership. This classificatory success has had the beneficial effect of minimizing typological arguments, and has helped direct research to questions such as how these societies were constituted, interacted, and changed or evolved over time.

However, problems with cultural evolutionary typologies are readily apparent in the Late Prehistoric Southwest. Here, the chiefdom label is used infrequently and with much controversy, primarily because of the absence of clear-cut and sustained evidence for social ranking. While the designation of tribe seems applicable to many Late Prehistoric Southwestern societies, it is clearly inadequate for the area's most complex polities such as those of Chaco, Paquimé, and the Classic period Hohokam. Thus, traditional cultural evolutionary categories cannot accommodate the Southwest's most complex cases—they are neither tribes nor chiefdoms, if chiefdoms are defined as having ranked kin and ascribed leadership.

This difficulty is analogous to the classification difficulties that Southeastern archaeologists have encountered in their studies of societies dating to earlier periods. For example, a number of Hopewellian sites have public architecture and elaborate burials, but as in the Southwest, there is no clear-cut evidence for ranked kin or ascribed leadership. Consequently, as in the late prehistoric Southwest, neither the designation of tribe nor chiefdom seems to accommodate adequately what is known about Hopewellian societies.

These classificatory difficulties can be remedied using a typological subdivision of chiefdoms originally proposed by Renfrew (1974). For Renfrew, individualizing chiefdoms have pronounced kin-based social ranking, which is at least partially ascribed. In group-oriented chiefdoms, group cohesion rather than individual rank is emphasized. This distinction seems to correspond well to the differences observed between Late Prehistoric Southeastern and Southwestern polities as well as between Mississippian and Hopewellian polities.

However, while subdividing the chiefdom category remedies the classificatory difficulties created by the tribe/chiefdom dichotomy, it does not resolve the central task of understanding how Southwestern and Southeastern polities were organized and how they changed. The problem remains one of accommodating variation. In the Southeast, polities seem to fit neatly under the designation of individualizing chiefdom with the primary axes of variation being in their size and degree of complexity. In the Southwest, many Late Prehistoric societies fit neatly into the designation of tribes and the most complex under the designation of group-oriented chiefdoms. These societies, like those in the Southeast, vary in their degree of complexity, and in addition, the group-oriented chiefdoms also vary in their basic structure. Thus, the category of group-oriented chiefdoms suffers on a smaller scale from the same problem of the broader chiefdom category—the problem of not being able to accommodate the variation evident in how prehistoric societies were organized.

A modern, and to date highly productive, resolution to this dilemma of classificatory ambiguity, has been to focus instead on delimiting the range of variation in middle-level societies (e.g., Feinman and Neitzel 1984) and on developing typologies based on explanations as to how and why such variation occurs. Thus, Johnson (1982) has examined how information flow and control mechanisms operate, offering the concepts of simultaneous and sequential hierarchies to describe how decision-making occurs in societies that are vertically as opposed to horizontally integrated; these administrative classifications conform nicely to those in individualizing vs. group-oriented (or Southeastern and Southwestern) societies, respectively.

Likewise Feinman (1995) and his colleagues (Blanton et al. 1996) have argued for a societal classification based on political economy, specifically the kinds of individual behavior that produce two kinds of middle-range societies. When individual actors engage in "network" strategies, the resulting polities are characterized by individual-centered and externally directed hierarchies with power relations predicated on exchange and status enhancement. In contrast, when individual actors engage in "corporate" strategies, the resulting polities are group-focused and internally-directed, promoting group solidarity and relative egalitarianism, and suppressing self-aggrandizing behaviors. These corporate and network strategies, not surprisingly, clearly correspond to Renfrew's group-oriented and individualizing chiefdoms, and Johnson's sequential and simultaneous administrative hierarchies.

Together, variation in the kinds of societies that made up the Late Prehistoric Southwest and Southeast strongly

reinforces the idea that middle-range societies are quite varied. As Yoffee (1993) has noted, complexity can take many forms. Comparisons of Southwestern and Southeastern polities highlight the need to develop alternative approaches that explain rather than obscure our understanding of this variation.

Studying Change

The Late Prehistoric Southwest and Southeast not only illustrate alternative approaches to social existence but they can also be viewed as laboratories for the exploration of cultural evolution. If traditional cultural evolutionary typologies cannot accommodate the variation characterizing middle-range societies, then alternatives to unilineal evolutionary theory, from which these typologies were derived, need to be developed.

One major conclusion that can be drawn from the comparisons presented in this volume is that cultural evolution is not a unilineal process. The variation evident in the Late Prehistoric societies of the Southwest and Southeast suggests that there may be several trajectories middle-range societies can follow.

One problem that confronts anthropologists in any discussions of cultural evolution is determining when in fact evolution has occurred. This determination has been complicated in the past by the ambiguous definition of the terms change and evolution, terms which are sometimes given different meanings and sometimes used interchangeably. We feel that this conceptual confusion can best be remedied by viewing change and evolution as synonymous and as a scalar process that occurs along a continuum of magnitude. Change at the low end of this continuum is microevolution, involving simply oscillations around a norm. Change at the high end is macroevolution, involving fundamental structural change and the emergence of new forms. Between the two extremes is a continuum with no clear division between where microevolution ends and macroevolution begins. This continuum can take the form of embedded scales with microevolution occurring within the context of macroevolution, and lower-scale macroevolution occurring within the context of higher scale macroevolution. An example of the latter is the process of chiefly cycling which can be directional in the long run.

We would argue that evolution along the continuum from macro- to microevolution is a multiscalar process is another way too. Time, like space, can be studied at different analytical levels. There are changes that occur over short intervals, those that take more time, and those that occur over even longer periods. These temporal units can be viewed as forming an embedded hierarchy, just as the spatial units do. The relevance of this temporal hierarchy for explaining change is that short term changes need to be considered with reference to the long term trends of which they are a part and vice versa.

It is macroevolution with which traditional cultural evolutionary research has been concerned in its conception of cultural evolution as a ladder-like progression through societal stages or types. As we have discussed, societal comparisons of the late prehistoric Southwest and Southeast reveal the inadequacies of this approach. We would argue that the Late Prehistoric Southwest and Southeast demonstrates macroevolution as a multilineal process, leading to a wide range of social forms. It is analogous to a branching tree with the branches extending in many directions (see Yoffee 1993).

Thus, the approach we advocate for studying macroevolution as a multiscalar, multilineal process is to document how specific variables relating to settlement, subsistence, political economy, social ranking, ideology, agency, the natural environment and other factors change over time; to compare the respective trends at multiple spatial and diachronic scales within societies; and finally to compare their interrelationships between societies.

In developing explanatory models for societal variation and change, our approach must be multivariate, multilineal, and multiscalar both in space and time. The result of such research may in fact reveal that different explanatory models are appropriate for micro- *vs.* macroevolution, for different time frames (a short term *vs.* a long term), and for different spatial scales. However, it will only be through research that accommodates all of these different perspectives that we will discover whether this is so.

Conclusion

The multiscalar perspective offers a powerful tool for disentangling the interrelated processes that produced the similarities and differences characterizing Late Prehistoric Southwest and Southeast polities. By requiring a consideration of the effects of scale, this perspective imposes a much needed degree of systematization on comparisons between both variables and cases and in turn offers an analytical framework for considering how developments at different scales may have affected one

another. The studies by Neitzel (Chapter 14) and Anderson (Chapter 15), and comparisons of the chapters that preceded them, have shown how developments at different scales in the Southwest and Southeast were interrelated, but sometimes in complex ways. Recognition of this fact highlights the importance of adopting a diachronic cross-cultural multiscalar approach to the analysis of archaeological data, with the goal of advancing our understanding of individual societies (past and present) and anthropological theory in general. Multiscalar analyses, in a very real sense, thus reflects an approach to archaeology capable of answering the kinds of questions appropriate to archaeological data, questions dealing with broad socioenvironmental processes operating over large areas and extended time spans.

As for our understanding of middle-range or intermediate level societies, the analyses presented here have two major implications. The first is that such societies are quite varied. They can vary in their size and degree of complexity, as is evident in Southeastern polities. They can vary in their basic structure or form as is seen both in the Southwestern polities and in comparisons of Southwestern and Southeastern polities.

The second implication for middle-range societies is a consequence of the first—that societal types are not very useful for understanding these societies. Instead, documenting and comparing variation is critical; by masking variation, typologies, however precisely defined, hinder efforts to accomplish this goal.

One final conclusion that can be drawn from the comparisons presented in this volume is that cultural evolution is clearly a multilineal process, leading to a wide range of social forms—a branching tree rather than a ladder, and going in many directions rather than in a simple progression. This conclusion raises several questions. For example, what combinations of environmental and social factors were responsible for determining which trajectory a particular society took? Another question is which of these trajectories, if any, offered the greatest potential for the emergence of state-level societies? Given time, for example, would any Southeastern polities have broken the pattern of chiefly cycling and evolved into even more complex forms? If so, what conditions and/or processes would have made this possible? Multiscalar analysis, involving comparisons among variables, among scales, and among cases, is an essential approach for answering these kinds of questions in order to achieve a better understanding of both middle-range societies and cultural evolution.

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