VIRTUAL AND VISUAL REALITIES: COSMIC SPACE IN THE MOGAO CAVES

by

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Contents

0. Preface (added 2009)			
I. Introduction	page	5	
II. Underlying assumptions and theory		5	
III. Architecture of the gable-roofed caves		20	
IV. Pillars in the Mogao Caves		26	
V. Visual effects in the early caves		37	
VI. Caves with rectangular plan and west wall niches		43	
VII. Creating an illusion of three-dimensionality		54	
VIII. A possible interpretation of two sets of "oppositional" images		66	
IX. The ceilings of the niches		71	
X. The sense of space and cosmos in the niche caves			
XI. The "truncated-pyramid"-roofed niches			
XII. Free-standing U-shaped altar caves		94	
XIII. Conclusion		108	
Bibliography of Works Consulted			
Appendix: Chronology of the Mogao Caves			

0. Preface (added September 2009)

The paper reproduced below, unchanged from its writing in 1998, represented my effort to fulfill the "requirement" for participants in the Silkroad Foundation/Dunhuang Academy summer seminar held in that year at the Mogao Caves. There was an understanding that some kind of "seminar paper" would result from the experience, although it is not at all clear to me whether most other participants in the program actually followed through in producing one. I have decided to risk embarrassing myself by placing the paper I dutifully wrote on my website, even though it represents the work of one who was at a beginning stage of learning about the Buddhist art of the caves and who does not possess the language skills to read in much of the very large literature pertinent to the subject. While some of the reading was done before going to Dunhuang, the rereading and writing of the paper took place over approximately one month immediately after our return. As much as anything, I wrote it for my own benefit, as a way of pulling together some of what I thought I had learned from the incredibly stimulating experience of that seminar with the daily visits to the caves over the course of a month. One or two kind colleagues who have read the paper have ventured that it may contain a useful idea or two, an observation that I would like to think is still true, even if in a graduate seminar in art history it might at best earn a low B grade from an overly generous instructor.

I still feel that insufficient attention is paid to what the creators of the caves and the worshippers in them would actually have seen (as opposed to what we may presume they were supposed to have been thinking, irrespective of whether, in the case of the worshippers, they could really see that which supposedly stimulated the thought). Granted, there is ample evidence that Buddhist imagery was not always intended to be "seen" once it was created. Its very creation was important. Whether or how it was used as a teaching or meditation aid is subject to much debate. In some circumstances the important thing may have been what the subjects portrayed in that art themselves were "seeing." One thinks, for example, of some of the large Buddhist statuary at cave sites placed not so that the statue would be easily visible from the outside, but where the depicted holy figure could look out through a window. Yet, if the artists and patrons intended that there should be a visual impact of the art, as surely was often the case, then what were some of the architectural and pictorial devices employed to achieve it and how did those devices change over time?

A huge amount of the literature on the caves is devoted to iconographic analysis, often of scenes painted "in miniature" and/or so placed on the walls that even with a strong flashlight and binoculars one may have a hard time seeing them. Yet, apart from the "miniatures," there are

easily seen architectural features, sculpture and large-scale paintings of figures, and visual devices such as highlighting with gold. As I have observed in visiting the caves during the seminars in 1998 and 2008, most of the attention of participants seemed to be devoted to deciphering what the scenes are on the walls and ceilings, often, I think, to the exclusion of assessing the totality of the visual experience and thinking about how we (and our distant predecessors) would experience it. This is not surprising where we still have no quick and easy guide to the iconography and where two "experts" in the same cave may argue vigorously over what is depicted. In absorbing ourselves in the iconographic details of individual caves or ones produced in a chronologically narrow period, we may lose sight of diachronic evolution of other aspects of the art. Even if some of that may seem obvious, more undoubtedly could be done to explain why certain changes occurred.

It would be easy to list desiderata as to what might be done to update and add substance to my essay. One of its most serious shortcomings, to my mind, is the absence of any serious attempt on my part to study the Chinese painting of the period outside that in the caves. Obviously any discussion of such important subjects as the development of perspective should explore that literature. A second obvious criticism is that even in the relatively limited realm (quantitatively) of western scholarship on the caves, there is much important new work which has appeared since 1998, including publication of work I became acquainted with then in yet unpublished form. Were I to revise the paper now, I would undoubtedly want to explore in a very different way some of the new ideas about "performance" and more broadly the purpose of the paintings. Individual iconographic meanings keep being reinterpreted, which means some of the explanations cited here are now considered to be wrong. On the basis of revisiting the caves in another seminar sponsored by the the Silkroad Foundation and the Dunhuang Academy in 2008, quite apart from anything else, I can think of various specific corrections which might be made, where I had not accurately noted certain features of some of the caves when making their first acquaintance a decade earlier. Furthermore, since I have now visited some of the other important Buddhist cave sites in western China, I would want to add comparative material from them. Unfortunately, life is short; there simply is no time right now to tackle revising this essay.

Lastly, I apologize to the reader for not including illustrations, which will have to be consulted in the cited publications. At the time I wrote this, I could not take on the additional task of scanning images, and to include them in this posting of the paper would require tackling some difficult issues of obtaining copyright. Apart from the cited books, in many cases, it may be possible to locate many of the images on the Internet (for example, through ArtStor, if one has access to that database).

I. Introduction

The purpose of this paper is to explore how two- and three-dimensional visual effects helped to create a sense of cosmic space in the Mogao caves. To a considerable degree this is an exploration in modern visualization — that is, the ideas developed during the experience of visiting a significant number of the caves over a period of four weeks this summer in a sequence approximating the chronology of their construction and/or decoration. The immediate impressions were reinforced by readings and lectures, but in many cases it was only after my return that I discovered to what degree scholars have noticed some of the same things I had been noticing (and apparently missed others). However, this cannot pretend to be an exhaustive piece of research, in part because some of the issues raised are large and intractable, but more immediately because of the still relatively limited study which underlies it and the inability of the author to consult literature in Chinese and Japanese or read the most pertinent primary sources. Among other things, given time constraints, I make little attempt to bring in comparisons from outside Dunhuang, even though I am well aware of the necessity to study the interrelationship of the art there with that in India, Tibet, other parts of Central Asia, and metropolitan China. Given the nearly unbroken record of the art at Dunhuang over a period of centuries and the fact that for the most part it was the work of local artisans under the patronage of local society, I think we can nonetheless learn a great deal from examining its evolution *in situ* and apart from an examination of outside influences.

II. Underlying assumptions and theory

I brought to Dunhuang a background including fairly extensive reading and familiarity with the art of Eastern Orthodox Christianity, which connects with my specialization in the history of medieval and early modern Russia. I have taught both Byzantine History and courses on Russian civilization which have a substantial component relating to the visual arts. To study Orthodox art is to deal, among other things, with a complex, formal iconography and with formal canonical prescriptions regarding the "dimensionality" of the images. While on the one hand in the post-iconoclastic period (that is, following the early 9th century C.E.), three dimensional representations of holy figures were forbidden,

at the same time (and in fact even before iconoclasm) Byzantine artists and churchmen developed sophisticated visual devices to take advantage of the three-dimensional architectural space within churches. In the best examples of the so-called middle Byzantine style (approx. 10th-12th centuries), two dimensional images were in fact part of the three dimensional space within which the believer worshipped [Demus]. Thus, even though the images were understood merely to reflect their prototypes and not to be venerated as "idols," the worshipper moved in a space in which the holy figures surrounded him and were "present." The space and the images were hierarchically ordered and represented the cosmos, with a progression from earth to heaven, where the various elements of the architecture itself correlate with the interior iconography (in masonry churches mosaic or fresco). The hierarchical arrangement of space in an Orthodox church is horizontal as well as vertical: one moves from this world at the west entrance to the holy space that includes the altar on the east end. On leaving the church, often one sees on the west wall a depiction of the Last Judgment, as a reminder when one is preparing to re-enter the world from the sacred space.

A specific example of the essential hierarchical elements of the middle Byzantine artistic system can be seen if one stands in front of the altar of a church such as the cathedral of Sancta Sophia in Kiev and casts the eye from the lower register of the main apse upwards [Lazarev]. The imagery shows in order the sainted bishops of the early church, the earthly ministry of Christ (the Eucharist) with the apostles processing toward the center of the apse where Christ is offering them the bread and wine, the Mother of God with arms upraised in prayer extending through the curvature of the conch of the apse and leading the viewer's gaze ultimately to the figure of Christ in Judgment (Pantocrator) at the top of the central dome. Flanking the opening into the apse is a depiction of the Annunciation, with the Archangel Gabriel on the left and the Virgin Mary on the right, where they constitute one iconographic unit, even though separated by architectural space.

As I began to learn about Buddhist art and to experience it at Dunhuang, I wondered whether perceptions of its images might not be analogous to what we see in the Orthodox world [note there is one book-length effort (Upadhya) to compare Byzantine and Indian Buddhist aesthetics, but the results are largely incomprehensible and, I would

venture, somewhat bizarre]. While in a very obvious respect — namely the abundance of sculpture in Buddhism — what is acceptable in religious imagery differs markedly in the two faiths, the conception of spatial relationships within sanctuaries and the relationship between images and ritual space seems to invite comparison. One might easily argue this is a "given" for any ritual space, but I do think the proposition needs testing. In particular, it seems worthwhile to explore the question of visual devices that were used by the artists to focus the attention of the viewer/worshipper. Also, given the fact that the caves, like an Orthodox church, have virtually every surface covered with images, it seemed logical to ask whether they contained as thoroughly and consistently elaborated iconographic programs. To a limited degree while at Dunhuang I was exposed to analysis of the "program" of individual caves, especially in Ning Qiang's study of cave 220. While there I read the dissertation by Ho, and after my return the one by Abe, both of whom undertake an analysis similar to that which I have in mind here. However, I am not aware of any systematic effort to explore all of the ramifications of the subject beyond individual caves and especially to attempt to explain the substantial changes that occurred over time at Dunhuang in regard to iconographic programs, the dimensionality of representations and use of space, and the visual techniques employed by the artists.

Apart from whatever previous "art historical" ideas I might have had, this study is a reaction to the experience of looking at the art in the caves. Given the overwhelming richness of any cave's decoration, it was natural, especially for one relatively uninformed about Buddhist art and iconography, to focus on details and not really be able to stand back and experience the whole. Judging from the literature and from observing my colleagues in the caves, I am not alone in being "distracted" by detail. We naturally should be concerned with identifying the iconograpy; one of the most significant contributions of the Dunhuang Institute scholars has been to decipher a great deal of it. It is very easy when confronted with "screens" depicting incidents recounted in sutra texts to want to know exactly what each of those images shows. Yet by the time one has perhaps deciphered a couple of them, the half hour or so for the cave is up and it is necessary to move on. Looking at details of sculpture can be equally distracting, however essential a study of the changes in, say, fold patterns in garments may be if we are to arrive at an exact chronology for the caves and their art. Too much of the time in the caves, I felt like the proverbial blind man and the elephant, where touching the individual parts did not give a sense of the whole. As the time at Dunhuang progressed and I gained at least some familiarity with detail so that it did not require so much of my attention, I kept trying to see some kind of "larger picture." Were I to return now, I would probably look very differently at the caves from the way I first did and, I would hope, see a lot more in them.

Unfortunately, even authoritative texts that at least should be attempting to analyze the large picture often fail to do so. For example, William Watson's recent volume in the Pelican History of Art, deals separately with architecture, painting, sculpture, etc. As one might expect, the art of the caves at Yungang, Longmen and Dunhuang has a prominent place in his narrative. Yet heaven help the person who would attempt to get from him a sense for the total conception and experience of the art at any one of those complexes. We learn about their sculpture in the context of a discussion of style in sculpture, their painting in a similar context for painting, but nary a word about the interaction between the two or with the encompassing architecture.

On going back to my notes, I find our lecturers kept reminding us of the necessity to study the totality of the art in the caves and to look at it from differing interpretive perspectives. Of particular relevance for my purposes here are various observations made by Prof. Wu Hung, both in his lectures and articles. He noted that one aspect of art history is to study the relationship between images and architecture in ritual spaces; he delineated episodic, sequential, opposing and iconic compositional modes. He took issue with the tendency of some art historians to apply a "theory of response" uniformly to all kinds of imagery and suggested that the response of the viewer may in some instances be internal and not visual. These observations apply, for example, in his analysis of miraculous icons at Dunhuang and in his treatment of the development of paradise representations [Wu 1992a, 1996, 1998]. Such images are a stimulus to internal visualization connected with meditation in the ritual space and would seem to reflect changes in patterns of worship. In discussing the issue of whether images in the caves could have served as visual "aids" for exposition of texts, he pointed out that the conditions in the caves in fact might have prevented that from being the norm--not only were many caves too small, but given poor lighting and the position of many of the images, they would not even have been visible [Wu 1992b]. Finally, of some relevance here are the issues he raised in his analysis of the "Subjugation of Demons" representations — that is, the imagery may reflect in the first instance the artist's conception of space and composition, and not any kind of linear narrative sequence of the text on which the representation is ostensibly based [Ibid.].

While I find all these arguments persuasive, the starting point for much of what follows is an emphasis on the visual experience of the caves. That is, I think it is important to ask on the one hand how the caves might have been conceived with visual effects in mind, what an individual entering the caves might or might not see, and how he might then interact with that space. It seems appropriate to ask what visual devices might have deliberately used by the artists to focus the attention of the worshipper, and even in the cases of images that perhaps were to be visualized internally, what (if any) elements of them which also would have been seen "externally." Perforce this kind of discussion will have to consider the relationship between two-dimensional and three-dimensional elements in the caves and how that may have changed over time.

Granted, there are some serious methodological obstacles to this study. For one, it may be that our visual understanding is somehow very different from that of, say, a Buddhist monk at Dunhuang in the 9th century. We respond to certain visual stimuli that may not have drawn the attention of someone in a different era educated in different traditions. This kind of question can legitimately be raised, I think, if we consider the example of sculpture. In discussing stylistic changes in the sculpture at Dunhuang, perforce scholars such as Marylin Rhie and Janet Baker use descriptive terms such as "static" or "remote," as opposed to, say, "naturalistic" and "accessible." Yet we might ask whether our response to these images is similar to the response of one contemporary with their creation — would a worshipper somehow have found a Tang bodhisattva more "accessible" than one from the Northern Wei? We cannot know for sure, although what we think we understand about the development of Mahayana beliefs presumably reinforces what we see in the changes in sculptural style as well as the positioning of the images in the caves.

In a related matter, we may decide that one cave is "more successful" than another, in terms of its overall composition and proportions, the artistic rendering of its images and so on. As an example I would cite caves 390, and 100 in comparison with 61. There is something about the proportions of cave 390 including such matters as the height and shape of the niche and the skillful gradation of distances in the registers of the painting which creates a harmonious ensemble that is "just right." Cave 100 and cave 61 are different in form but they are both Cao family creations dating within a decade of each other. Somehow cave 100 seems slightly second-rate aesthetically and "cheaper" (e.g., if one looks at the care devoted to paintings and decorative elements). Yet we might ask whether our sense of the artistic qualities of a cave has much of any bearing on the way that a worshipper would have experienced it, especially where we are dealing with religious representations produced in a culture that did not necessarily share the values we have inherited from the conceptions of the artistic genius which developed in the Renaissance. At least in the Orthodox Christian world, the icon painter was supposed to be anonymous; one iconic representation, providing it followed the rules, was considered to be be of equal value with any other. This is not to say that worshippers were necessarily insensitive to "artistic" values though. Clearly the Chinese primary source texts often cited with regard to art (which I have not explored to any extent) demonstrate that there was an aesthetic as well as an "ideological" appreciation of its value. While we do have such material in the dissertation by Fraser regarding artistic practice from the 8th-10th centuries [Fraser 1996a], I would venture that one research agendum should be to explore more systematically issues such as proportion in the architecture, the sculpture and the paintings of the caves.

A third problem we confront concerns the fact that the caves as we now see them generally are not the caves as they existed at any specific earlier time. Here it is not simply an issue that caves were re-painted, but that the antechambers and corridors are all too often demonstrably different structures, the size and shape of niches may have been altered, the sculptures have been repaired (often badly) or replaced. Simply with regard to the last fact, I hardly need to stress how jarring it is to see in, say, a Tang cave the sculpture lovingly "restored" by monk Wang using Stein's money. Even where the original paintings are more or less intact, a great many of them have been stripped of their gold leaf, probably by the Russians who camped at Dunhuang in the aftermath of the Bolshevik Revolution and scrawled graffiti on some of the cave walls. The vandalism by Langdon Warner is all too well known, although fortunately a few missing squares of mural or a space where there had once been an exquisite kneeling bodhisattva statue (in cave 328) do not unduly compromise our ability to visualize the original appearance of the ensemble.

By the time we have our first photographic record of the caves, the exterior walls in many cases had disintegrated (a well-known example is cave 259). Those photographs also raise interesting questions about the ritual use of the interior space and how that may have changed over time. In the Pelliot photographs from early in this century, we see, for example, altar tables, banners (e.g., draped on the sculpted "trees" on the pillar in cave 428), circular altar platforms, stupas, and even in one case a wooden canopy over the central area of the cave. Archaeologists have discovered, among other things, fragments of silk banners embedded in the caves and dating from earlier centuries (e.g., in cave 130), and the treasures in cave 17 included many silk banners from, e.g., the Tang period. Paintings in the caves in various contexts show banners along with the images of the holy figures; various sutras remind us of objects connected with veneration. For a contemporary example of the visual "clutter" created by display of such ritual objects that were not an integral part of the permanent structure, one can visit the temple with the Parinirvana sculpture at the monastery on Wen-shu Shan, near Jiayuaguan. While the careful study of the Mogao caves in most cases has enabled scholars to determine what may have been added long after the original excavation and decoration, what we might call the "ephemeral" components of the rituals (e.g., banners, small altars) probably need to be imagined as part of the visual environment in the caves even in their early history.

A critical factor in any discussion of the visual elements of the caves is light (or the absence thereof). The erection of the present outer wall and istallation of doors in the 1960s means that the level of natural light in the caves all too often may be different from what it would have been in an earlier century. This is not to say that the caves in all cases necessarily would have been more brightly illuminated than now though. In her dissertation, Judy Chungwa Ho captures the effect the caves might have produced on a worshipper coming into the dark space from the glare of the desert sun:

The climactic moment of the pilgrim's journey culminated as he entered the dim cave interior and finally beheld the Buddha icon or icons. This was a vertical as well as a horizontal journey, from below to above, exterior to interior, light into darkness. The contrast of blinding light from the desert sun with its reflection from the sand outside, and the dimness of the interior can be seen as a dramatic and tangible version fo the pilgrim's inner experience. As forms became indistinguishable in the dark, he would be jolted out of his ordinary temporal and spatial expectations. Finally, through contemplation of the sculpture and paintings in the cave interior, his physical journey would be transformed into a spiritual one. [Ho 1985, p. 36]

The eye does adjust to the semi-darkness, and gradually one can make out in fact a considerable amount of detail, where, of course, the features most readily visible are those on the East-facing walls. At the same time though, as we discovered on site, even the assistance of powerful flashlights might not be adequate to decipher small details, unless we also used binoculars. Surely apart from the limits of inadequate lighting, many worshippers would have been challenged by limited vision when it came to discerning anything much beyond the ends of their noses.

We know that candles and lamps were used in the caves; among the Dunhuang texts are ones documenting an annual lamp-lighting ceremony. In rare cases such as cave 322, lamp brackets are still in place on the west wall in the corners and in the center over the niche. We also have some painted images of large candelabras used in lamplighting ceremonies that were part of the worship in particular of Bhasaijayaguru (cave 220, N. wall; cave 417, over niche, W. wall). Yet we cannot know how extensively artificial lighting was used or how much light it would have produced. Although 20th-century scholars have used such lighting in the caves, to the best of my knowledge, no one has seriously studied what it might have been like to see the caves only using candle or lamp light. Yet it seems clear that some visual devices in the caves were intended explicitly to attract attention either by virtue of their catching limited natural light entering the door in the East wall or to reflect flickering candle or lamp light. Whether such design was as sophisticated as that which underlay the design of middle Byzantine mosaics is another matter, but at least for argument, we might posit some analogies between the two situations. Observations that have been made about the alternation of coloring in some of the thousand Buddha patterns in the caves suggest as much [Whitfield, p. 281, regarding cave 263]; we might add to this an attempt to analyze the use of reflective gold leaf and

the possible effect of sculpted or other raised elements that would have produced shadows on the surfaces. Although my treatment is far from systematic, I shall attempt to pull together material relating to this topic in later sections of this paper.

How we experience the caves now is to a considerable degree "filtered" not only by matters such as lighting which affect *de visu* examination, but very importantly because of the limitations of photographs. Since many of the ideas developed in this paper emerged only toward the end (or after) our time in the caves, and since my notes and visual memory omit essential details, to a considerable degree I have had to rely on photographs to examine systematically the role of visual devices in the treatment of space. I have spent considerable time going back and forth in the pictures, looking at (or for) details and larger impressions that would seem to make sense within the interpretive framework I am developing. In the process, I have become ever more acutely aware of the limitations of using even the best photographs. If one wishes to illustrate in a single photograph a significant portion of any cave (e.g., if one wants to show all of the west wall and part of the ceiling or the west wall and part of an adjoining wall), about the only way to do so is with a wide-angle lens. This often has the effect of suggesting greater depth and distance than in fact one would sense with the naked eye. Frequently the photographs that seem to show the caves best are ones taken from below looking up [e.g., DMK, III, pl. 165]. This can give a distorted sense of height and of the degree to which surfaces are vertical or angled. Such vantage points do have the virtue, it seems, of presenting the view as it might have been seen by a person kneeling or seated in prayer. In fact it is precisely such photographs that give us the best sense of the way in which the viewing of the niche ceilings was conceived by the artists. If the photographs at times exaggerate "distance" and perspective, that may not necessarily be a bad thing, for it would underline the way visual devices which might give a feel for the extension of space into an infinite cosmos. However, the visual impact of sculpture when seen in a two-dimensional photograph is likely indeed to be "two dimensional" [e.g., Whitfield, pl. 100].

Different photographs of the same scene can provide very different amounts of information. All one has to do is compare the often highly inadequate reproductions in the Dunhuang Academy's DMK with the elegant computer-enhanced images in Whitfield

to see this. Partly, one assumes, because it is attempting merely to "document," the former for cave 427 [DMK, II, pl. 52] washes out essential visual devices or distorts even to the extent of reversing what we might call "natural highlighting" [caves 61 and 55--DMK, V, pls. 52, 87]. By contrast, Whitfield clearly is sensitive to the effects produced in natural light, as one can see from his depictions of cave 427 [Whitfield, pls. 62, 63] and cave 61 [pl. 142].

Since this paper is ambitious enough to encompass most of the period of active cave construction and decoration from the fifth to the eleventh centuries, some preliminary comments on periodization are also in order. While periodizations tend to be necessary to facilitate analytical discussion, they have obvious dangers in oversimplifying issues or erecting boundaries relevant to one factor that do not work for another. Change over time is very likely marked not by abrupt discontinuities but rather is gradual. Furthermore, the features of one "period" may well continue into its successor and co-exist with the latter's new features. We need to keep such considerations in mind when we examine the history of the Mogao caves. The Dunhuang Academy's periodization by dynastic date is one ordering principle, but as with any history where cultural con-siderations are foremost, political boundaries may be largely irrelevant.

For example, it seems unlikely that we can distinguish very precisely periods when one type of ritual predominated. One of the substantial virtues of the dissertation by Kenneth Abe [Abe 1989] is his demonstration of the possible multiple rituals in a given cave, each of which connects with a feature of the architecture and/or iconography. While it would be tempting to assume such multiple ritual functions for most of the caves, we may be safer in positing that some caves had a very specific designation while others fulfilled multiple functions. Furthermore, it seems likely that we should avoid a "Whig view" of the evolution of the caves both artistically and in terms of function. Stylistic change in sculpture, for example, is clearly a gradual process, and we always need to allow for the possibility of conscious or unconscious archaism. Iconographic themes evolve through more than one architectural form. Some that are known in the early caves and then pretty much disappear re-emerge later in caves with a different architectural form from a period when possibly the religious perceptions and rituals had changed.

We assume that early caves continued to be used in later periods, but then we might ask whether they were used in the same way as their original designers had intended and whether worshippers at a later time would have understood their images and design as had been originally intended. In fact a great deal has been written about changes in Buddhist belief and practice as new schools developed, new texts or commentaries became available, and so on. Moreover, there appears to have been nothing immutable about the earlier forms and images. In many instances, the earlier caves were adapted and re-designed to accord with later tastes or practices. Re-carving niches and totally re-plastering and repainting the walls was common enough. In other cases, clearly earlier caves were sacrificed as space was sought for new and often larger caves. That fact by itself should not be taken to indicate that all caves of a particular design or iconography had become "obsolete." The fact that construction of caves with a central pillar largely ceased by the late 6th century (the few later examples are treated as "anachronisms") is generally taken to indicate that one important ritual, circumambulation, ceased to be practiced, and the explanation for this somehow is said to lie in the triumph of Mahayana, and more particularly Pure Land beliefs over the earlier Hinayana [see Baker diss.]. I have seen no attempt to discuss whether circumambulation continued in the pillar caves, whether it could have been practiced in the square-plan niche caves, and whether it continued to be practiced (or, if you wish, revived) with the advent of the late Tang and Song caves with free-standing sculpture on U-shaped altars in the center of the room.

I have provided in an appendix a table that is intended to provide as precise as possible a chronology for the caves, in part simply because I am unaware of any equivalent compilation. However, in my discussion below, I do not always adhere to this chronology. While we may be able to discern chronologically-defined "trends," at the same time I think it is reasonable to assert that artists may have freely chosen from a repertoire of "solutions" to particular problems. Constraints of available space or the particular iconographic needs of any given cave may well have influenced the artistic decisions. To a considerable degree our analytical categories are those of form and function. Thus we need to allow for the possibility that an artist referred to caves distant from his own time or was quite eclectic in his choices. It may be that an emphasis on form and function will eventually lead us to reconsider accepted chronology of some caves.

Another issue regarding periodization is the tendency by both Chinese and Western scholars to admire the art of one period at the caves and denigrate (or at least ignore) the art of another. In simple terms, we can say this approach boils down to "all roads lead to the Tang," and after that decline. On the one end chronologically, even for a scholar as analytically sophisticated as Janet Baker, the immediate pre-Sui period "primarily preserves the styles, content and functions of the Northern Zhou and Wei caves," and what is important about the pre-Sui sculpture was primarily what it lacked: "skeletal structure, plastic form or individualized features and personality" (p. 269). What happened by the end of the Sui was the "ascendency of the fully iconic caves filled with monumental images of the Buddhas of the Three Realms and the embryonic Paradise scenes, portrayed in all the splendor of Tang courtly style. Chinese Buddhist artists and architects were now emancipated from the authority of alien models and were creating a distinctively Chinese Buddhist art" (p. 270). Indeed, Baker shows very convincingly how some of the important features of Tang art developed during the Sui, but ultimately with the limitation of resting her analysis too heavily on stylistic evolution in painting, rather than looking more broadly at the total program of the caves over an extended period. (Perhaps it is ironic that she criticizes Marylin Rhie's dating of the caves for her apparent emphasis solely on stylistic evolution of sculpture; curiously, Baker's dating rarely contradicts Rhie's.)

What about the "other end" chronologically? In her ambitious but now curiously dated survey of the caves from their earliest phase to the 11th century, Chee Mee Huie quotes approvingly H. Chapin's observation that "in the ninth and tenth centuries Tunhuang represents a backwash of Chinese Buddhist Culture," and then proceeds to discuss how cave 146 (late 9th/early 10th century), her last major example, has a "curious lack of iconographic focus" [Huie, p. 653n792 and p. 575]. Surely it was not merely limitations imposed by his publisher which led one of the most perceptive students of Dunhuang, Roderick Whitfield, to narrow his analysis as he approached the eleventh century and end with a single example from the Western Xia. He reaches the gloomy conclusion that "the rulers of Dunhuang were imposing their own stamp on the Mogao caves, a reductionist

vision impoverished both in style and subject matter" (p. 339). The issue here is not whether we should try to make a case, say, for something brilliant in the endless stencilled Buddha patterns on the walls of the caves in that period. As I hope to show, they may be of interest for very different reasons; in fact I think it was precisely the artistic shaping of space and its meaning in these later caves which led me try to understand its origin in the earlier ones. I am not so sure that some of the pre-Tang ideas were abandoned forever. One might, for the sake of argument with conventional wisdom, even argue that many of the "later" caves, notably the group with free-standing horseshoe altars and altar screens represent a "renaissance" of sorts as well as a creative new departure that shows an expansive, not a "reductionist vision." At very least it should be appreciated in its own terms, rather than dismissed. That I do not go beyond these caves in my own survey is not a reflection of any low estimation of what follows but rather a practical limitation imposed in part by a lack of information (the biases mentioned above mean that publication of the later material is spotty) and lack of time. In fact, some of the Yuan caves (notably Mogao 465 and Yulin 3) are brilliantly conceived. I wish I could afford to indulge in analyzing them here.

While there are many ways to approach the study of the caves — for example, one can legitimately emphasize the political or social context and its significance for their art — it strikes me that in the first instance the emphasis should be placed on their religious aspects. All of the studies that I find most relevant to this paper do that. For example, Angela Howard's study of the Cosmological Buddha not only traces the history of the iconography but relates it to Buddhist scripture and places the images contained in the caves of Western China (among them Mogao cave 428) in the context of the iconography of the cave as a whole. Kenneth Abe's study of cave 254 does explore at some length the political and social context outside the cave itself. But the core of his analysis involves Buddhist texts regarding, among other things, visualization practices, and a study of the iconography of the cave both in detail and as a whole. If his study is to be faulted, it is in his inability to explain how "exceptions" fit within the context of an iconography that he insists was carefully planned in its totality, and in his relative lack of attention to visual and other devices that might in fact argue for the greater unity of the iconographic program instead of a parallelism of its several elements.

Perhaps the best example of a study that really penetrates the religious and artistic conception of one of the Mogao caves is the dissertation by Judy Chungwa Ho [Ho, 1985], which creates a largely persuasive argument regarding the unity of conception and iconography in cave 249. [Note, Ning Qiang questions some aspects of her interpretation; see citation by Whitfield, pp. 283 and 285n8.] I would like to think that her use of fundamental studies of Byzantine art — Demus's book on mosaics and Weitzmann's on manuscript illustration — helps explain why she takes the approach she does. Like Abe, she is attentive to text (in the given instance the Vimalakirtinirdesa sutra), but unlike Abe, she pays attention to the visual devices that connect the various parts of the decoration of the cave and suggests that it is really a unified sacred space. We might keep in mind her description of how she will proceed in analyzing the cave and (by extension) how the viewer/worshipper in cave 249 might have been expected to "see" it:

The story is told in multiple sequences, requiring the viewer to incorporate the painted images across the domed space of the ceiling, the sculpture in the central niche, as well as the lateral walls into one unified visual field. Images are used both literally and symbolically...[p. 77]

She concludes that "the iconic and narrative program in Cave 249, with its interlocking elements of painting, sculpture and architectural space, is the only extant example of its kind" [p. 226]. If she is to be faulted, one might suggest that occasionally she forces arguments as to how certain iconographic details "fit" a program depicting visually the ideas of the Vimalakirtinirdesa Sutra (perhaps some alternative explanations might be adduced). Furthermore, her conclusion about the cave's uniqueness may be premature until similar attempts at analysis have been applied to many more of them. Since my study sets the almost impossible task of looking at a huge sweep of time without the benefit of such detailed analysis having been done, perforce I will be much less comprehensive. However, I would argue that her approach to looking at the imagery in the caves in its totality and in multiple ways is worthy of emulation.

Among the studies that attempt to get at the cosmological significance of the architecture of the caves, in particular I should mention the oft-cited article by Alexander Soper [Soper 1947], which explores the ways in which these caves (among other East

Asian religious structures) seem to embody concepts of the "Dome of Heaven." Soper stops short, however, of discussing the totality of most of his examples, since his main concern is with the upper parts of the structures. The recent article by Puay-Peng Ho [Ho 1992] specifically addresses the issue of the symbolism of the central pillars found in many of the early Mogao caves; there is every reason to accept his argument that conceptually they were seen as connecting heaven and earth and may very specifically in at least some cases have been understood to represent Mt. Sumeru. I shall attempt to build on his discussion by looking at some elements of these caves that he did not discuss in detail.

Finally, my critical comments notwithstanding, I have found the dissertations by Huie and Baker to be very helpful. One cannot but be impressed with Huie's thoroughness in teasing out substantial detail about a great many caves solely on the basis of published descriptions and photographs. Perhaps she can be forgiven that her thesis has no thesis (not even a conclusion). One has to wonder whether *de visu* examination of the caves would have led her to follow up on her often very perceptive but scattered comments addressed to some of the issues that concern me. She seems to be very sensitive to the issues pertaining to the opening up of space by the use of visual devices, even though occasionally, I would argue, she reaches exactly the wrong conclusion from the evidence (e.g., with regard to the appearance of the U-shaped altars in the niches of the Tang caves).

Baker's thesis has been a major source for my understanding of the development of realism and perspective by painters, a huge subject which demands much more extensive treatment than I have been able to provide here. Indeed it seems likely that the development of Tang "naturalism" and the changes in spatial configuration and understanding are two sides of one coin. Certainly one cannot discuss the evolution of the niches in the late 6th-9th centuries without careful consideration of the paintings in them and the relationship between those paintings and the sculpture they surrounded. Nor can the significance of the changes in the niches be understood without reference to the development of the sophisticated and complex representations of Paradise. My comments on these topics may seem somewhat rudimentary, but I hope they may point in some of the right directions. To anticipate, part of my argument is that by time of the Tang, many of the earlier visual devices that had been used to create a sense of total cosmic space in a cave had been abandoned or were being applied very differently in a way that would seem to have limited the "direct" experiencing of that space. This observation coincides with the generally accepted idea that an emphasis on internal visualization was the most important feature of the worship in the caves during the Tang. As we shall see in conclusion one of the caves which seems to represent the apotheosis of Tang developments (cave 156) was praised by a contemporary as embodying perfectly the whole of the cosmos. Nonetheless that commentator's contemporaries were in the process of developing the visual realities of some important caves in new ways that surely must have reinforced the understanding of the virtual reality in the mind of the Buddhist worshipper at Mogao.

III. Architecture of the gable-roofed caves

The logical starting point for my study is to look at cave architecture, in order to establish how the basic forms changed over time. [A good overview with helpful diagrams of all the variants and the analogous models from elsewhere is the essay in DMK, II, pp. 187-199.] The basic types are well known, but it is not clear from my reading whether sufficient attention has been paid to how they evolved individually or the ways in which one type may have laid the basis for the emergence of another. Furthermore, within the framework of a few basic structures, the number of variants is substantial. Often the clues about change seem to lie in examination of detail, not merely looking at floor plans and elevations. In this section I shall not attempt to look at all the issues pertaining to illusion of space; those will be dealt with in later sections where I break down the larger topic into units such as the one on niches and their decoration. Also, note that my concern in this discussion is primarily with form, function, and conception, but not with the question of outside sources (influences).

Although it is likely these were not the earliest forms, among the early caves they constitute a particularly important group which provides insights into the relationship between the cave temples and freestanding religious architecture. Since most of the "gable-roofed" caves also contain central pillars (interpreted variously as stupas or pagodas), often that characteristic is the main one used for grouping. However, one

might argue that the pillars are a secondary feature, which may be absent in certain circumstances where the cave nonetheless has a gable roof. The gable roofs generally are transverse (cave 275 is exceptional) — that is they run perpendicular to the main axis of the cave from entrance (gnerally on the east) to the west wall — and they are found above the eastern third of the cave, with the western portion having a flat ceiling.

To provide a point of reference, let me tabulate the gable-roofed caves for which I have useful detail and visual information (*de visu* and/or photographic). The table provides some remarks on other architectural or "architecture-related" decorative features that then will be discussed separately. Presumably a complete list would be substantially longer, but the material here should be sufficient to give both a good sense of variations and a reasonable chronology of essential changes in the form.

Cave	Date	Remarks
275	mid-430s	Unusual: gables are on sides in longitudinal direction. Rectangular hall with no pillar and no niche on west. Small <i>que</i> -style ("Han gate") niches on upper N and S walls.
257	450-500	Transverse gable in E half, with inset channel at top painted in Laternendecke design. Flat ceiling (w. Laternendecke ptg.) on W with pillar. W face of pillar a single niche; other faces, single que-style upper niches, double crown arch type ("Indian-style") niches below. No niches on N/S walls. Articulation of architectural elements on gable and in dado on W face of pillar.
260	450-500	Apparently same as no. 257 but for molded pilasters on dado front of pillar. Both have rounded moulding under the mantel below niches on pillar; this lacking in 259, 254.
259	450s	On W, only protruding "front" of pillar, probably because Nos. 257 and 260 already cut at angle behind. 4 que-style niches on upper N and S walls, 3 crown arch niches below them. Many molded details including ledges, gable roofs of upper niches, beams in main transverse gable. Painted Laternendecke design on flat roof of W part of cave.
254	ca. 470s	Transverse gable with articulated sculptural details. Flat roof and pillar in W. half of cave. On pillar upper niches (one each on S, N faces Han-gate type; main niche, lower ones N & S and both on W of crown arch type. West half of upper N & S walls with crown arch niches; under gable peak on N and S and higher than other niches, a que-style niche.
251	439-534	Description as for 260, w/o molding under mantel on pillar.

263	439-534	Transverse gable, flat western half roof with square pillar. crown arch niches upper wall under each gable peak and upper middle of W. wall. When cave was re-built during Xi Xia, a single deep niche was carved in E face of pillar; any other niches it may have had were plastered over. Pillar niche has truncated pyramid ceiling.
248	535-556	Transverse gable edge abuts pillar on E (i.e., no flat section of roof there); in W part of cave beyond, Laternendecke motif on flat roof. Painted, not sculpted, architectural elements on gable. Square pillar with single crown arch niche on each face; under mantel, rounded moulding. No niches on outer walls.
288	535-556	Transverse gable with articulated architectural elements, including a central "well". Flat roof on W, including in front of square pillar which single E-facing niche and both upper and lower niches on other faces. Distinctive two-step architecture of pillar, with outward curving walls of lower half forming a ledge about half way up. No niches on outer walls.
431	535-556	Transverse gable with molded architectural detail. Flat roof on W. with Laternenedecke pattern. Square pillar, with single niche on E. face (not clear about others); distinctive in that dado and niche space approximately of equal height. No niches on outer walls.
432	535-556	Small transverse gable W side. Pillar with niches on all sides. Original decoration now lost under Xi Xia repainting.
435	535-556	Transverse gable abutting square pillar directly on E. Articulated beams in gable. Laternendecke design on flat roof of W. Pillar has single E side niche and upper and lower niches on other three sides, the upper one being que style and lower crown arch type. Also, as with 288, a two-step effect created on S, W and N sides of pillar, forming "shelf" under upper niche. Curved molding under mantel above dado. No niches on outer walls.
437	535-556	Similar features to no. 435, except small expanse of flat roof in front of pillar; most surfaces including ceiling re- painted. Appears that there are upper niches on S, W, N sides of pillar, as there is analogous shelf to what is in no. 435. Below mantel, double rounded moulding.
428	565-576	Transverse gable with painted architectural elements; on W flat roof with Laternendecke design, including in front of square pillar which has one niche each side. Distinctive sculpted decoration on pillar with trees flanking each niche and extending into upper part of pillar. No outer wall niches.
290	557-580	Transverse gable with painted narrative scenes (no beams). Flat ceiling to W, with narrow strip in front of square pillar; Laternendecke design on N,S,W. Single niche on each side of

427	580s	 pillar. Below mantel, rounded molding. Anteroom with 6 huge sculpted guardians. Broad gable in main room, abutting square pillar; has recessed center channel. Large statue triads on E face of pillar and on N and S walls under gable. Remaining three sides of pillar have single large niche each. Thousand buddha design on walls and ceilings (no Laternendecke), no painted architectural elements. Analogous to cave 427. Pair of guardian deities in
292	581-618	anteroom flanking entrance. High-ceilinged with transverse gable on E. end and flat ceiling on W with pillar. Statue triads on N and S under gables and in front of E face of pillar, which has niches on remaining sides. 1000-buddha motif on walls and ceilings. (NB: descr. in Duan, 367-8, not entirely accurate.)
302	584	Small gable above E quarter of cave; decorated with narrative scenes, not architectural elements. Distinctive central pillar with square base, middle square section with niche on each face, and upper section of inverted cone shape (narrow at bottom, wide at ceiling). Around its base entwined dragons/snakes. Small niche on each of S, W and N walls. Similar to 302, although lacking niches on side walls.
303	(as 302?)	Transverse gable on E. with narrative scenes. Flat roof on
419	590s	W in front of single niche on W wall. Similar to 419 but with double niche on W.
417	600-604	Similar to 419.
423	600-606	Square plan with single W wall niche; transverse gable roof
295	581-618	over whole cave (i.e., no horizontal ceiling area). W slope of ceiling depicts Parinirvana; rest decorated with 1000 Buddhas. Square plan, with double W wall niche, rebuilt in 11th
409	581-618	century to include U-shaped dais for sculpture. Transverse gable on W half of ceiling, repainted over original decoration. Square plan with double niche on W wall. Unusual in that
282	613	transverse gable occupies W half of ceiling, with horizontal area on E. Triad of statues on N, S sides of room. Transverse gable on W painted in 1000-buddhas. Statue
332	698	triads on N and S under gable and on E-facing side of central pillar. Other sides of pillar flat. Niche on W. wall with Parinirvana sculpture.
46	ca. 735	A "mini-gable" on far E side of ceiling which otherwise is truncated-pyramid type. Niches on S wall with Parinirvana sculpture, on W wall with standard sculpture group, and on N wall with 7 standing buddhas.

There is a clear pattern of the development of gable-roofed caves at Mogao. In the earliest case, the artistic intent seems to have been to replicate as closely as possible what one might have experienced inside a freestanding temple. The clearest indication of this is to be seen in the presence of molded beams — both those running horizontally and the angled beams of the gable itself. Not only are the beams molded [in some cases it appears that wood was used, not merely stucco imitations — see Fraser 1996b, p. 68], but they often are painted in the same red used to decorate the "que-style" niches found on pillars and outer walls and indicate beam structure even in flat-painted images of architecture. In cave 275, even though the gable is shallow and runs longitundinally, there is a suggestion of a protruding roof with beams, in the center of which is a recessed "well". This clearly echoes the protruding Han gate (que-style) articulation of the niches on the upper walls of that cave [cf. Abe 1989, p. 18n8, where he insists the que-style niches are not a reference to pagoda structure but rather a feature associated specifically with the bodhisattva images in cave 254]. It is worthwhile noting that in the earliest caves with different basic architecture (nos. 268, 272), there likewise was a conscious effort through the use of molded elements to create the illusion of real "lantern" (Laternendecke) ceilings [one example of a non-gable-roofed cave, no. 282, has real beams in the Laternendecke, although apparently they served no architectural function]. In some of the early gabled caves, the paintings between the beams suggest fabric designs that re-create the appearance of the interior of temples where indeed fabric may be stretched between the beams. While it is difficult to establish an exact chronology, by the second half of the sixth century the architects of the caves largely abandon the effort to articulate in sculpture details of architecture [cf., however, Fraser 1996b, p. 67]. Significantly, by this time too, it appears that the practice of placing small niches on the upper outside walls of the caves has ceased as in general has the use of the que-style sculptured niches. In other words, whether or not the cave interior might recall freestanding temple architecture seems to have become less important, for whatever the reason.

The transition moves from sculpted illusion of architectural elements to painted ones and then to the abandonment of any pretense of real structure. This is true not only of the gables but also of the flat western ceilings — by the late sixth century, covering the

whole surface with the 1000-buddha design is one choice. A second choice found at about the same time can be seen first, it seems, in the unusual caves 302 and 303, small caves with pillars representing the inverted cone of Mt. Sumeru. There the gables become panels for complex narrative paintings. This pattern continues in several square caves with a west-wall niche and no pillar but then is abandoned, presumably because alternatives were devised regarding both the nature and the display of narrative scenes. By the early Tang, caves with gable ceilings are less and less frequent. The dated no. 332 is considered to be archaic, since it most closely resembles nos. 427 and 292 from a century earlier [see Huie, 461ff., but she postulates that it might have been "blocked out" during the Sui and completed only a century and more later]. An analogous kind of "architectural anachronism" can be seen in cave 39, built in the High Tang (705-780), with a caisson (not gable) ceiling in front of a pillar that has niches on the four sides. One wonders whether this might not have been a reconstruction of an earlier cave, with re-cutting of the ceiling. Perhaps though the reason for this choice of architecture lies in the large niche across the W wall behind the pillar and containing 27 statues, which presumably would have been viewed by circumambulation of the pillar. Whether we should even count cave 46 in the group of gabled caves might be questioned, for in it the "mini-gable" is almost irrelevant and possibly simply was a device to correct for some miscalculation on the part of the cave's architect.

IV. Pillars in the Mogao Caves

I shall now turn to a second major architectural feature of the early caves, the central pillar, which unlike the gable form, undoubtedly had real cosmological significance. Furthermore, the pillars seem at least in the early years to have been connected with one of the basic forms of worship, circumambulation. Even after caves cease to be built with pillars though, circumambulation undoubtedly continued, in some cases around a central altar platform, itself a structure that deserves closer study.

The evolution of the pillar caves seems to have been as follows. The earliest ones, dating between the mid-5th and first third of the sixth centuries, group in one section of the cliff and include: 257, 260, 254, 251, 263, 265 [see the useful diagram, DMK, I, p. 185]. One can add to this group cave 259, which is a "would-be" pillar cave,

had the space in the cliff allowed it to be fully cut. These were followed in the mid-sixth century by 246 and 248, also in the same section of cliff, and in a newly opened section, 431, 432, 435, and 437. Just below this group and probably from the same period is no. 288, followed in the second half of the century by 428, 442, 290, 302, and 303. There is some disagreement on the dating of 427 and 292, which are either from the 580s (perhaps just before 302) or as much as, say, two decades later. The boom in pillar cave construction seems to have died by the end of the sixth century. Isolated later examples include 332 (dated 698) and 39, both discussed above, and cave 14 and cave 9 (dated 892). Of some significance though is the fact that in re-construction and re-decoration during the Song and Xi Xia periods pillar caves were altered, most notably by the covering of some niches and re-carving of others (for example, caves 263 and 265).

With two significant exceptions, the pillars are located approximately in the middle of the west two-thirds of the cave (where there is a transverse gable, it covers the area on the East in front of the pillars), and are square in shape. Height-width ratios for the pillars vary, one suspects primarily as a reflection of the proportions of the caves in which they are found. So in some cases, the visual impression in a relatively narrow cave may be of considerable height, whereas in other cases, it seems as though the horizontal is emphasized [cf. cave 257, DMK, I, pl. 38; cave 251, ibid., pl. 46; cave 428, Whitfield, pl. 49]. The square pillars are not of uniform width from floor to ceiling, nor are the proportions of the division of their vertical surfaces identical. In most instances, the base is wider than the middle; in many cases there is a slight flaring of the top where it connects to the ceiling (again, cave 251 is a good example). All of the pillars have a mantel or shelf around them whose width and height above the floor varies, possibly depending on considerations of what was to be painted on the dado below and on the vertical face of the mantel itself [cf. cave 288, ibid., pl. 108, and 432, pl. 149]. In a few cases, between the mantel and the ceiling is a distinct flaring of the pillar, in effect creating a ledge at the level of the bottom of the upper niches [notably cave 435, ibid., pl. 66, and 288, pl. 108]. Most pillars have a single east-facing niche, although in two of those mentioned above (427 and 292) the east-facing wall of the pillar is flat and serves as a backdrop to three large standing statues [see esp. the diagram of 427, DMK, II, pp. 228-229]. Except for changes from later reconstruction, the square pillars had niches on their S, W, and N faces. The niche configuration varied, with the earliest caves tending to have upper and lower ones, and in one case two in the lower register.

Apart from the niches, a striking feature of the pillars is the way their surfaces include sculpted (molded) elements, a feature that is to be found in caves of similar date whether or not they have pillars. The sculpted elements may include the frames of niches, projecting mandorlas, engaged columns, serpents, trees, and applique stucco figures of small buddhas, boddhisatvas or devas. In many cases, statues are placed outside the niches on the mantels or ledges, and in a few instances, the statues within the niches project beyond the surface plane of the pillar. This is particularly noticeable with the bodhisattvas in the que-style upper niches, which noticeably lean out or project into the room, an effect that is reinforced where the applique stucco figures also seem to lean forward [cave 257, DMK, I, pl. 39; cave 251, ibid., pl. 47].

The two exceptional forms for the pillars are in caves 302 and 303, where the pillars are placed more squarely in the center of the small spaces rather than offset so far to the west [diagram of 302, DMK, II, pp. 226-227; cave 303, ibid., pl. 13]. In these two caves, the base of the pillar is square, coming up to a mantel, above which is a cube with small niches on the four sides. From the top of the cube to the ceiling is an inverted stepped cone, around each level of which at there had been stucco relief buddhas and around narrow stem of which are entwined dragons or snakes. It is worth noting that cave 305, which adjoins 303, was probably built about the same time. Its form is that of 302, with small niches on the S,W, and N walls, and in the center it has a square altar. What exactly was on that altar originally cannot be established, since the statuary now is Qing. However, clearly the conception of the cave in terms of ritual space was analogous to that of 302 and 303. It is possible that Baker's comment about caves 419 and 420 forming a pair constructed at the same time and symbolizing Sakyamuni and Prabhutaratna [p. 235-6] should be applied as well to 302 (or 305) and 303, built apparently just before 419 and 420.

The origin of the pillar form of cave is to be connected with Buddhist temples elsewhere, although clearly some adjustments have been made. In the most lucid recent treatment of the subject, Puay-Peng Ho sees the pillars as "comparable to the pagoda" of contemporary Chinese monastic architecture, at the same time that it embodies at least some of the function of "image pillars" transmitted from India via Central Asia. [Ho 1992; for a summary specifically in context of a discussion of cave 254, see Whitfield, p. 278]. If the specifically Chinese form for such pagodas (as seen for example in the Yungang caves) is rather different from what we see at Mogao, nonetheless, as Franz has demonstrated, it is easy to identify Central Asian square "niche stupas" from which the architectural form might have been derived. The origins of the form aside, clearly one function of the Mogao pillars is precisely to present to the worshipper entering the cave the image of the Buddha as it would appear in a central worship hall (this quite independently of whether the image is in front of a pillar or not). Hence functionally on one level the pillar caves are no different from those that come to dominate at Mogao in the succeeding period, which have no pillar but have a niche facing the entrance through the west wall.

The most significant point Ho makes in his article is that the Mogao pillars can be likened to "the central pole of the *stupa* that symbolizes the world axis" and thus are "a representation of the axis mundi, the cosmic mountain and the link between the mundane and the supramundane world."[p. 65] This conclusion builds upon the observations of Soper regarding the idea that the upper part of the caves was conceived of as the Dome of Heaven, and upon the analysis by Abe that specifically in Cave 254, one of the earliest pillar caves, one important goal of the architecture and decorative scheme was to represent the Tushita heaven of the Bodhisattva and Buddha of the Future, Maitreya, who is represented in the que-style niches high on the pillar and under the gable on the outer walls. The obvious confirmation of such an interpretation for the pillars comes from their form in caves 302 and 303, which explicitly reproduce the shape of Mt. Sumeru, "the mountain situated at the centre of the Buddhist cosmology, reaching right up to the Trayastrimsa heaven of the Kamadhatu, the cosmic axis that connects the earth and the heavens. The six discs on top may also represent the six heavens of the Kamadhatu", and the snake/dragon sculptures around the stem must be the Nagas depicted in Dunhuang paintings of Sumeru [Ho 1992, p. 68]. If such a literal representation of the cosmic order would seem to be unusual, perhaps it is a reflection of what Jeffrey Meyer has observed, that "the Chinese cosmology may be considered modest and three-dimensional," "focused straighforwardly on this visible world we live in--the demarcations of the heavens above and the earth below." [Meyer, pp. 74, 71]. At the same time though, as we shall see, one could argue for the conception of the totality of any of the Mogao caves being "cosmic space." It seems to me that some of these insights specifically developed regarding the pillar caves can be applied equally to the single niche caves (the best example of how this can been done is in Judy Ho's dissertation on Cave 249) and to the question of the relationship between the two cave types and their iconographic schemes.

Let us examine more closely the iconographic features of the pillar caves which may have a bearing on the "cosmological" interpretation of the structures and also attempt to place the caves in the context of textual and visual evidence about that cosmology. We might begin with cave 254, among the earliest but also the most thoroughly discussed. One of the disputed issues about this cave is the identification of the central Buddha image on the east side of the pillar--is it Maitreya, the Buddha of the Future, as Whitfield and others have argued, or is it Sakyamuni, as Abe argues? For Whitfield, the "whole cave interior" is "a recreation of his [Maitreya's] Buddha world" [p. 278]. A key item of visual evidence for Abe is that the main image is flanked by two ascetics whose conversion is associated with Sakyamuni. If this identification is correct, then to Abe there is a problem in the fact that Sakyamuni imagery dominates the lower part of the cave, and Maitreya imagery the upper, with a significant exception that both upper and lower niches on the W side of the pillar seem to portray Sakyamuni. Abe confesses that it is difficult to make of all this a unified ideological program [Abe1989, pp. 38-40].

The earliest Mogao caves (268, 272, 275) all seem to have Maitreya as the central image. Most relevant for comparison would be 275, which is dominated by a huge statue of Maitreya (portrayed as a Bodhisattva) at the west end, has Maitreya images in questyle niches on the upper side walls, and is at the same time accompanied by murals showing events from Sakyamuni's previous lives (*jataka* tales) and from his youth in this world. [Cf. Shih (p. 61) regarding the main statue: "it could equally be the Buddha as a mahasattva bodhisattva in the Tushita heaven when waiting rebirth in this world."] . Thus there is a coherent combination of iconography pertaining to past, present and future in the life of the Buddha. In a very real sense, given the architecture and the position of the sculpture, the worshipper in cave 275 in its entirety can be understood as being in the presence of Maitreya. As Whitfield (p. 275) suggests, the main image is that of Matreya "presiding over the Ketumati Paradise after his descent to earth," and the Maitreyas in the niches are symbolically located in the palace of the Tushita heaven, which is replicated by the distinctive gabled structure of the cave as a whole. [Note Whitfield, p. 281, argues that cave 263 was originally also a "recreation of Maitreya's Tusita Heaven."] It is worth noting that the identification of the main images in caves 268, 272, and 275 also is strengthened by the accompanying figures on the walls next to them. In cave 272, Whitfield argues [p. 273n7], the figures on the west wall are Devas that the scripture identifies as accompanying Maitreya [DMK, I, pl. 7]. They are shown in various poses, seated or kneeling on lotuses, and gesturing in one way or another in the direction of the central niche. The few flanking figures on the west wall of cave 268, and those behind Maitreya in cave 275 are similar [ibid., pl. 11].

In cave 254 (also in caves 257, 251, 260, 435), among the generally unstudied images on the pillars are small stucco carvings of figures that could be bodhisattvas, but in some of their poses are very reminiscent of the painted devas described above [DMK, I, pls. 26, 38, 46 and 47, 58, 66; cf. for cave 437, pls. 62, 64. For a visually analogous arrangement in regard to such small carved images around the niche, see Yungang cave VI, dated to the period 475-490 — Watson, fig. 210, p. 125.]. In cave 254, these figures extend right down to the manel on either side of the niches. In the other caves they are confined to the upper register, since below them are bodhisattva statues. Arguably they help identify the main image in cave 254 as Maitreya. Even if we do not accept that, where they are confined to the upper register, among other things surrounding the indisputable Maitreya images on the sides of the column, they reinforce the connection of that register with the Tushita heaven.

In general one is struck by the similarities between the iconography of caves 275 and 254, even if the latter has a very different architectural form and is the more complex of the two. It may be that the identification of the central image cannot in fact be resolved to everyone's satisfaction, and it may be too that firm identification would change little in our overall interpretation of the iconography. All we need to do is consider the case of what is arguably another very close analogy to caves 254 and 275, not only in iconographic conception but also in style — namely cave 259. Here we have

protruding niches with Maitreya on the upper registers of the wall and below them niches with Sakyamuni. Yet the central niche on the west wall contains the famous image from the miraculous stupa in Chapter 25 of the Lotus Sutra — that is, Sakyamuni and Prabhutaratna sitting side-by-side. As with caves 275 and 254 then, we can understand an iconography that explicitly allows for visualization of Buddhas of the Past, Present, and Future, although in the case of cave 259 they happen all to be represented in sculpture and the cave clearly is *not* a "Maitreya cave."

If there is a problem then in Abe's analysis of cave 254, it may lie not so much in the question of identifying one or another specific image (even the central one) but rather in his effort, following Higashiyama Kengo, to delineate strictly upper and lower registers in the cave. There are registers, but arguably they are not always hierarchically ordered in spatial terms familiar to us. Furthermore, different levels of being may coexist or somehow overlap. Judy Chungwa Ho has analyzed this problem well in her treatment of another (but related) set of images in Cave 249. On the west ceiling are images of Manjusri and Vimalakirti facing each other and thus "conversing" but separated by a striking image of Mt. Sumeru. Since the mountain cannot literally exist between them, "the only way of reconciling this incongruity is by reading the mountain not as a literal presence on the same spatio-temporal order as the two figures but as an ontologically different existence. In other words the pair of figures forms one pictorial unit, and the mountain another" [Ho 1985, p. 2]. As we have seen, Meyer also reminds us that "while the Chinese cosmology may be considered modest and three-dimensional, the Indian Buddhist cosmology is extravagant and multi-dimensional. In fact there is no single cosmology, but many cosmologies, though all of them are one in their intentionality" [Meyer, p. 74]. With these warnings in mind, let us examine more closely the imagery in the pillar caves.

Indeed we can find abundant imagery that suggests a definite progression from hell or at least this earth up to heaven. Yet at the same time specific features of the iconography provide a bridge between that which is below (at whatever level) and the higher sphere. Some images may seem to coexist in both; the past, present and future may also co-exist. The Buddhist scriptures themselves provide support for such a suggestion. For example, in the chapter of the Avatamsaka Sutra devoted to "Ascent to the Palace of the Tushita Heaven" we read:

Then, by the spiritual power of the Buddha, in each continent Jambu of every world in the ten directions was seen the Buddha sitting under a tree, at each of which were enlightening beings imbued with spiritual power from the Buddha expounding the teaching, each thinking themselves to be always face to face with the Buddha. At that time the Buddha, again by spiritual power, went to the palace adorned by all exquisite jewels in the Tushita heaven of satisfaction and happiness, yet without leaving the foot of the enlightenment tree and the palace of the Suyama heaven on the peak of Mt. Sumeru....Then the king of the Tushita heaven, having set up the throne for the Enlightened One, respectfully greeted the Buddha together with the countless godlings of the Tushita heaven...all the gods and goddesses in the Tushita palace saw the Buddha from afar as though he were right before them...As in this world the king of the Tushita heaven, by the power of the Buddha, eulogized Buddhas of the past...Then the World Honored One sat crosslegged on the jewel treasury lion throne in the hall adorned by all jewels...He was in the same realm as the Buddhas of all times, abiding in omniscience, entering into the same one essence with all the Buddhas...[Cleary, ch. 23]

Presumably a visualization of this passage could enable the believer to see Sakyamuni sitting under a tree preaching, possibly in various poses, in a context where there was imagery pertaining to the previous lives of the Buddha and the Buddhas of the Past, and certainly in a context where one might also be in the presence of Maitreya, who awaited in the Tushita heaven his rebirth as the Buddha of the Future. Could not the image in the main niche of cave 254 at one and the same time be interpreted as either Sakyamuni or Maitreya, or both? Furthermore, as the passage explicitly states, we might imagine the Buddha on the slopes of Mt. Sumeru. The imagery in the pillar caves does vary, but it seems capable of encompassing the Buddhist cosmology suggested by this sutra and others as well.

The most "literal" depiction of the scene in the opening of the above quotation is that in caves 302 and 303. They display a distinct progression from the buddhas (apparently meditating Sakyamuni) in the niches of the cube on the base to the stem of Mount Sumeru, and then to the upper reaches of the mountain which were covered by either "1000 Buddha" images or images of other heavenly beings (unfortunately the stucco appliques have fallen off; most likely the images were the same as the 1000buddhas on the walls, judging from the identity of the painted decoration there as on the pillar). If we really wished to interpret the pillar literally, there are six levels on it, corresponding to the six tiers of the heavens. The fourth is the Tushita heaven over which Maitreya presides. I find somewhat curious Huie's description of these caves, where, as the result of the reduction in the prominence of the niche sculptures by virtue of their small size, she concludes that "it is the pictorial elements which dominate the[se] grottoes" [p. 157]. In fact, what dominates is precisely the three-dimensional articulation of Mt. Sumeru in its several components.

In general terms, this visual ordering of things is not unique to those caves. We find it, for example, in Cave 249 (dating some 60-70 years after cave 254), where the Buddha in the large niche on the west wall is very likely intended as a representation of Sakyamuni, and the mandorla around him extends beyond the niche into the west slope of the caisson ceiling, leading the viewer's eye directly to an image that includes a Mt. Sumeru entwined by Nagas [DMK, II, pl. 249; Ho 1985]. As Ho puts it [p. 91], "this axial mountain plays a pivotal role in the cave decoration, capturing the attention of the entering viewer. Overlapping with the flame-halo, this scene can be read as a vertical emanation from its source, the main icon below." It is very likely that the corresponding image on the west side of cave 285 is to be interpreted the same way, although there the Buddha may well be Maitreya and the representation of the mountain (if it is that) is certainly more schematic [DMK, I, pl. 114, and for a better sense of the perspective, Whitfield, pl. 42]. For a completely orderly hierarchy of the cosmos from hells up to paradise, one can turn to the painted image of the Cosmological Buddha on the south wall of Cave 428, one of the pillar caves, dating about a century after cave 454 [DMK, I, pl. 162; sketch in Howard 1986, p. 35. Note, pace Howard, that image is not unique at Mogao; there is a second one on the south wall of cave 427.] There too we see Mt. Sumeru, encircled by Nagas and supporting the heavenly palaces — all this placed above a hierarchical ordering of the lower world on the body of a Buddha that can be identified as Sakyamuni [Howard 1986].

While we will deal more systematically with the development of niche imagery later, it is worth noting here that some elements of the niches in these early caves may well be intended to stimulate visualization of a Mt. Sumeru on which the Buddha is situated. A number of the niches are framed by a molded border, the upper part of which often represents the body of a double headed snake or dragon, with the heads sculpted on each side somewhere around chest or shoulder level with the Buddha in the niche. Presumably such dragons could have various auspicious connotations. An interesting variant on the typical treatment of them framing the niches is to be found in cave 297 (dating to about the same time as 428). Here the dragons entwine above the niche in a fashion very reminiscent of the entwined Nagas around the stem of Mt. Sumeru and precisely at the point where the mandorla curves onto the ceiling and thus into the heavenly register [DMK, I, pl. 183]. It is thus conceivable that the flanking dragons for many of the niches are a device to associate the niche itself (especially if placed on a pillar) with the cosmic mountain. By extension then the pillar itself, with the dragon heads approximately in the middle, might be associated with Mt. Sumeru.

The division of space on many of the pillars also might help in such a visualization. A good example is cave 435 (mid-6th century) where one can see clearly that the mandorla of the main image, depicting souls being reborn in paradise, is at the same level as the ledge under the upper niche on the side containing Maitreya [DMK, I, pl. 66]. That ledge is created by the wall curving outward from the niche below. The latter's pointed mandorla comes up to just below the ledge and the Maitreya image and thus leads the eye and the mental image from Sakyamuni to Maitreya in the Tushita heaven on the upper reaches of the symbolic mountain. And below the buddha niches are the yaksas holding up the world. Hence there is a definite hierarchy in vertical space, proceeding from the yaksas to the buddha images and on upward to a heavenly or paradisical realm, which nonetheless is located on the pillar itself and need not be presumed merely to lie in the "dome of heaven," somewhere above the ceiling. The top of the main buddha niche itself lies somewhere in paradise. What we have here corresponds very closely to the pillars in caves 302 and 303. That is, the portion of the pillar between the mantel or shelf and the "ledge" corresponds precisely to the "cube" containing the niches on the pillars in caves 302 and 303. That which is above the ledge in cave 435 corresponds to the inverted cone of Mt. Sumeru. In cave 435 the extension of the main image mandorla into the "heavenly" space delimited by the ledge is quite pronounced; in cave 302 (and presumably 303), the mandorlas on all four sides of the cube protrude slightly into that space too.

A slightly different example is that in Cave 288 (mid-6th century). Unlike in cave 435 where the "ledge" is only on the S, W and N faces of the pillar, here it is also to be found on the east face, thus clearly delimiting the whole middle register of the pillar as a separate conceptual and architectural unit. The Mandorla, sculpted out from the wall extends above this ledge and depicts the Buddhas of the Ten Directions arrayed around a half-figure emerging from a lotus. Above this are stucco applique "1000 buddha" figures, matching those painted around the cave on most parts of the wall. At the bottom of the pillar, below the mantel shelf are the usual depictions of yaksas. One notes in this cave too a particularly good example of the way in which the paintings on the outer walls contribute to the illusion of moving up into the heavens, for all around the upper edge of the walls are the heavenly musicians performing in niches above a balcony so depicted as to produce a perfect *trompe l'oeil* effect of three dimensionality when seen from below. This well-documented device is found in numerous other caves, for which it will be of some interest to trace its gradual transformation as concern over optical illusion shifts once we move toward the Tang period.

Examples such as caves 302 and 303 and then 435 and 288, where the east face niche seems to have been consciously confined to the middle register, are a minority among the pillar caves. The more common treatment of the east face of the pillars is for the niche to be higher, probably because the pillar in the first instance is an "image pillar" serving as a backdrop to the images of greatest importance for the worshipper first entering the cave. In some cases (e.g., caves 251, 254, 257), the point of the mandorla touches the edge of the Laternendecke ceiling. Although the neat spatial division of the pillars in caves 302, 303, 435 and 288 thus seems to be violated, in fact there is no real contradiction or confusion of registers. The central image bridges the space between the world below and the heavens represented as the ceiling above. So likewise the image of Sakyamuni on the south side of the pillar connects with the space of the Tushita heaven by virtue of its mandorla touching the bottom of the Maitreya niche above. Seen at an angle from the SE, the two sides of the pillar have mutually reinforcing imagery regarding the unity of the cosmos, and the effect would have been further enhanced by

the fact that the applique devas or bodhisattvas extend on either side of the niches all the way from the mantel to the ceiling. As we shall see in other examples though, the key visual element for the transition between what might otherwise be separate registers (or cosmic levels) is the mandorla. To return to one of Abe's unsolved "problems"--the fact that on the west-facing side of the pillar in cave 254 both the upper and lower niches contain what are apparently Sakyamuni — it may be that this choice was stimulated by the desire to create an analogy with the main niche that would in a sense bridge what otherwise might seem to be a separation between the two registers. That is, we might imagine Sakyamuni both on "this earth" and in some heaven.

Finally, it is worthwhile noting the distinctive treatment of the pillar in the striking, large cave 428. The cave is wide enough so that the pillar has a breadth allowing for rather broad niches, each containing an image of Sakyamuni flanked by Ananda and Kasyapa. Outside toward the corners are bodhisattva statues. The distinctive feature of the decoration is the three-dimensional depiction of very realistic tree trunks and branches, which extend from the shelf up and then spread out to the left and right of the mandorla [DMK, I, pl.160; they are even better preserved on the W face of the pillar]. Here then we might visualize a literal interpretation of the image of the buddha sitting under the tree preaching in the various directions of the world, as mentioned, e.g., in the Avatamsaka sutra. At the same time though, as Howard has shown, the emphasis in this cave is on Sakyamuni, the historical buddha. Thus there are no Maitreya niches, and we would not have reason to visualize specifically the Tushita Heaven, even though the heavenly realms are amply represented in the laternendecke ceiling of the flat part of the roof, the flying apsaras in various places and the imagery on the famous "Cosmological Buddha" painted on the south wall. This last, and the dragon heads framing the niches might, of course, suggest that the central pillar be associated with Mt. Sumeru.

V. Visual effects in the early caves

Before leaving the pillar caves, I wish to comment briefly on the visual devices employed by their artists (and also those of the contemporary group of caves that do not have pillars). How might specific devices have affected what one entering the cave would notice, given the limitations of available light? One can argue that unlike in some of the later caves, much of the essential imagery would have been quite discernable. The main images on the front of the pillars are quite striking as seen through the arch of the entry corridor, even when illuminated with only natural light [e.g., Whitfield, pl. 62 (cave 427)]. In many early caves, not only the pillar ones, the main images are proportinately large and may project into the room--that is, the images are genuinely a part of the three dimensional space of the worshipper. Compared to what we see developing in the late sixth century, niches are generally shallow; in some instances, their central figure even projects beyond the plane of the niche opening. It is common in the pillar caves for statues of bodhisattvas (in at least one case guardian figures) to stand on the ledge outside the niches, thus making the room the continuation of the space within the niche itself.

In a dramatic departure from the norm of having niches on the east face of the pillar, caves 292 and 427 are noteworthy for the fact that much larger than life-sized standing triads depicting a Buddha and two flanking Bodhisattvas face the worshipper as he enters and then are to be found as well to his left and right as he stands under the gabled roof. Cave 427 also had large statues of guardian figures in the anteroom, indicating to the worshipper that he was about to enter the cosmic space that they defended. Although it is but a single large statue (flanked by two lions), in the small space of cave 275 (not a pillar cave) the large Maitreya statue against the west wall would have an equivalent visual impact to the statues in caves 292 and 427 [Whitfield, pl. 9]. We have already noted how the architecture of the Maitreya niches on the upper faces of the side walls in this cave and on both pillars and side walls in others project into the room. The figure of the bodhisattva within those niches seems to lean out into space, physically hovering above the worshipper below. So again, the combined effect would be one of the physical presence of the deities in the same space as the worshipper.

The abundant molded and sculpted elements of these early caves also must be significant for the way they would cast shadows. Shadows would tend to throw them into relief and thus make the sculpted objects seem to project even more into the space of the room than they do [For an analogy in the use of a dark background in painting and the resulting three-dimensional effect, see Baker, p. 164.]. Furthermore, in lamp or candle light, the shadows would move either because of the flickering of the light or because one

carrying the light would move with it. Imagine then the effect of the movement of shadow across the features of the statues, the dragon heads flanking the niches coming alive, the shadow projection of the sculpted mandorla further into space, and the play of light on the small applique figures on the upper facades of many of the niches and (e.g., in cave 428) on the upper walls. While the most important examples seem to be the three-dimensional ones or high relief where there are deeply incised lines, there are also more subtle cases that deserve attention. For example, shallow relief suggests tree branches above the westernmost niche on the south wall of cave 257, and similarly is to be found on the mandorla above the niche containing Sakyamuni and Prahaburatna in cave 259 (perhaps representing honeysuckle vines?). Such examples can be multiplied for later caves (e.g., Late Tang, Song, Xi Xia), where we need to consider to what degree we may be dealing with merely decorative effects or to what degree the relief is a conscious aid in visualization.

Apart from those produced by three dimensional elements, visual effects would have resulted from conscious devices adopted by the painters of two-dimensional images. We have already mentioned the *trompe l'oeil* effects suggesting a three dimensional balcony containing heavenly musicians. Abe notes how, even in dim light, the conscious variation in the coloring of the thousand buddha patterns results in "a flickering, animated effect" [Abe 1989, p. 29]. And these patterns can suggest that light was emanating from the statues themselves [Whitfield, p. 281]. Much is made in the buddhist scriptures regarding the light emanating from the Buddha into all the space around him. In a cave such as 427, the diagonal patterns produced by the alternation of light and dark in the thousand buddha pattern produces just such an impression [Whitfield, pls. 63, 64]. The deliberate choice of an intense, relatively dark background for many of the caves with the thousand buddha pattern has the effect of making the highlighted images stand out, in a fashion analogous to that produced by the shadows behind a three-dimensional image.

A very important question that has been much discussed is whether more complex imagery painted in the caves would have been visible. Here we need to consider not only complexity but size and location of the images and choices regarding their color schemes. In the early caves, many of the most essential images (e.g., preaching scenes) are large and relatively simple. For example, it was not uncommon for the north and south walls under the gable roofs to contain such scenes [e.g, cave 248; DMK, I, pl. 84]. Even narratives such as jatakas often were distilled into what were in effect iconic representations, where only some essential elements of the tale were to be shown on a relatively large scale and at a level where a person with a lamp easily could have discerned them [e.g., cave 275, the Sivi-jataka; or cave 254 both that and the famous tiger scene from the Mahasattva-jataka; DMK, I, pls. 12, 36, 37]. Often there would be a horizontal sequence of iconic images, low on the wall, which could be followed if one circumambulated the pillar [for a discussion, see Shih]. In one instance (cave 427), the vertical surface of the mantel around the S, W, and N sides pillar, at about chest level, was devoted to the narrative about prince Sudhana.

The bold lines of the painting style in the early caves and the artists' use of color must have contributed substantially to the ability of a worshipper to recognize a scene even in relatively dim light. Light colors frequently are found as the background in the spaces between the gable rafters or highlight the shape of the Laternendecke designs [e.g., cave 251, DMK, I, pls. 46, 47; cave 288, ibid., pl. 109]. Some of the most impressive early examples of complex depictions of the heavens [e.g., caves 249, 285; Whitfield, pls. 23, 42] have the brightly colored figures moving across large expanses of pale background. Even if details might not have been visible, silhouettes likely were.

For comparison, we might bear in mind that the outline or silhouette of individual images in Orthodox Christian icons often were the main basis for the worshipper to recognize them, since there were the same kinds of limitations obscuring detail which prevailed in the conditions at the Mogao caves [their skill in rendering the silhouettes is often cited in discussions of the Muscovite painters Andrei Rublev and Dionisii.]. Unanticipated darkening of images prevailed in both cases. In the Orthodox churches, accumulated grime or smoke from candles eventually would mean that the entire surface of the frescoes might be re-painted; the lacquer used on icons darkened over time, thus obscuring any detail of a saint's features. At Mogao, the skin of many of the figures in the paintings has darkened because of changes in the pigment. Just as many of the images originally were substantially brighter, so also would the interior of the cave have been brighter as a result. Even in dark conditions though, selective use of white

highlights in faces, decoration of mandorlas, or in outlines of garments would have enabled a viewer to identify figure types [e.g., cave 435; DMK, I, pl. 69].

Where narrative scenes become increasingly complex, we begin to see developments that presumably made them less and less accessible to a viewer. In cave 285, the narrative concerning the 500 robbers on the south wall probably could have been deciphered, because of its placement on the wall and because of the light background highlighting the figures [Whitfield, pl. 35]. One cannot be so sure about the narrative depictions up on the gable of the relatively small cave 303, where despite the light background, the space is crowded with detail and the repetitive elements of architecture and trees might blur into something indistinguishable for its content [DMK, II, pls. 15, 16]. When we get to the somber coloring and crowded landscapes of cave 419, the images on the gable slopes surely would have been indecipherable, possibly even to a very practiced eye [DMK, II, pl. 85]. Perhaps that is one reason the painting of such scenes on ceilings ceases soon afterwards.

In noting these developments, I have not forgotten Wu Hung's admonitions regarding the care with which we should apply "response theory" to such imagery [lecture, July 8, 1998]. In fact, whether or not an image could have been seen or deciphered in detail may not have been important. Their mere presence may indeed at times have been what was significant, and the way in which they were conceived artistically may well have reflected painters' priorities, not any conviction that the worshipper in the cave should have seen and understood the product. Nonetheless, what I think we can see here is the possibility that the understanding of three dimensional space in the caves and the interaction between viewer and imagery was beginning to change by the late sixth century. We might argue that prior to that period, much of what we see in the caves was created with distinct visual effects in mind and a feeling that the viewer should react to the visual stimuli. It was important that the images seem to be real, and that the viewer see and understand all of them and feel himself to be in the same space with them. The architecture and its decoration reinforced a feeling of real, threedimensional space, especially in the pillar caves, where there was, among other things, a dramatic literal replication of the cosmos at the center of which was Mt. Sumeru connecting heaven and earth. In other words, there is much that is "iconic" in the early caves and seems to invite viewer response, alongside much that is narrative and arguably does not. Perhaps what brings the two together is a perception of the caves as "cosmic space." While in the most general terms, such a perception arguably continued unbroken in the Sui or early Tang periods, the way in which that sense sense of space was projected changed. It may seem ironic, since we tend to talk about Tang "naturalism," development of perspective and realistic landscapes, and so on, but one might argue that from the standpoint of the art in the caves, the Tang put more distance between the worshipper and the images, and therefore the worshipper and the cosmic realms, rather than bringing him into closer contact with them.

The move away from such narrative scenes has been explained in part with reference to changing Buddhist belief and practice, as Mahayana Buddhism strengthens its hold and increasingly the emphasis comes to be placed on visualizing rebirth in paradise [Whitfield, p. 299]. Thus jataka scenes, which are so prominent in the narrative paintings of the early caves, cease to be of interest. Yet it is clear that there is a period of transition and overlap, where both jataka scenes and narratives from the Lotus Sutra can be found on the cave ceilings (e.g., cave 303); clearly the emphasis on the message of the Lotus Sutra forms a connecting bridge to the later caves [on its importance in the "transitional period" cave 427, see Whitfield, p. 294]. Similarly, the development of complex paradise representations includes, among others, the paradise of Maitreya; thus it is not surprising that the earlier iconography of Maitreya continues in interesting ways. In his analysis of the early Tang Paradise representations, Wu Hung writes about the "new pictorial formula that appeared at Dunhuang during the Tang dyansty," a complex one involving "iconic" as well as what we might term "an-iconic" representations [Wu 1992a, p. 54]. In caves such as 172, central images of paradise relied "on the existence of a viewer or worshipper *outside* the picture," at the same time that "narrative" side scenes might be connected with sutra lectures and visualization. An analysis of the way in which the artists' visual techniques for representing cosmic space in the caves evolved should extend such observations and at the same time provide some interesting material that can help us to understand continuties between the art of one period and another.

VI. Caves with rectangular plan and west wall niches

Here I wish to explore various topics connected with the caves that numerically dominate at Mogao and span the entire life of cave construction at the site. I shall pay particular attention to the treatment of the imagery on the west walls. The worshippers' attention focussed in the first instance there, where the niches served as altars and contained the central figures. Several issues regarding the niches merit our attention. For one thing, their architecture changes, with the result being possibly a change in the connection between niche space and the space in the main room of the cave. Another question concerns the relationship between sculpture within the niches and painted imagery on their walls and ceiling. An important aspect of this subject is the question of the degree to which wall and ceiling provided the illusion of extending the three-dimensional space of the niche. Finally, we need to consider the relationship between what is in the niche and that which immediately adjoins it on the west wall and west slope of the ceiling in the main part of the cave.

In undertaking this discussion, it is necessary to keep in mind the opinions that seem firmly established in the literature regarding the transition between the pillar caves and the single niche caves as they appear by the early Tang. While much of what I say builds upon the existing discussion, my approach may require some re-thinking about issues of continuity and change. I would argue that the existing scholarship does not deal adequately with the transitions involving two- and three-dimensional space.

Janet Baker's dissertation is the most systematic effort to explore this critical period of transition. She emphasizes the change in painting from the early Sui to the early Tang as one in which the "register format" (as exemplified in, e.g., the jataka scenes in the earlier caves) gives way to a "unified format." "This paralleled changes in the Buddhist concepts of time and space and the new emphasis on the unity of the One Vehicle of salvation...By the close of the Sui, the purpose of the wall paintings had become an entirely iconic one, emphasizing the otherworldly pleasures of the paradise realms," and corresponding to a shift in ritual practice that emphasized only meditation and visualization [Baker, pp. 265-266; cf. also Whitfield, p. 292, on the efforts in this period to unify Buddhist belief]. She does not confine herself to the painting, but looks at

sculpture and architecture; in her argument the new treatment of the niches themselves is part of the trend toward iconic imagery.

One can agree with most of this, which she bases on Wu Hung's earlier work regarding the emergence of iconic forms in Chinese Buddhist art [Baker, 203ff.] but which she might well have modified in light of his more recent analysis. Clearly the pre-Sui caves very much involve the viewer interacting with iconic images within the context of the three-dimensional space. On the other hand, as I hope to demonstrate, what emerges in the late Sui and early Tang in terms of spatial relationships of the imagery is not necessarily a situation in which viewer interaction is enhanced. On the contrary, I would argue that one of the trends in this period (and the one most people pay most attention to) might be construed as having the opposite effect. If we recognize that, we may in fact have a way to integrate into the picture of change the "exceptions" such as caves 427, 282 and then the later 332, and we may further be able to explain how the development of the new cave formats in the late Tang (notably the ones with central U-shaped shaped altars and architectural screens) is a logical development and response to the problem of the way the viewer interacts with the images.

I think what emerges from all this is a somewhat contradictory picture of the way in which caves presented an image of cosmic space. That is, on the one hand, in certain examples, there seems to have been a conscious effort to unify the space within the cave as a whole. But in other cases, visual effects in the caves seem to have erected barriers between worshipper and image and obstacles to visualization by the worshipper of his actual participation in the space occupied by the images. This does not mean that those images are not to be understood as "iconic," but rather that the nature of the viewer's response may have undergone a certain change. Whether that then meant that the viewer was less able to visualize himself in cosmic space in general or paradises more particularly is another matter. To me the interesting thing is that in later caves of a different design, there seems to have been a conscious effort to return to a situation where the worshipper could genuinely feel he or she was part of the larger cosmos inhabited by the sacred figures and might in fact share space with them in paradise.

To start, let me summarize some of the basic architectural features of this group of caves and indicate how they changed over time [cf. Baker, 216-217, for a more narrowly focussed summary]. The earliest example at Mogao is cave 272 (ca. 420 CE). It is a modest structure with a niche cut in a distinctive way so that it has its own rounded dome over the Buddha image [Whitfield, pp. 272-274, provides a good summary]. The ceiling of the main part of the cave is only slightly arched, with the slopes leading to a molded Laternendecke square in the center. This cave is one of the best examples to illustrate Soper's arguments about the understanding of the ceilings as representing the "Dome of Heaven." Moreover, the distinct shape of the niche recalls the probably Central Asian influences from a place such as Kizil. There is little here to suggest an impact of temple architecture from metropolitan China.

A further stage in the development of this plan can be seen in cave 249 (ca. 535-545) [here too, Whitfield, p. 283; for full details, Ho 1985]. The niche now is proportionately larger, lacking an articulated architectural "dome" but narrow at the top than the bottom and with curved corners of the walls and ceiling. The niche has a projecting border around it and a sculpted mandorla that projects into the ceiling space. Since the niche is shallow, the central buddha figure is seated with his feet on a stool projected into the room on a ledge; he is flanked on the W end of the N and S walls by standing bodhisattvas on lotus pedestals. The relatively flat ceiling of cave 272 has given way to a higher truncated pyramid or caisson ceiling at the center of which is a recessed square painted in the Laternendecke motif. A similar treatment of the main niche and ceiling can be seen in Cave 285, of approximately the same date, although there the basic architecture belongs to a different type, since the cave contains meditation niches along the side walls and additional small niches flanking the main one on the West wall [diagram, DMK, I, p. 225]. Among the other early caves, 438, 296, 297, 301, 304 (all Northern Zhou or early Sui — that is second half of the 6th century) represent variations of what we see in cave 249, where the degree to which the main image actually projects into the main cave space may vary, and the flanking bodhisattvas are placed not on the N and S walls but on the W wall. The other change we note is in the decorative treatment of the ceiling, where the Laternendecke motif is gradually being obscured by decorative detail and surrounded by what might be construed as the fringe or tassels from a canopy [see Baker, p. 131, analyzing this phenomenon for cave 305; for the ceiling, DMK, II, pl. 22].

Although both caves are of the gable-roof type, nos. 419 and 423 (both Sui period) might be seen as representing a transitional form with regard to the treatment of the west wall. The niches are still large, they have projecting molded frames and mandorlas but the bodhisattva statues have been moved from outside in the room into the niches themselves. To accommodate this, the niches have been cut more deeply and thus the main image no longer projects into the space of the room [DMK, II, pls. 79, 36].

A logical further development of these changes can be seen in the development of double niches. Among the earliest examples is in cave 302, where, however, the niches are small and the cave is still dominated by the central pillar. Cave 420 (590s) is an early example of the square-plan cave with a large, deep double niche on the west wall containing a five figure group (a buddha, two disciples and facing inward on left and right, two bodhisattvas); the outer niche has a pair of inward facing bodhisattvas [DMK, II, pl. 61]. (Cave 420 also has side niches, as does cave 302.) While the inner niche still is framed by molded elements, the outer frame now has a two-dimensional pearl pattern that suggests visually a distinct separation between the three dimensional double niche and the two dimensional wall around. Baker argues that the "two-step niches" add "a further sense of depth and an optical fusion of the two- and three-dimensional elements of the west wall... In either case, the single niche becomes the centerpiece and theatrical 'stage' of the cave, around which the painted elements are integrated within the cave" [p. 217]. On the contrary, one might better suggest that both with the main and side niches in this cave, the visual impression is not of the sculptured figures sharing the space of the main room but rather of their being compartmentalized in their own space This effect is particularly striking if we compare 420 with cave 419, arguably constructed at the same time. The inner niche in 420 in most ways (including its molded frame) is strikingly similar to the single niche of cave 419. However, the mandorla of the latter connects it directly into the ceiling space in the fashion typical of the earlier single-niche caves. In other words, one could say 419 looks back (its gable-roof architecture supports such an idea too), but 420 looks ahead to what seems to become the norm. Perhaps emblematic of the change is the difference in the Buddha thrones in the niche, where in cave 420 we see what Whitfield describes as a "stepped Mt. Sumeru throne" (p. 295), its wider, flat top projecting beyond the Buddha's robes. In cave 419, while the throne might also be taken as emblematic of Mt. Sumeru, the robes cover the top; we see clearly only the stepped base. One might argue that in cave 420 the mountain is now contained wholly within the niche. As we shall see, analysis of the paintings in the two caves may help to explain why the consciously chosen difference in the way they treat the west wall and its niche.

Cave 390 [DMK, II, p. 162] is analogous to cave 420, among other things in having a buddha throne of the "Mt. Sumeru type" [Whitfield, p. 299]. Cave 390 lacks the side niches found in 420 and further differs from it by the arch of the niche being cut high enough so as to enter the visual space that connects with the ceiling. The breadth of the niche tends to counteract the effects of its depth. Unlike in cave 420, the walls here are decorated with orderly hierarchical rows (wider in the bottom register than in the top) with preaching scenes. Whitfield argues that the net effect is to transform "the whole cave interior into a paradisiacal world" (p. 299), although if that is the case, the visual effects used to achieve it are certainly very different from those we saw in the caves of a generation and more earlier. Perhaps the emphasis in the Sui period is really in a different direction, as another double-niche Sui cave, no. 401, might suggest. Its outer niche has been enlarged to accommodate a second pair of bodhisattvas, thus setting the main buddha figure even more deeply away from the main chamber [DMK, II, pl. 139].

As is increasingly common in the Sui caves, the central panels in the ceilings of nos. 390 and 401 no longer have the Laternendecke design, its having been replaced with a lotus surrounded in one case by vines and in the other by flying apsaras [for 401, DMK, II, pl. 143]. One might even argue that the ceiling space both literally and conceptually becomes less significant in this period, not only because of the movement away from illusionistic representation that might suggest the heaven but also because the line of demarcation between ceiling space and that which is below it becomes more rigid [see Baker, esp. pp. 126-127]. Niches no longer connect directly with the ceilings. They come to be treated more as panels set into the walls where the extension of visual space is horizontal rather than vertical. As this happens, however, the artists in the caves begin to devise ways further to extend the visual space horizontally and eventually to reconfigure the niches so that at least within them the illusion of heaven is emphasized. An inseparable development, I think, is the appearance of complicated paradise paintings in the early Tang, where, just as in the niches, one can argue that cosmic space was being

presented within a frame, confined to one area in the cave, and often not construed as part of the three dimensional whole. I shall attempt to develop these ideas in what follows.

One of the new developments by the early Tang period is to include among the sculpted figures in the niche guardian warrior figures. Of course they had long existed in the Buddhist cosmography (they were understood to reside on the slopes of Mt. Sumeru), and they had been represented in the sculpture of the early caves. A logical configuration is that which we find in Cave 427, where the guardians perform their duty in the antechamber [cf. Baker's extended discussion of this cave, pp.166-173, which only partially grapples with the significance of the antechamber images]. This was the common location for them in later centuries too, either in sculpted form (for example, caves, 130, 148) or in the very numerous antechamber paintings dating from the period of Song and Xi Xia restoration of many caves. Rarely (if at all) did they appear grouped with the main buddhist icons. [In two cases, caves 257 and 435, it is not clear to me whether the standing figures to the right of the main niche were originally warrior guardians--some of the garb is all too similar to that of the bodhisattvas; possibly later restoration altered the heads; see DMK, I, pls. 38, 66]. Thus when we come to an example such as cave 322 (630s), the substitution of a guardian warrior for the second bodhisattva at the outer edge of the niche must be seen as significant [DMK, III, pl. 16]. One way of looking at this is to see the artists compressing the cosmic space into the niche. That is, instead of the guardians protecting the corners of a cosmos which includes the main chamber of the cave itself, they are now protecting a cosmos whose space is the niche and that which might be conceived as extending beyond it not in the direction of the space of the main chamber but rather beyond the walls and ceiling of the niche. In a sense then, this would seem to be a logical further extension of the developments we observed in the Sui, where the west wall images "withdrew" into the niche.

Another way of describing what is going on here is to draw an analogy between the "inverted" perspective of Orthodox Christian art and the "normal" perspective that develops during the Renaissance in Western Europe. Inverted perspective employs visual devices intended to prevent the eye of the beholder from imagining three dimensional space in two dimensional representations. That is, picture space moves from the surface of the images into the space in front of them, a concept fully in keeping with the the ways in which middle Byzantine artists attempted to reconcile the canons of two-dimensionality with the architectural (and hence cosmic) space within a church. In the case of the early Buddhist art at Dunhuang, we see on the one hand illusionistic devices intended to extend picture space upward and beyond the confines of the walls. Yet simultaneously the sculpture is treated as an extension from the "walls" into the cave itself. My sense is that in some important ways this second conceptualization of space was being abandoned beginning in the late sixth century in favor of the first approach, which, of course, coincides with the development of landscape and perspective in Tang painting. As we shall see though, the Tang artists may have become conscious of what was happening and experimented with ways to re-connect the cosmos of the worshipper with that of the buddhist holy figures.

One way of achieving this was to enlarge the niche. In the case of cave 329, the niche was broadened so that it occupied virtually the whole of the West wall, allowing it then to accommodate comfortable a seven figure group that included two seated and two standing bodhisattvas [DMK, III, pl. 43]. Although this is not an architectural feature, the painting here also seems consciously to have reinforced what we might call the "reintegration" of the niche with the larger space, since there is a clear visual connection between the images on the lower west wall flanking the niche, the ceiling and upper wall of the niche itself and the band containing the flying apsaras just below the central panel of the caisson ceiling. The curvature of the upper part of the niche, at least from a perspective of the height of the Buddha image's pedestal, seems to focus outward into the space of the cave as a whole. Finally we note in cave 329, as even more prominently in cave 57 [DMK, III, pl. 8], the color patterns of the thousand-buddha motif on the slopes of the ceiling create a pyamidal effect leading the eye of the viewer upwards to the ceiling center. As far as the openness of the niche to the room is concerned, Cave 66 has an even more striking visual device in that the outer edge of the niche is angled or flared, thus smoothing the transition between the niche and the wall [DMK, III, pl. 165]. This is quite in contrast to the effect produced in caves where the walls of the niche move back pretty much perpendicular to the west wall. Cave 66 also seems to have had statues on the projecting ledge across the whole length of the wall.

Another way of dealing with the configuration of the niches and their statuary vis- \hat{a} -vis the main space was to extend the statues beyond the plane of the west wall and/or to add others outside the niche — in other words to return to the practices of the pre-Sui and early Sui periods. The guardian figures at the outer edge of the niche often extend their elbows beyond the plane of the wall [e.g., cave 45; DMK, III, pl. 124; Whitfield, pls. 103, 104]. As we have noted in the case of cave 66, some caves have an altar shelf which is an extension of the floor of the niche all the way across the west side of the cave. The reason for this can be seen in cave 331 (670s) and others, since the extended shelf then accomodates sculpture in the main space of the cave, in the given instance a pair of guardian figures [DMK, III, pl. 73]. In analogous fashion, rather than extend an altar shelf, the architects commonly placed pedestals at the corners on the west side of the main chamber of the cave. Unfortunately we cannot always know what occupied them (in some cases lions?) — those in caves 220 (642) [plan, Whitfield, p. 303] and 217 (710-720) are among the many which are empty. One of the most beautiful of the Tang caves, no. 328 (latter half of the 680s) has kneeling bodhisattvas on those pedestals (thus, a nine-figure sculpture group consisting of the buddha, his two disciples and six bodhisattvas) [DMK, III, pl. 111].

A very different approach to opening the niche space is in cave 46 [DMK, III, pl. 147]. There a step has been cut in the floor of the niche on the west wall (can one assume this is an original feature of the architecture?), thus giving the visual impression of a raised, U-shaped shaped dais for the seven figure sculpture group and making it more "accessible" to the worshipper. We will discuss more systematically later the evolution of the U-shaped altars. Here it is worth noting Huie's comments though, regarding cave 335, which she indicates is the earliest example of their use in a single niche cave. She argues their effect is to transform the niche from a "stage" for icons into "an architectural reality, a three-dimensional space into which the viewer can penetrate or participate. In this way the clear separation of worshipper and the object worshipped is denied; the viewer can actually step into the center of the area surrounded or enclosed by the U-shaped platform and in that manner he becomes the eighth member of the assembly" [Huie, 375-6]. I am not so sure this observation applies accurately to a cave such as 335. On the contrary, one might argue that the effect of U-shaped altars within niches is just

the opposite — that is to elevate the "icons" even further away from the viewer. Cave 46 counters this effect precisely because of the lower "step" in front, which invites access even though it seems unlikely that worshippers physically climbed it to approach closer to the images. Huie's observation is very perceptive though if applied to the later caves with the central, free-standing U-shaped altars.

The innovations of cave 46 did not stop with its treatment of the west wall, for it has wide niches occupying most of each the north and south walls (in one, a Nirvana Buddha statue, in the other, seven standing Buddhas) and also seems to have had sculpture in the corners at the west side of the main room [DMK, III, p. 163, fig. 3a]. Although such examples are rare, cave 225 similarly had large side niches, occupying even more of the walls than the ones in cave 46 [ibid., fig. 3b].

If opening the niche space was one tendency during the Tang period, conversely many caves seem to move even farther in the opposite direction of creating space that is almost self-contained. If we can talk of a "progression" here architecturally, it seems to be toward simple niches whose proportions may be generally small, compared to the wall space around and have essentially a rectangular shape with at best minimal angling or curving at the back or upper sides. The roofs of such caves can be close to the horizontal. When seen straight on, such niches can seem very "boxy" and their ceilings may be almost invisible, but to a worshipper right at the edge of the altar looking up (especially from a kneeling position), the niche "expands" and the full visual effect of the ceiling *vis*- \hat{a} -*vis* the sculpture can be appreciated [compare, Whitfield plate 100 for Cave 45 with his plate 111 for cave 328 to get a sense of this].

This "boxiness" of the niches seems to culminate in a series of caves during the Tang (beginning in the second half of the 8th century) where an architectural innovation was adopted that seems consciously to have further emphasized the separateness of the niches — that is, instead of a flat or flaring ceiling in the niches, we see a truncated pyramid or caisson ceiling. The effect of this device is to create what resembles a proscenium arch on a stage, with a recessed flat roof and sloped sides coming down to the walls on three sides and the proscenium in front. As Whitfield puts it, "the main niche is now treated as if it were a separate small chamber, with a truncated pyramidal ceiling like that of the main chamber" [p. 318; note, however, that his first example of

this is cave 159, which in fact is not the earliest case]. It is possible that one step in this direction is the north and south wall niches in cave 148 (dated 776), which have the sloping sides but not the proscenium in front. Examples of the full development of such niche ceilings, with the proscenium, are in caves 194 (760s), 113 (High Tang), 39(High Tang pillar cave, where niche ceiling echoes that of main chamber in front), 159 (820-830), 231 (839), 237 (probably close to date of 231), 112, 197 and 361 (all three Middle Tang), 107 (871), 449 (970), 14 and 9 (both late Tang pillar caves), and finally the eleventh-century recut niches in pillar caves 263 and 265.

In trying to explain this development, we might first look for some earlier model at Mogao. About the only one which comes to mind is the very early cave 272, where the niche has its own dome. The comparison stops there though, since cave 272 has various devices to integrate the niche with the main part of the cave, whereas in the Tang examples, the visual impact is separation. It is possible that the architects wished merely to replicate in the niches the architecture of the ceilings of the main chamber, although it made no sense to try to cut the niche ceilings too deeply if they were to have decoration that would be visible. A related architectural consideration is that in many of the re-cut corridors beginning in the late Tang, the transition from wall to ceiling is on an angled slope analogous to those in these new style niches. Obviously there was a taste for that, but which came first is hard to determine.

Possibly the explanation is to be connected with the painted iconography of the niches (to be explored below), where heavenly space previously rendered by painted illusion on a flat ceiling now is given three-dimensional architectural form. The problem with this idea though is that the ceilings themselves in the new-style caves generally show only a lotus-in-grid pattern. What may have been important was not so much the ceiling of the niche but the slopes, where commonly we find depictions of auspicious images angled so that those on the east slope of the niche would face directly the buddha below and those on the west slope would be perpendicular to the gaze of a worshipper located right in front of the altar and gazing up into the niche. It is worth noting in this regard that the corridors with similarly angled wall-ceiling junctures in some instances display exactly the same icons and the slopes of the niche ceilings. To what extent the new configuration of the niche was conceived with the response of the viewer in mind

might be questioned though, since some of the most interesting of the auspicious images in this space were concealed in corners or too small to be readily seen. A further iconographic development that may be connected with the reconfiguration of the niches is the tendency to decorate their back walls with painted "screens" or panels containing small images that may not appear to have any direct connection with the sculpture [Whitfield in fact notes how this contributes to "a much greater feeling of detachment in the figures" (p. 318)]. Such screens fitted best in rectangular spaces. However that fact would not explain the indentation of the ceilings.

The visual impression of these late Tang niches can be seen, for example, in one of the earliest (cave 113), where the presence of oversized guardian figures outside the niche and in the corners of the west wall has the effect of emphasizing the compartmentalization of the niche itself. This is very different from the impression produced by the Tang caves where the niches widen and the sculpture then enters the main space of the cave. Perhaps the best way to sense the impact of this change is to look at the instances where such niches were carved into square pillars and then compare those caves with the early pillar caves and their niches [the caves in question are 14, 39 and the re-cut 263 and 265; see DMK, III, p. 163, fig. 2, for cave 39]. There is a sense of the niches being isolated, almost puppet-show boxes, drawing in the gaze of the viewer but in no way interacting with him or taking advantage of the three-dimensional configuration of the larger cave space where the very presence of the pillar would seem to invite involvement outward into the room and in the space around. Possibly for this reason, the architects of the major caves beginning in the late Tang period began to develop a very different model, one which once again emphasized the unity of the cosmic space and involved the worshipper in its midst.

Before I move on to integrate the painting with the west wall niches of these caves, I should note that there are some architectural exceptions in the period of the transition from the Sui to the Tang — notably caves 427, 332, 39, 12 and 14, all pillar caves; 282 which has neither niche nor pillar. Cave 427, discussed earlier, may have been cut well before it was decorated; it has the standard form of the early transverse gable pillar caves but *sans* an east-facing niche. Cave 332 has a truncated pyramid ceiling in front of the pillar and a niche along the west wall with a Parinirvana sculpture.

All three of caves 427, 332 and 282 contain large standing statues facing the entrance and flanking the main chamber on the north and south walls. As we shall see, 282 may well be quite significant as a precursor for the evolution of the later Mogao caves with free-stand U-shaped altars. Caves 39, 12 and 14 are rare pillar caves that seem to have been cut quite late and with the deep rectangular niches on the east-facing side as described above. It is possible that the designers of the later caves with U-shaped, freestanding altars and altar screens, were striving consciously to achieve the visual effect of the pillar caves with free-standing sculpture, and to avoid the effect created by the late pillar caves with the deep niches.

VII. Creating an illusion of three-dimensionality

To treat some of the issues discussed in the previous section without a systematic exploration of painting is quite artificial. Now that we have an idea of the specifically architectural (and, to a lesser degree sculptural) patterns in the "single niche" caves, it is time to go back and examine how their designers began to explore in new ways the potential of painting for creating spatial illusion. This discussion is particularly relevant for helping us to understand the treatment of the west wall imagery and space.

It is not as though pre-Tang painters paid no attention to the potential for developing perspective. The best example of their obvious skill can be seen in the *tromp l'oeil* effects they could achieve in representing the balconies of the heavenly musicians. While the very earliest attempts (notably the ceiling of cave 272) might be deemed less than successful, where the balcony with the musicians is on a nearly horizontal surface and the visual devices simply are inadequate to compensate for that, already by the time of cave 254, the artists' technique and placement of the images right at the top of the walls is quite effective in building an impression of the structure's opening up into a much larger space above. A further development of the device can be seen in Cave 249, where above the niches, on the ceiling slope itself are mountains and trees, creating the distinct impression for the viewer that the space opens up through a landscape intended perhaps to represent the encircling mountains of buddhist cosmography and into the heavenly space. The illusion created by the painting in fact erases the visual effect of the architectural "boundary." Ho emphasizes the sense of "upward motion" of the whole

ensemble, leading to a symbolic skylight at the top which is a "passage into another realm of experience" [Ho 1985]. In the given instance, the painting reinforces the impression produced by the three-dimensional extension of the mandorla of the niche into the heavenly space of the ceiling. As we move into the second half of the sixth century, the conventions regarding the transition "between earth and heaven" change [see the comments by Baker, pp. 126-127, which correspond to what follows here]. The balconies are still there, often above a decorative border with "curtain swags" below it, but the balconies no longer seem to be functional architecture, because they no longer contain musicians (see, e.g., caves 290 — a very early example — 299, 304) Instead, apsaras fly above them and may themselves be contained within a space delimited simply by a painted frame. The effect is more of a border rather than a transitional zone; the representation of heaven is symbolic but somehow distinctly separated from the viewer below.

An analogous kind of development can be seen in the ways the artists treat the central ceiling panel [see Baker, pp. 131, 141]. As the Laternendecke motif, which recalls real architectural space, evolves and disappears in increasingly decorative designs, there is a development of zig-zag and tasselled borders suggesting a canopy. Examples such as those in cave 285 or 305 create reasonably successful illusions because they have long tassels descending from the corners of the canopies toward the walls. Yet there is increasingly a trend toward producing decorative panels, symbolic of canopies but suggesting little of their reality. Commonly surrounded by the thousand buddha motif rather than an open expanse of sky, at least to the modern eye the ceiling panels appear as mere decoration even where they contain some suggestion of sky in their coloring and include flying apsaras as part of their decorative schemes. In many instances, the Sui and early Tang artists reinforced such tendencies to move away from recognizable "heavens" in the ceilings, because of their extensive use of pearl borders, dividing wall space, dividing the walls from the ceilings, and dividing the ceilings themselves (e.g., caves 401, 390).

In some ways early wall paintings in the caves seem curiously out of sync with what we see in the decorative balconies. The early jataka narratives, for example, provide little sense of perspective — the proportions of the figures, and their position in the surrounding space as defined by architecture, trees, or mountains often conveys little sense of three-dimensionality. Over time though, especially in the ceiling depictions of such scenes from the 6th century, we can see the development of devices leading clearly in the direction of the "naturalism" of the Tang [see Baker, passim, for a careful analysis of these trends]. For our purposes here, it is of particular interest to examine such developments with regard to the "iconic" images of preaching or meditating buddhas or bodhisattvas and their attendants. As Baker discusses at various points, during the Sui there are interesting developments in the interrelationship between the painted imagery in and around the niches on the one hand, and the niche space and its statuary on the other. The illusionism of the painting extends the three-dimensionality of the niches. Her analysis is relatively narrowly focussed though and really needs to be extended thematically and chronologically if we are to understand fully what is happening on the west walls of the caves.

To sense the significance of the changes in the late sixth century, even if it is difficult to establish a chronology for all the details, we might first go back to the very early niche cave 272. There the west wall does display an integrated iconography--the figure of Maitreya in his domed niche is nonetheless part of the same architectural space as the main room, by virtue of the fact that the niche is cut up into the slope of the ceiling and once had a mandorla that extended into the balcony with the heavenly musicians. Furthermore, surrounding Maitreya on the walls are the devas considered to accompany him, gesturing in his direction, and their gestures are repeated by those of the bodhisattvas and other worshiping figures inside the niche and separated from it by only the narrowest of borders. The devas and bodhisattvas are quite schematically drawn, substantially smaller than the large central sculpture and arranged one above the other rather than in overlapping ranks. By and large this kind of pattern, at least as far as the niches are concerned, continues well into the next century. Cave 249 does include an orderly array of disciples and bodhisattvas in the niche, but they are small and painted one on top of the other. If any of the accompanying figures are raised to essentially equal prominence with the main image (at least in their size), it is the sculpted bodhisattvas. At the same time though, panel paintings begin to develop more fully preaching groups where the expanse of the wall allows for the fuller development of the audience (e.g., cave 288). However, such early depictions reveal little attempt to create an illusion of space and depth.

The tendency toward moving the central sculpted figures into the niche and then adding sculptures out along the west wall has to have posed the problem of what to do with the wall space behind, above and between the sculptures. If the initial response was to paint small images which in a sense are not spatially connected with the sculpture and the architecture, over time the painted images become larger, and hence their relationship with one another and with the sculpture itself becomes more important. Furthermore, whereas in the earlier caves, the flanking figures tended to be only or primarily bodhisattvas, over time the flanking group includes more disciples. Let us look at some of the variations, in the approximate chronological order that has been established for caves from the end of the Northern Zhou through the Sui.

Among the caves one might date to ca. 580, cave 301 has a comparatively large niche, which contained statues of the two disciples within but with no "free" wall space because of the very wide mandorla that extended onto the side walls of the niche [DMK, I, pl, 1]. Painted above the statues of bodhisattvas outside on the west wall were two additional bodhisattvas of smaller size. In other words, there is little different here from what we see on the east face of some of the pillar caves. Cave 296 has the same arrangement as far as the west wall is concerned, but within the niche four disciples flank the mandorla above the two sculpted ones [DMK, I, pl. 185]. The more limited west wall space in cave 297 outside of the niche is occupied by only a single painted bodhisattva on either side above the sizeable sculpted figures, but within the niche on each side above the disciple is a painted bodhisattva [DMK, I, pl. 183]. In all these cases (the possible exception being the disciples in cave 296) there seems to be little effort to harmonize the painted figures and the sculptures into what would provide a real illusion of an undivided group. That is, the paintings seem to hark back to the earlier traditions rather than look ahead to a real integration of two and three-dimensional space.

Somewhat later in date than the preceding three caves, no. 304 has the buddha and his two disciples in the niche, two bodhisattvas flanking along the wall and then eight more disciples — two painted behind each bodhisattva and two behind each of the disciples [DMK, II, pl. 19]. This seems to be one of the first cases where we see

disciples painted outside the niche instead of bodhisattvas. Another example is in cave 433 (a gable-roofed cave), where the photographs show a single disciple on each side of the niche and a single one on each side of the mandorla, with his head curving well out onto the ceiling of the niche [a partial view, DMK, II, pl. 38]. The treatment of the painted images in cave 304 conveys a greater sense of realism and involvement, compared with what we see in caves 301, 296 and 297, both in terms of their somewhat larger size and the fact that they form pairs which interact at least with each other (each pair seems to be conversing and their haloes overlap). This, incidentally, is in sharp contrast to the flanking bodhisattva sculptures, which face rigidly to the front.

In cave 423, the placement of five sculpted figures in the relatively small niche seems to have left no room on its walls to add to the group; instead, the artist painted four additional disciples and two bodhisattvas on each side of the niche on the west wall [DMK, II, pl. 36]. They stand in two rows, one clearly behind the other and partly concealed by it, but they are essentially of equal size, so that any effect of perspective is largely negated. In contrast, the small size of the disciple sculptures in the niche, behind the larger bodhisattvas and clearly "in back of" the plane of the large buddha image, contributes to a illusion of depth beyond the architectural reality of the niche.

Cave 419 (another gable-roof cave), which has all five sculptures within the niche, offers a more sophisticated treatment yet with regard to the paintings [DMK, II, pl. 79]. The six disciples in the niche and the six which flank it, interact in ways analogous to the disciples in cave 304. In front of them on the west wall (distinctly in front — we do not see the full length of the disciples behind them) are three bodhisattvas on each side, which likewise display some variation in pose and convey a sense of animation.

Cave 420, considered to date at most only slightly later than cave 419, has an even more elaborate array of accompanying painted figures: on each side of the niche are nine figures, both disciples and bodhisattvas, overlapping in three rows [DMK, II, pl. 61]. The outer niche contains another pair on each side, visible in front of the bodhisattvas, and then in the main niche several are visible looking over the bodhisattva statues on the side walls. As in the case of cave 419, the figures are smaller than the statues — in fact significantly so in cave 420 — but obviously are an integral part of the ensemble, despite the fact that the niche is framed off with a pearl border. To the degree

that the painter was trying to reinforce the sense of three-dimensional space, he is only partially successful with the paintings. On the other hand, the sense of depth is dramatically enhanced by the architectural and sculptural devices: the double niche and the progression in size of the statues (from large outer bodhisattvas to small disciples in the depths of the niche). Almost in contrast to the west wall paintings, in the painting of a preaching scene over the doorway on the east wall, the sense that the buddha's audience is really grouped "around" him is conveyed quite well [DMK, II, pl. 66].

Undoubtedly for a full assessment of these issues regarding the interconnectedness of architecture, sculpture and painting, one needs to look at the full range of pictorial devices used by the artists. Although I disagree with some of Baker's observations about the nature of the relationship between the Sui niches and the rest of the cave space, one of her great strengths is her careful analysis of details of the mandorla and decoration, as well as the figure painting. Thus she arrives at a very high assessment of the cave 420 artist's sense of spatial relationships, although her conclusions seem in the first instance to be valid for that which is within the boundaries of the niche and not that beyond it:

The nimbus and area around the west wall niche is a spectacular example of a complex and panoramic vision...The inner recess of the niche has painted monk figures behind the sculpted ones, the outer recess...[etc.] Thus the niche area is transformed into a triple-tiered stage setting. The effect is accentuated by the rich and numerous bands of flame and floral motifs which constitute the nimbus itself. Within the inner recess of the niche are bands of flying apsaras alternating with bands of tiny buddha images. These are surrounded by a wide band of finely detailed flame patterns and clusters of apsaras in the corners...Each motif is fitted into the three-dimensional space of the inner and outer recesses so that it accents the contours of the niche and dramatizes the interplay of light and shadow with both painted and sculpted images...[pp. 164-166]

If we look solely at painted preaching groups in the caves of this period, we find developments analogous to what an examination of the west wall ensembles illustrates. Cave 302, for example, has a preaching scene of Buddha under a canopy flanked by two bodhisattvas and two trees which arch overhead [DMK, II, pl. 8]. While it appears that the scarves of the bodhisattvas fall partly behind the pedestal on which the buddha sits, and the trees in part extend beind the canopy and the mandorla, nonetheless the scene provides little sense of perspective. The five-figure preaching scene above the door on

the east wall in the same cave leaves a similar impression, even though two of the bodhisattvas plainly stand behind the other two [ibid., pl. 12].

Cave 303 presents a strikingly different sense of perspective in the image of Sakyamuni and Prabhutaratna on the north wall [ibid., pl. 14]. It almost seems here as though the artist had in mind a three-dimensional image such as the projecting west wall in cave 259 [DMK, I, pl. 20]. The mandorla and frame clearly are in front of the bodhisattvas which flank its sides; the architecture of the steps and what almost give the illusion of being ramps in front of the images is definitely three-dimensional; and within the niche, the symbolic stupa and two more bodhisattvas clearly are behind the two main figures. This all raises the interesting question of the relationship between the painted preaching scenes and the niches in the caves. It is logical to assume that resolution of the problems of creating an illusion of depth in the two-dimensional iconography depended on and followed from the three-dimensional imagery in the niches. Thus in the small cave 298, which has only a painted image on its west wall, we find a preaching scene that contains a fully developed group of disciples and bodhisattvas, of appropriate proportions and gathered around the central image in a reasonable semblance of three-dimensionality (this in lieu of a niche in the cave) [DMK, II, pl. 130]. A comparison of the three-figure preaching images that line the walls in cave 390 with the five-figure ones in cave 244 suggests a much more sophisticated treatment of space in the latter, giving a distinct sense of space such as one would find in a niche [DMK, II, pls. 164, 179]. It is worth noting that cave 244 is unusual in that it has no niche; rather, its sculpture stands totally within the room on the S, W and N walls. Even though the artist has created wall paintings that are iconographically integrated with the sculpture, in that they include additional disciples and bodhisattvas in attendance, there is little illusion of continuity between two- and three-dimensional space, in contrast to the sense of illusion created within each two-dimensional preaching panels [cf., however, Baker, p. 176].

We might conclude so far then that the artists in the Sui were moving in the direction of a successful resolution of issues pertaining to the illusion (and reality) of three dimensionality and space. However, the progress was uneven, even within the context of any individual cave.

If we are fully to appreciate what is happening in these caves, we must extend our vision upward, and look at the relationship between the niches and the ceilings above. In examining the very early caves at Dunhuang, I discussed the way in which mandorlas (among other features) served as a connecting link between the niches and the heavens above. Gradually this link is severed during the Sui, although it would be difficult to argue that the process proceeds in uniform fashion. If we examine some of the same caves treated above with regard to their sculpture and the paintings on the west walls, we find the following picture starting in the late Northern Zhou period. In cave 301, the mandorla extends way up into the ceiling, a ceiling that otherwise already shows signs of being divided off from the wall space below by the somewhat compromised threedimensional treatment of the balcony motif and its band of flying apsaras [DMK, II, pl. 1]. Caves 297 and 296 are in most ways quite similar, although the first seems to invoke at least a mental image of a presumed Mt. Sumeru above by virtue of the entwined sculpted dragons above the niche in the mandorla [DMK, I, pl. 183, 185]. Cave 296 reinforces a connection with the heavens at the top of the west wall by flanking the mandorla with images of the Queen Mother of the West and King Father of the East, stylistically clearly connected with the ceiling paintings above.

Caves 423, 433, 419 and 420 form a particularly interesting group because of the different ways in which the artists dealt with the west-wall niche imagery, on the one hand, and depictions of the Tushita heaven of Maitreya (not present in cave 420) and the debate between Manjusri and Vimalakirti on the other. In approaching this subject, we should recall two aspects of earlier Dunhuang caves. First of all, as I discussed extensively earlier, there seems to have been a conscious effort to connect the space of the caves with the Tushita heaven of Maitreya. Most of those caves were of the transverse gable type; it is probably no accident that 423, 433 and 419 are all of that type too [Ho 1985, pp. 74-75, briefly discusses this juxtaposition, adding to the list cave 417, where indeed the Tushita heaven depiction is above the niche, but separated from it by a depiction of the Healing Buddha; see DMK, II, pl. 30.]. Secondly, we might recall, Ho's argument regarding the Northern Wei cave 249 for the central importance of the Vimalakirti/Manjusri images which flank a representation of Mt. Sumeru on the west slope of the ceiling above the niche. She sees in the cave an effort to integrate all aspects

of the iconography around the themes of the Vimalakirtinirdesa sutra. In caves 423, 433, 419 and 420, we can see similar efforts at integrating the imagery across the wall and ceiling space.

Cave 423 provides one solution. In the flat area of the ceiling immediately above the niche and its projecting mandorla, there is a single pavilion (not two separated ones) in which Vimalakirti and Manjusri debate [DMK, II, pl. 34]. Interestingly it is flanked by the images of the Queen mother of the West and King Father of the East, and in front of it is what has been described as a lotus pond flanked by mountains [Huie, p. 207]. On a lower plane in the picture, there are frontally facing buddha/bodhisattva triads. On the west slope of the gable ceiling and thus directly above the Manjusri/Vimalakirti scene is a proportionately large group of figures in another pavilion, flanked by pagoda towers that are represented as being behind it. The pavilion, containing an enthroned bodhisattva and standing bodhisattva images on either side, represents Maitreya in the Tushita heaven. The pagodas contain standing bodhisattvas on three levels, outside of which are groups of bodhisattvas bearing offerings toward the pavilion. Lastly, on either end of the composition, there are bodhisattva groups around a large seated one sitting under a canopy angled in toward the center of the composition and receiving the veneration of a kneeling figure. Even though they are separated by a red band at the bend of the ceiling and are placed at different angles to the viewer, the two Maitreya and Vimalakirti depictions clearly echo one another in a great many of their visual elements (among other things, the green checkerboarded parquet in front of the pavilions) and in turn are integrally connected with the west wall and niche below through the crown of the mandorla.

Cave 433 treats this iconography distinctively by combining the Maitreya and Vimalakirti/Manjusri scenes into one pavilion complex, with the debaters flanking Maitreya's pavilion and the architecture of theirs angled to provide a sense of three dimensional space surrounding the protruding mandorla from below [DMK, II, pl. 38]. Above them, on the west slope of the gable is a large group of disciples and bodhisattvas gathered around a meditating Buddha. The flying apsaras flanking these two sections of the gable clearly unite them visually and in one cosmic space.

Caves 419 and 420 offer yet another arrangement of the iconographic components. Both contain the Vimalakirti/Manjusri debate, but now flanking the niche on the upper register of the west wall. Above the niche, however, the two caves differ. Cave 419, in a fashion analogous to cave 433, depicts on the flat ceiling above the niche Maitreya's residence in the Tushita heaven, flanked by the Queen Mother of the West and the King Father of the East, below which on each side of the mandorla are enthroned bodhisattva groups analogous to those in the depiction in cave 423 [DMK, II, pl. 84]. What seems to have happened here is a consolidation of the panels in cave 423, where instead of keeping the Vimalakirti scene on the ceiling, it has been moved to the wall, and then the Queen Mother/King Father images have been placed next to the Maitreya pavilion. This then freed the west slope of the gable for a complex narrative scene. One might argue that in a sense then cave 419 is still very much looking backward in connection of the niche with the ceiling space and its depiction of Maitreya, even though the stylistic complexity of the narrative scenes connects the cave closely with what I would term the "forward-looking" cave 420. In terms of subject matter, Baker notes that the "narrative paintings focus primarily on Jataka tales of the lives of the Buddha Sakyamuni, with one exception; that of the Lotus Sutra's piyu pin, or parable of the burning house." In contrast to cave 419, no. 420 has three niches, which she suggests symbolize the Buddhas of the Past, Present and Future, and devotes all its narrative scenes to the Lotus Sutra. Thus she concludes that cave 419 and 420 were conceived of as a pair symbolizing "Sakyamuni and Prabhutaratna on one level, and the Hinayana and the Mahayana on another level." [Baker, pp. 236-237]. While I do not find this interpretation overly convincing, the analogies between the scheme on the west side of cave 419 and the representations on the pillars of earlier caves with Sakyamuni below and Maitreya above might strengthen Baker's conclusion, since the iconography of those early pillar caves generally is interpreted as reflecting Hinayana beliefs.

Apart from the issue of connections with particular trends in the Buddhism of the sixth century, in terms of the use of visual space for narrative depictions we might argue that both caves 419 and 420 seem to be the end of at least one trend in the caves. As discussed above, several of the earlier caves place narrative scenes on the ceiling on a light background and employ what is sometimes called the "sparse style." At least in the

case of a cave as small as 423, it seems very likely that the viewer standing below might have been able to identify from their outlines at least some of the ceiling depictions. However, even with the visual aids of what in effect would be silhouettes against the light background, the narratives might have dissolved into a striking pattern of blue roofs with the content of individual scenes still obscure. In contrast, the somber coloring of the background in cave 419 and the complexity of its narrative depictions surely would have made them hard to decipher in any meaningful way. In other words, what we might posit here is a move in the direction whereby the visibility of the scenes on the ceiling, and then perhaps even the importance of placing complex iconographic depictions on it and connecting them with the imagery on the walls below was in the process of changing.

Cave 420 would seem to confirm this trend, for its double niche is clearly framed by a pearl-decorated border and has only a small pointed protrusion of the mandorla above. This point touches the border around all four sides of the ceiling but does not really cross it into what we might term the cosmic space above. That border, consisting of several bands, provides a clear demarcation between the wall and then a complex series of scenes from the Lotus Sutra that go all around the ceiling without any clear vertical demarcations. In visual terms this means in effect that the viewer's gaze no longer is directed upward in the same forceful way as in 419 and its predecessors--in the ceiling itself, the narrative band would lead the viewer's gaze in a circular pattern around rather than upward. Possibly this new treatment of the niche relative to the ceiling space is to be connected with the fact that in cave 420 there are side niches, similarly framed with pearl borders. The artist probably consciously chose to create visual parallels between these iconographic representations, surrounded by the thousand-buddha motif and therefore not integrally connected by visual devices to the surrounding wall, and the treatment of the west wall niche. However, unlike on the side walls, the artist extended the west wall horizontally by the inclusion outside the niche of the standing ranks of disciples and bodhisattvas discussed earlier.

VIII. A possible interpretation of two sets of "oppositional" images

This said, it is intriguing to consider what the artists of caves 419 and 420 were trying to achieve in their placement of the Vimalakirti/Manjusri scenes on the West wall and flanking the niche. In a literal sense, seated in their respective pavilions, Manjusri and Vimalakirti are carrying out their conversation across the space of the niche. Arguably the subject of their conversation is what is in the niche itself. Furthermore the two iconographic subjects are integrated by the ranks of the disciple and bodhisattva figures below them. In the case of cave 419, the standing disciple and bodhisattva figures are clearly in front of the pavilions (the top haloes overlap with the buildings' foundations) and thus must be seen as in the same visual space, even though there is a marked difference in scale above and below [DMK, II, pl. 79]. In cave 420, the fact of there being a horizontal decorative band separating the two registers does not necessarily violate the idea of their being in the same space [DMK, II, pls. 61, 68, 69]. While the standing disciples and bodhisattvas are focussed on the niche and thus in the first instance must be associated directly with it, possibly they should also be construed as part of the group attending upon Vimalakirti and Manjusri, who have as well their own attendant audience turned toward them.

That the designers of the iconographic program wished to emphasize the connection between the Vimalakirti/Manjusri discussion and the niche seems to be proven by the subject's treatment in at least one further cave. In cave 276 (dating apparently from the late Sui), according to the Academy's identification, they are depicted in a unique way as standing figures occupying most of the west wall space on either side of the niche and facing toward it (and each other) [DMK, II, pls. 122, 123]. Thus they are the visual equivalents and occupying the place of the standing ranks of bodhisattvas and disciples that we saw flanking the niches in caves 419 and 420.

Following Ho's discussion of the significance of the images for cave 249, it seems reasonable to argue that here the designers of the iconographic programs in caves 419, 420, 276, and any subsequent examples in which Manjusri and Vimalakirti flank the niche were emphasizing the teaching of the Vimalakirtinirdesa Sutra regarding nonduality of the Saha world of suffering and the Pure Buddha Land. Thus the images are a conscious device to connect the niche, representing the latter, with the interior space of the cave that, at least on one level, might represent the former. As we will argue

below, even when the images of Manjusri and Vimalakirti were moved to the east wall of some caves, they could be construed as suggesting the same thing regarding cosmic relationships both within the cave and between the cave and the world outside.

Whether such an understanding of the images is displayed consistently in the caves is another matter. Ostensibly, cave 322, which seems firmly dated to the early Tang some two decades after cave 276, repeats the arrangement in caves 419 and 420 that is, Vimilakirti and Manjusri occupy the upper west wall on either side of the niche [DMK, III, pl. 16; Whitfield, pl. 98]. Below Manjusri is a front-facing light-skined Bodhisattva. Below Vimalakirti, on the other hand, is an inwardly facing dark-skinned figure holding up an offering bowl heaped with what appears to be rice. Whitfield calls these two standing figures simply "a pair of Bodhisattvas" (p. 301). One could construe them to be part of the central group in the double niche, although the "closing" of that group by the inclusion there now of guardian figures as part of the seven-figure sculpture group might raise doubts on that score. One might also, perhaps more convincingly, associate the standing figures on the west wall specifically with the depictions above them, in particular because of the section in the Vimalakirti sutra concerning the appearance of the miraculous bowl of rice containing endless quantities of the food sufficient to feed a multitude [note though that the standard depictions show the bowl being emptied out]. In the more elaborate depictions of the Vimalakirti/Manjusri scene which would soon follow, the "retinues" of Manjusri tend to include the Chinese, whereas the retinues of Vimalakirti emphasize foreigners. Thus the treatment in cave 322 might represent tentative step in the development of this kind of imagery. [Note: In analyzing the figures that flank the niche, we might also compare cave 45 with caves 276 and 322. In cave 45, the flanking figures have been identified as Avalokitesvara on the left and Ksitigharba on the right. The former is garbed as a bodhisattva and faces front; the latter is shown as a monk and faces toward the niche — in other words, their poses are analogous to those of the flanking figures in cave 322. One wonders whether the way they face might be related to a pattern of clockwise circumambulation in the cave, where the worshipper would face the first figure head on and then "meet" the second as he proceeded along the west wall of the cave.]

By 642 in cave 220, we have the first representation of Vimalakirti and Manjusri flanking the door on the East wall in very large images and in the accompaniment of their expanded retinues. In the first instance this positioning of the images has been explained by political considerations, since for the first time we see under Manjusri the Chinese emperor [Ning 1998a], and in later examples, the positioning of donor or other honored "patrons" below the two main protagonists and their retinues is done in a way to suggest they too were part of the processions [Whitfield, p. 335]. Perhaps we should emphasize as well a possible religious interpretation. Both in that cave and in the analogous cave 103, clearly an integral part of the whole depiction is the preaching scene over the doorway, one not identical with the array in the niches, but nonetheless analogous. Moreover, Whitfield notes that in cave 159, the "opposing" images on either side of the door are joined across the whole space by the enclosing wall of Vaisali (where their confrontation took place) [Whitfield, p. 321]. Hence even in these caves, there is a visual connection of the "opposing" images, in the first two cases (220 and 103) with the "subject" of their conversation.

What may be more important is that the position occupied by the niche, when the images were on the west wall, is now occupied by the doorway. Thus, if circumambulating clockwise, as he enters the cave the worshipper might encounter Vimalakirti and as he leaves the cave follow in the direction of Manjusri, while presumably at that time noting the juxtaposition of both images. They define the space within the cave as being that of Vaisali, at the same time that they sit at the boundary between the sacred space of the cave (perhaps construed as a Pure Land — remember that cave 220 has the earliest known full depiction of the Pure Land of Amitabha) and the Saha world of suffering outside the cave. For the Buddhist believer then, this positioning of the images emphasizes the non-duality of the two worlds, something that is an appropriate reminder as he prepares to re-enter the world of suffering.

One might draw an analogy here with images on the west walls of Orthodox churches, that is on the wall surrounding and above the exit door. It was common to depict there the Last Judgment, even extending it to cover the whole expanse of the wall (there are particularly impressive examples in seventeenth-century churches in Rostov). On the worshippers' left at the bottom can be seen the beginnings of the steps whereby

those who will be saved are ascending to be judged above. On the right are the gruesome depictions of the sinners who have been cast down into hell. These are the Orthodox equivalent of the pure lands and the Saha world, and serve as a reminder to the worshipper regarding his primary task as he re-enters the the world of sinners. In each case, the Buddhist and the Orthodox, the imagery placed at the point where one leaves the holy space is there specifically to remind the worshipper of an essential tenet of the belief that should be carried back into the world outside.

As with most "rules" there are exceptions. In a few instances, the Vimalakirti Manjusri debate is placed not at the juncture between two "spaces" but rather occupies an unbroken panorama of one of the side walls. The earliest such example is on the north wall of cave 335 (686) [DMK, III, pl. 61]. The explanation may lie in the unique treatment of the painted imagery of the niche in cave 335, where the "oppositional" imagery found there is the contest between Sariputra and Raudraksa. It is possible that functionally the latter depiction was seen to have replaced Vimalakirti and Manjusri, although at the same time to depict them in the same cave on one wall would serve the purpose of reinforcing the message transmitted in the first instance by the imagery in the niche. Much later variants juxtapose Sariputra/Raudraksa and Vimalakirti/Manjusri on the W and E walls of caves 55 and 98, and on the opposing N and S walls of cave 9.

The depiction Vimalakirti/Manjusri debate on the west walls served, among other things, as a frame and focus for the central imagery. An analogous function seems to have been played by the representations interpreted as the "Great Departure" and the "Birth [Incarnation] of Sakyamuni" — that is, bodhisattvas riding respectively a horse and an elephant whose legs are supported by heavenly figures and taken to symbolize Sakyamuni's leaving home and the events of his miraculous birth [on these figures, see Howard 1983; her discussion includes caves nos. 283, 57, 322, 209, and 329, with a postscript adding nos. 278 and 375]. At Mogao these images first appear during the Sui and continue into the Tang and are to be found primarily either within the niche or on the upper part of the west wall. In an important way their placement echoes that of the Vimalakirti/Manjusri images. There is in fact one example, the early Tang cave 209, which places them on the west slope of the truncated pyramid ceiling, in a position analogous to the depiction of Manjusri and Vimalakirti in cave 249 [DMK, III, pl. 42; for

the more of the W wall, Howard 1983, fig. 13]. Cave 209 has an unusual form and iconography all of which would merit further analysis [See Huie, pp. 314-327 for an extended description, but note she misidentifies the image on the elephant as one of the standard representations of Samantabhadra]. What is important here is that the Departure/Birth images are on the ceiling, in a panel that has the standard imagery from earlier times of clouds and musical apsaras silhouetted on a light background and representing the heavens. Howard considers this to be the "most vivid rendering" of the pair, in which "the dynamism of horse and elephant is accompanied and heightened by wisps of clouds, flowers, trailing ribbons and clusters of heavenly beings. They all fill the space and are caught as if in an irresistible whirl generated by the animals" [Howard 1983, pp. 376-377] The cave has no niche but appears to have had a very large central buddha image on the west wall, whose mandorla rises well up into the ceiling panel. The flanking panels of the ceiling contain unique, large preaching scenes, presumably all illustrating Sakyamuni dressed in a patched robe [on the south slope, his mudra is the preaching one, on the north slope the "earth witness" one; the mudra on the east slope is not visible in the photograph I have, DMK, II, pl. 42]. Presumably here the Departure and Birth images are seen to be an essential part of the imagery regarding Sakyamuni, where at least the Departure represents "when the Prince had cut all bonds with the earthly life" [Howard 1983, p. 380], but more generally both images might have come to be symbolic of the cosmic space within which he preaches the law.

It is no surprise then, to find them on the ceiling of the niche flanking the mandorla and facing it in Sui cave 397 [DMK, II, pls. 150, 149, 151]. Here too the depiction is the heavens with some of the standard imagery including apsaras. On the niche ceiling of the later cave 329 they are also part of the array of heavenly figures including apsaras and even thunder gods [DMK, III, pl. 43]. In Sui cave 278, apparently the Departure/Birth figures flank the niche on the upper west wall, as they do in caves 57, 375 and 331 [DMK, II, pls. 115, 116; III, pls. 8, 2, 3, 73]. In other words, they are positioned precisely where, in the examples discussed earlier, we find Manjusri and Vimalakirti. Finally, we note the interesting case of cave 322, where Vimalakirti and Manjusri are in their accustomed places on the west wall, and the Departure/Birth images

are on the upper north and south walls of the outer recess of the double niche, facing outwards (not in toward the main buddha image) [DMK, III, pl. 16].

While further analysis of the Departure/Birth images may be in order, we might venture the following with regard to their position in the cosmic space of the caves. Obviously they are associated with Sakyamuni and very likely appear in part as a substitute for the fact that in the later Sui and Tang caves the imagery popular in earlier centuries regarding Sakyamuni's life has largely disappeared. Further, one might argue that they occupy the same cosmic space as Sakyamuni whether they are actually in the niche or outside it. If outside, they are one element which then helps to extend that cosmic space beyond the confines of the niche and/or simultaneously might be construed as briding the ostensible gap between "this" world and the world beyond. In other words, they assume a function analogous to that of the Vimalakirti and Manjusri images. It is perhaps of some relevance that in cave 331, the flanking guardian statues on the west wall are in the corners of the room; hence the space they guard includes that of the Departure and Birth figures above them. Similarly, in cave 322, the guardian statues are in the outer recess of the double niche, and the Departure and Birth figures just above them. Thus in that case they are part of the cosmos which is a self-contained unit framed by the Manjusri/Vimalakirti debate. Since one connection of the Departure and Birth figures is with the heavenly imagery on the ceilings of the niches, we should now examine its development more closely to fill out our understanding of the niche imagery.

IX. The ceilings of the niches

The imagery of the niche ceilings in the most general sense must be understood as portraying heavenly space. In the earliest caves, most of the upper part of the niches was taken up by a mandorla that generally extended beyond the edge of the niche into the "heavens above." In many instances, niches might contain a few apsaras fluttering on either side of the mandorlas, but otherwise there was really no space for complex heavenly imagery or in fact any need for it. The situation changed as clear boundaries come to be established between the niches and the ceilings during the Sui period. Gradually the mandorlas shrink at the same time that the heavenly imagery on the ceilings of the caves gives way to the thousand-buddha pattern. In effect then what happens is that the ceilings of the niches come to contain the main representations of the "heavens," in a situation where it seems that the niches themselves otherwise were not visually connected with the heavens above in the ceiling of the cave itself [one must recognize, of course, that the thousand-buddha pattern itself can be construed as a representation of the heavenly cosmos; cf. Abe's discussion of the *foming* ritual of naming the buddhas, Abe 1989, pp. 139-142]. Granted, there are some exceptions, and this process does not move in a consistent pattern. Nonetheless, it can be useful to provide a tabulation of some of the main Tang-era variants in niche ceilings, confining ourselves here to the cases prior to the appearance of that late group of caves with the indented ("truncated pyramid") niche ceilings and proscenium arch effect. The order here is approximately chronological.

Cave	Description of niche ceiling
57	Most of space in inner and outer niche occupied by mandorlas; some flying apsaras flank them [DMK, III, pl. 57].
322	Double niche with more space for apsaras on inner ceiling. Outer niche ceiling has analogous cloud patterns, two heavenly giants flanking a buddha seated between two seated disciples. On upper walls of outer niche, Departure/Birth and apsaras [ibid, pl. 16; Whitfield, pl. 98].
220	Elaborate preaching scene delicately fitted to approximately semi- circular space, with clouds and apsaras around. The central buddha flanked by a major bodhisattva on either side and lesser ones in attendance [DMK, III, pls. 22, 23].
331	Niche shape analogous to 329. Rich array of flying apsaras and symmetrical arrangement of meditating buddha images set off by circular mandorlas and floating among the clouds. Extends down a bit on either side of mandorla, which itself just enters the ceiling space [ibid., pl. 73].
329	Broad curved ceiling with ample room on either side and in front of mandorla for heavenly figures, including apsaras, thunder god, Departure/Birth, all extending part way down onto niche wall. Light background, repeated in apsara band around central panel of cave's caisson ceiling [ibid., pl. 43].
321	Extraordinary <i>tromp l'oeil</i> effect of a balcony around sides and part of back of niche, bodhisattvas leaning over it in various poses. Apsaras flank the niche among leaves of tree growing up from either side and in back of it into ceiling. Ceiling painted in blue, with central and flanking buddha/bodhisattva triads on clouds along front edge of niche ceiling and apsaras flying below [Whitfield, pls. 91, 184].

- Heavenly palace of the Tushita heaven in elongated oval frame of clouds and placed directly over point of mandorla niche, which touches it; outside on pale background, flying apsaras [DMK, III, pl. 62].
- Analogous to cave 220 niche ceiling. Here, since image not damaged, can see canopy over the pendant-legged preaching buddha and jeweled trees and other plants in background [ibid., pl. 76].
- 328 Scene analogous to that in cave 217, filling the ceiling which, although flat, is narrower and lower at the back. The sculpted mandorla behind pendant-legged central buddha image extends significantly into ceiling space right up to the lotus below his feet. As with cave 217, intense dark colors [ibid., pls. 111-113; Whitfield, pl. 111].
- 217 Extremely complex and richly colored depiction analogous to those in caves 220 and 334, although here the central image has folded legs and is undoubtedly Sakyamuni preaching the law. Here the three central figures all have canopies; there are many additional scenes along sides with figures preaching to buddha images or depicted in landscape or architectural settings [DMK, III, pl. 97; detail, pl. 99].
- 45 Niche has more rounded back corners than preceding but less of a slope of the ceiling. Very detailed and highly decorated scene of Sakyamuni and Prabhutaratna in the magic stupa, surrounded by choirs of boddhisattvas, and with light streaming from the top of the stupa. This is over an elaborate canopy, into which the top of the mandorla penetrates (painted up and onto the ceiling space) and surrounding which is the greenery of a jeweled tree that extends down onto the wall and overlaps the halos of the two flanking painted bodhisattvas [ibid., pls. 124-125; Whitfield, pl. 100].
- 46 Analogous to the preceding but with much less decorative detail and lacking the tree [DMK, III, pls. 147-148].
- 66 Basic niche shape as preceding two caves but at outer edge angled up and outward to open to the larger space of the cave. Ceiling occupied by a large canopy that extends out over the central buddha sculpture. Around it and on outer edge of niche lintel, decorative design employing lotus and other motifs. On back walls flanking mandorla, tree branches extend to ceiling. Probably the designs around the canopy are intended to represent the branches and leaves and jewels of the tree [ibid., pl. 165].
- An oval-framed preaching group surrounded by clouds, with mandorla touching lotus below pendant-legged buddha's feet. On each side of the buddha are an arhat, two bodhisattvas and a guardian deity — i.e., it repeats a typical arrangement for niche/west wall sculptures. Above the buddha a canopy against the backdrop of a tree DMK, IV, pl. 3].
- 225 Preaching buddha with folded legs; on each side a large bodhisattva and a group of small ones in an architectural setting with gable roof extending above buddha from the rear and with flanking pagodas. In front a rectangular canopy. Top of madorla just touches ceiling and edge of its surrounding clouds [DMK, III, pl. 168].

The origin of the basic variants outlined above seems fairly clear. There are some examples such as 57, 322, 329 and 321 (not surprisingly these are among the earlier ones in the whole group) which reflect directly earlier traditions of populating the heavens with various deities, apsaras, etc. Clearly there is an unbroken line here from the pre-Sui caves and eventually focussing in some of the Sui niches (e.g, cave 397), although depictions of apsaras in and around the central panel of the cave ceilings continues as This is a kind of what we might term "generic" heavenly symbolism. well. The extraordinary painting in the niche of cave 321 seems to indicate best what the artists had in mind — that is, the understanding clearly is that heavenly space opens specifically above the main Buddha sculpture in the niche; generally his mandorla extends into the ceiling and thus connects him directly with the sky above. In the case of cave 321, the artist even went his distant predecessors one better by having the bodhisattvas lean down over the balcony railing. The creation of an illusion of the heavens by painting a balcony under open sky is precisely what we saw in earlier caves where, however, the heavens were represented outside the niche on the cave ceiling and the extension of the mandorla beyond the niche provided the connection between the main image in the niche below and the sky above.

In the case of cave 322, we can see clear analogies with the somewhat earlier Sui caves, where distinct floral borders define the edges of the niches. Unlike the Sui caves such as cave 401 where mandorlas within both niches visually connect the space, in cave 322 the inner mandorla does not even come to the edge, and the relatively narrow outer niche has no mandorla at all. Instead at the apex of the niche, on its ceiling, is a small buddha triad with the buddha in a meditation pose flanked by two arhats angled toward him and praying.

I am struck here by similarities with at least one of the medieval Orthodox Christian churches. In the eleventh century Cathedral of Sancta Sophia in Kiev, even though the various images in the main apse and the area under the central dome comprise a unified iconography. As was typical at the time bands of decorative floral motifs separate the various registers, and often architectural elements reinforce the impression of separation. A particularly important image in this cathedral is that of the deesis, shown by three small medallions containing half length figures of Christ Pantocrator in the Center and flanked by the Virgin Mary and John the Baptist, their heads inclined toward Christ in prayer. This image is placed high above the floor of the church at the apex of the apse and on a vertical surface below which the conch of the apse curves inward (that is, into the apse) and contains a proportionately very large figure of Mary, her arms upstretched in prayer. Clearly the eye of the beholder is to be led upward by the apse figures to the deesis and then beyond to the final image at the top of the dome, a very large figure of Christ Pantocrator that echoes the small one below.

Our cave 322 triad over the niche occupies an analogous position to the deesis in the Kievan cathedral and is its equivalent in theological importance. The buddha triad is placed where the eye led upward by the mandorla's point would cross the floral boundary of the inner niche. Thus, the mandorla serves the same visual function as the apse image of the Mother of God. It is likely that the small buddha triad in cave 322 would have been particularly visible. Lamps suspended from the lamp bracket which is still in place right above the image presumably would have illuminated it from below. Whether or not the viewer would have perceived the niche statues as existing in a cosmic continuum with the small images above in the outer niche is another matter, but arguably the artists wished to achieve that goal.

A second group of niche ceiling images — in some ways, I think, the most interesting one — contains what appears to be images of Maitreya in the Tushita heaven. Here we would include very likely caves 220 (the central image is destroyed; so we cannot be certain), 338, 334, 328, 320 and 225. While the depiction in cave 225 has a buddha with folded, not pendant legs (we tend to associate the latter with Maitreya), the architectural setting argues for Maitreya, as we see in the clearly identifiable image of cave 338. The analogy between that depiction and the images on the ceilings of Sui caves 417, 423, 433 and 419 is striking. Clearly what has happened is the re-positioning of the Maitreya image from the ceilings (as in those Sui caves) into the niches. In turn, we are reminded of the images on the pillars of the pre-Sui caves where Maitreya in his que-style niche was above Sakyamuni, and the two were connected by the extension of Sakyamuni's mandorla from below. In cave 225, the architectural background for the

central image that I argue is Maitreya is reminiscent of the que-style niches in the pillar caves. Even though it is now confined to the niche space, the continuation of this kind of juxtaposition of Sakyamuni below and Maitreya above is significant. In the late Tang caves with the central U-shaped altars and screens, there seems to be at least one instance of a similar depiction connecting the sculptures with the Tushita heaven. I shall discuss that in a later section.

Here a word of caution is in order though, bearing in mind Eugene Wang's observation that students of the art in the caves often too readily obscure distinctions between the representation of one paradise or heaven and another [Wang, 44]. Whitfield may have a plausible alternative interpretation for at least some some of these representations of what I identify as Maitreya. For cave 328, for example, he emphasizes that in the ceiling of the niche, "the two principal Bodhisattvas make the dharmacakra gesture of preaching, since in Mahayan Buddhism it is they who offer believers salvation and rebirth in the Pure Land" [p. 308]. There is a fragment of a niche ceiling painting in cave 103 [not included in my table above; see Whitfield, pl. 381], of which he writes [p. 312], "the orientation of the clouds, and the direction of the gaze of the Bodhisattva, suggests that this figure might well have been the Welcoming Amitabha advancing to greet souls entering his Western Paradise." Even if that is the case, I think it still reasonable to posit the evolution of the iconography in the fashion I have suggested above. Finally, I should note his comments regarding the sutra depictions on the wall of cave 12, where he emphasizes that the focus in the Maitreya screens is not the Tushita heaven but the "Descending Maitreya," a theme that becomes popular at Mogao and Yulin only beginning with the Tang. The "narrative" panels show the Pure Land of Maitreya after his descent to earth [Whitfield, p. 332]. It is possible that a more precise examination of what I am calling "Tushita heaven" depictions will reveal that the language of those earlier representations has been used for something a bit different, although it may well be that what we are dealing with is some kind of combination of the two aspects of beliefs about Maitreya.

The image of Sakyamuni and Prabhutaratna in the niche ceilings of caves 45 and 46 depicts the famous Lotus Sutra passage describing the appearance of a floating stupa, in which Sakyamuni seated himself alongside the Buddha of the Past. We have seen this

image in any number of earlier caves, generally, in iconographic schemes that seem to emphasize either the Buddhas of the Past, Present, and Future and/or the life of Sakyamuni. Except for this juxtaposition in the niches, caves 45 and 46 apparently contain no other images specifically focussing on the Lotus Sutra. In Cave 46 though, there is the unusual arrangement of niches on the north and south walls. The statues in the niche on the north probably represent the Buddhas of the Past, and the south niche contains the Parinirvana, where Sariputra and the Buddha's mother are grieving at the body. Thus taken together, the niche imagery in cave 46 could connect logically with an emphasis on the Buddhas of the Past and the life and nirvana of Sakyamuni.

Finally, the niche ceiling of cave 66 points up yet another function of these paintings — to contribute to the sense of three-dimensional space within the niche as a whole. This often means depicting a canopy and the trees, which according to the scriptures, the Buddha sat under when he first preached. We recall that in the relatively simple painted wall panels of preaching groups, the backdrop is generally only a canopy and flanking trees. Under the Sui already such essential components of the scene were successfully portrayed in niches--for example in the north wall niche of Cave 401 [DMK, II, pl. 140]. There the canopy comes out on the ceiling so that it is directly over the central statue, tree branches rise from the wall and spread out nearly to encompass the canopy, and apsaras and clouds fly around the sides and outer edges. In its basics then, the much later cave 66 contributes little to this imagery other than a very different style which means that the apsara dotted heavens of the Sui have been abandoned in favor of what increasingly may seem more geometrically decorative than suggestive of cosmic "reality."

We might better understand the imagery in cave 66 in the context of Ho's discussion regarding canopies as represented in cave 249 and in cave 285. She contrasts the textual indications of the Vimalakirtinirdesa sutra with those of the Lotus Sutra about how worshippers scattered precious objects over the Saha universe. "The cosmic imagery in Cave 249 seems to be part of the lage *chang* [canopy] itself," whereas "the cosmic imagery in Cave 285 is below the canopy itself, and is closer to the textual passage [of the Lotus Sutra]...The freely floating canopy is a more appropriate expression of the canopy transformed out of the "clouds" of precious objects thrown above the Buddha's

head" [Ho 1985, p. 210]. In cave 66, the canopy in effect replaces the sky and encompasses all that is beneath, whereas in the other depictions, the canopy is in effect below the sky. This would make sense if in fact the latter depictions are the more firmly anchored visually and conceptually with the pre-Sui traditions.

X. The sense of space and cosmos in the niche caves

Before moving on to caves of a different type, it is useful to summarize some of the visual impressions produced by the caves with west wall niches from the late Sui through to the middle Tang. The question I wish to address is the degree to which all elements — architecture, sculpture, and painting — succeed in creating an illusion of extended three-dimensional space. To a degree the critical issue here is the question of the direction in which that space is extended. That is, are we dealing with effects that extend the niche horizontally and/or vertically, and do we see an effective integration of the niche space with the rest of the cave? I shall include some discussion of the paradise imagery on the side walls, but for practical reasons cannot engage in a full analysis of it.

A few words of caution are in order here. I am assuming that we can attempt to understand how the artists themselves might have construed perspective and illusion. A study of the ways in which Sui and Tang artists developed the ability to create the illusion of three dimensions suggests that indeed they consciously were striving toward that (in some of the contemporary texts about painting, they seem to say as much); so it may well be that their sensitivities in this regard are very similar to our own. A second word of caution concerns our ability to assess the reality of what is visible in the caves. We need to recognize that different viewpoints might produce different impressions. In the first instance I have in mind here the fact that the height from which one views a cave, especially when dealing with the niches, very much determines what one sees. A sophisticated analysis of the artists' techniques has to consider, among other things, what they might have understood to be the ideal viewpoint, or to what degree they might have considered multiple viewpoints.

In comparing Sui caves with those from the Tang, one of the first impressions is that proportions seem quite different, something that it might be interesting to quantify by a series of careful measurements. The best of the Sui caves communicate a sense of

openness, whereas many of the important Tang caves are comparatively small and seem cramped. Often the size of the niches and the size of the statues they contain are the major contributors to these impressions. In a sense, the combination of the architecture and sculpture in the Sui caves communicates something grandiose, although I am not sure I can accept Baker's argument that this reflects the borrowing of a kind of imperial grandeur from the capital. However, her conclusion about how the later Sui niches come across as stages seems quite justified. Especially where those stages have double niches, as she points out, they do open out toward the room. However, at the same time, as I have argued earlier, what is perhaps more important is the way the double niche provides a genuine sense of depth. I have already indicated some of the reasons why I think increasingly the niches ceased to interact fully with the space around them. One of the great virtues of the Sui caves though is the way that they embodied stunning visual effects, with intricate flame patterns in the mandorlas often mixed with floral designs and harmonized color schemes emphasizing reds and browns. This is one reason why the space within the niches is really unified but also a reason why the illusion does not necessarily travel beyond. A striking exception would be a cave such as 404, where inner and outer niches each have a mandorla, and above the niche as a whole a third mandorla penetrates the ceiling space with its thousand buddha motifs [DMK, II, pl. 100]. There is a gradation in the color scheme which emphasizes increasingly the stunning blue flames of the third and highest mandorla, which then are reflected in all the thousand buddha images.

On the level of the integration of painted figures with the statuary, the Sui caves seem to have been less successful, probably because many issues of proportion and threedimensional illusion had not fully been worked out for the task at hand. One of the differences between most of the Sui efforts and what emerges in the Tang is that in the former the painted images are smaller than the statues, but the effect is not necessarily one of their being smaller precisely because they are more distant from the viewer. The early Tang cave 57 is very close in spirit to the Sui examples in this regard and in many other aspects of its art. The relatively small size of the double niche really does suggest an image box set back from the main space and not fully connected with it, although in something of an anachronism it is flanked on the outside by sculpted dragons. The artists apparently tried to give a heightened sense of depth to the niche by making the flanking sculptures higher toward the front than in the back; if anything, this, more than the niche structure itself, visually opens the niche to the room. The flip side is that the outermost bodhisattva statue(s) are almost disproportionately large and little space remains on the walls for accompanying images, which in any event are pretty much covered up. The beautifully painted flanking pairs of bodhisattvas on the west wall don't quite "fit" next to their huge neighbors in the niche and thus do not visually extend the composition of the niche across the whole wall as well as they might if larger in size. [Cf., however, Huie, esp. pp. 302 ff., where she rates the three-dimensionality and quality of the paintings in this cave very highly.]

At the same time though, the artists and patrons of cave 57 had an excellent understanding of visual effects of light. Even though the paten of the paintings is relatively somber, there is lavish use of gold in the jewelry and headdresses of the painted bodhisattvas; it is apparently gold that creates the pyramidal pattern among the thousand buddhas on the ceiling and highlights bosses and other aspects of the panel at its top. The paintings of preaching groups on the side walls also are encrusted with gold, so that one can imagine the interior of the cave resonated with flickering highlights that may in fact have created a sense of total cosmic space. The use of gold in the Tang period was quite common, especially in the garments of the statues; if we are to reconstruct the visual impact of the caves, we need to keep this in mind.

In many respects, a more "successful" treatment of the West wall is to be found in cave 331, which has a spacious single niche whose upper edge meets the bottom of the ceiling slope. Here the sculpted figures are all of approximately the same proportions The visual impression is one of a descending line along the heads starting with the guardian figures placed outside the niche. The painted figures behind the guardians contribute little visually to the ensemble (they hardly need to, as the guardians encompass the whole space), but the painted figures on the back wall of the niche contribute a great deal, since the line of their haloed heads descends diagonally emphasizing the diminishing vertical dimensions of the niche (and hence enhancing the sense of depth) and focussing the viewer's gaze on the central buddha image. The "generic" heavenly imagery of the niche ceiling is visible even when the viewer's eyes are at about the level of the head of the seated central buddha image. That is, the niche achieves its intended effect as one enters the cave and does not seem to require that the worshipper be kneeling in front of it to understand the totality of the iconography. This is a case then when one might legitimately argue that the niche space is part of the larger cosmos of the cave visually. The extension of the niche horizontally across the whole of the west wall by the placing of the guardian figures outside is harmonized with a sense of vertical spaciousness of the niche. In spirit, the cave recalls its Sui ancestors more than its Tang successors.

Even though the upper part of the double niche in cave 322 retains some of the imagery that dominated during the Sui, the feel for this west wall is substantially different from that in caves 57 and 331. The niche is wider and lower proportionately to the rest of the west wall in cave 322, the statuary is more spread out, and the size of the statues more uniform. Where the progressive diminution in size of the cave 57 statues is substantial, here the effect is more subtle (and more like what we see in cave 331), since the outer guardians and adjoining bodhisattvas are essentially of equal height, the guardians boosted by their standing higher on demons underfoot. As is customary in earlier caves, the two disciples are smaller than the other figures, but at the same time they are "growing" to a more natural height. While the images outside the niche on the west wall are proportionately small in comparison to the guardian statues within the outer niche (those painted images may in fact "belong" more to the Vimalakirti/Manjusri representation above), the painted images of disciples on the wall of the inner niche are close in size to the disciple statues that flank the buddha. Thus, the illusionistic aspects of the niche in the relationship of its painting to the sculpture are fairly successful. In this cave in general, one sees some of the best features of the Tang, not the least being that the relatively shallow niche and wide placement of the figures does give a sense to the worshipper of their being genuinely close at hand. Contributing to this sense is the greater "naturalism" of the figures that everyone notices in Tang sculpture. The overall harmony of the images in this cave is accentuated by the thousand buddha pattern on walls and ceiling and by the fact that the middle of the north and south walls have large preaching panels where the figures are of an equivalent size to those sculpted in the niche. The visual impression then might be analogous to those few caves where there are side wall niches, an effect which is almost impossible to achieve once large panoramas of paradises have been placed on the side walls.

We see the earliest of such complex paradises in cave 220, built within a few years of caves 57 and 322. Unfortunately, we cannot regain the feel of the damaged niche; so I shall confine my comments here to the paradise scenes. This is not the place to undertake a full study of their evolution [see, e.g., Wu 1992a and Wu 1998], but I wish to point out some of the visual connections with possible models that the pioneering artists of cave 220 might have used. The core elements of most paradise scenes are a central buddha figure, flanked by bodhisattvas, among which at least two major ones may be angled toward the central figure and have their own retinues and worshippers. Increasingly the paradise scenes in the Tang display a complex architecture, in the given instance confined to large two-story pagodas at the outer edges of the picture [for a study of the evolution of the architectural complexes, see DMK, IV, pp. 175-189]. One of the prime identifying features of the Western Paradise of Amitabha, which is the one in cave 220, is the extensive lotus pool around and in front of the main figures. Reborn souls are emerging from the lotuses in the pond. In front of it is a railing and wall, with a checkerboard platform in the middle, and in front of all that dancers and musicians perform. In other paradises, the complexity of platforms and bridges across the lotus pond grows in ways that increasingly reinforces the sense of three-dimensional perspective. In the case of cave 220, the central figures are large compared to those below and "in front"; increasingly there develops a better sense of proportion, although mortals in the foreground even of the later scenes often will be proportionately small.

The source of much of this imagery was readily available in the caves at Dunhuang: pavilions with side pagodas representing the Tushita heaven, for example; compositions with central and angled side buddha groups, reborn souls emerging from lotuses, lotuses growing up out of ponds with figures standing on them, flying apsaras and musical instruments in the sky above, jeweled trees and canopies--the list undoubtedly could be extended. How exactly all this came together in cave 220 for the first time is another matter.

My interest here though is what the depiction of these paradise scenes meant for the understanding of the space in the caves. On the one hand, they surrounded the viewer, at least on his left and right when facing the niche, with a striking visual presence of "heaven on earth." (On the north in cave 220 we have a full wall depiction of the seven images of the Healing Buddha [that is, the Eastern Paradise], with appropriate visual devices setting them back in space under canopies and with lamp-lighting, dancing and music being presented in the foreground.) Whether or not the scenes had any visual connection with the ceiling of the cave (most of the early ones did not) was largely irrelevant, especially since the popularity of Pure Land doctrines in this period meant the paradises to seek were "lower" and comparatively accessible. So long as the paradise scenes occupied whole walls, their visual impact might have created a genuine feeling that the worshipper was actually present in the lower and nearer plane of the scene. That is, the Saha world of suffering bordered on the lower edge of the paradise scenes and was in fact a direct continuation of those depictions. Even as the Buddha and bodhisattva images shrank in size compared to their surroundings because of the increasingly realistic perspective, precisely because of that perspective they were accessible and might seem to be in the same space as the worshipper. Thus there is the illusion that the space of this world in the cave extends into a distance that ultimately leads without break to the heavenly realms. This illusion leads the vision outward and upward, but for all of the fact that the ceiling area of the cave might have been considered a generic "heaven," the early paradise paintings stopped abruptly at or below the top of the wall.

It is important to stress that the Tang-era illustrations of sutras and paradise scenes evolved substantially, and that even within a single cave, there may be substantial stylistic differences and different treatments of perspective. A noteworthy example is another of the important Tang caves, no. 217. Eugene Wang has recently argued persuasively that the iconographic program of the cave is to be connected specifically with commemoration of Yin family ancestors. This explains the fact that in the heavens above the scene of Sakyamuni preaching on Vulture peak is a pavilion where the imagery is not what we would expect for a paradise but rather what we might connect with mourning ceremonies. One thing which strikes us about this cave is the contrast between the north and south wall painting. On the north is a large depiction of the Paradise of Amitayus, with its accompanying scenes regarding Prince Ajatasatru and Queen Vaihedi. The paradise panel develops fully the visual devices suggesting three-dimensionality. On

the south wall, the preaching scene is a panel occupying about the middle third of the wall, around which are various scenes connected with the Lotus Sutra.

As Wang writes:

The emphatic geometrical demarcation of the central scene from the surrounding scenes, however, is unusual, and, indeed, heightens the sense of otherworldliness. In addition, through an effective description of three-dimensional space, this central scene simulates a rectangular niche which one can enter. It is, in effect, a gateway.

In the *Lotus Sutra*, the 'gateway' is the threshold dividing a world of misery and suffering on this side and a trouble-free paradise on the other...[Wang, p. 48]

He goes on to explain the significance of "gateways" in a variety of contexts. Here is a fruitful line for further inquiry, since one of them, which he does not explore, is the early imagery of Maitreya seated specifically in an architectural gateway.

To a degree I would take issue with his analysis of the specific panel in cave 217 though. If one examines it from the standpoint of the illusion of perspective (especially in contrast to the paradise on the north wall), the south panel is strikingly twodimensional [cf. DMK, III, pls. 100, 103]. The worshipping figures in the foreground are smaller than those in the middle register, where the flanking bodhisattvas are arrayed in a line, although with some "behind" others, rather than grouped around the buddha figure. There are no architectural elements suggesting depth. The image is striking, nonetheless, in part because of its clear depiction of what Wang identifies as Vulture Peak, rising in back and above the Buddha, and the way that the pavilions on top break through the frame of the scene, as if exploding out of the confined space below. The fact is that the visual devices here do not really draw the viewer in through the "gateway" of the frame around the panel, and thus the impact is arguably very different from that of the north wall's depiction of Amitayus's paradise. If anything, to emphasize some of these issues pertaining to perspective might strengthen Wang's conclusion, since he feels that specifying the celestial realm above the preaching scene as the abode of the Yin ancestors lends to the "gateway" "a restrictive overtone, a sense symbolically conveyed through its harsh borderline delineation that exculdes rather than includes" [Wang, p. 49]. I think here we have another example of the way in which niches and their two-dimensional equivalents may visually in fact convey a sense of separation from the main space of the cave rather than its inclusion.

Even in their most skillful early versions, the paradise scenes likely would not have had the same visual impact as the sculpture in the niche on the west wall. Arguably, as the Tang period progressed, the latter perhaps communicated less and less a feeling of the worshipper's sharing the same space. Compounding this "distancing" of the viewer from the holy figures was the concurrent tendency for the wall space to be subdivided into multiple paradises, which meant it was less and less likely that the viewer could sense himself genuinely a part of them either. Granted, since we are told that the main purpose of the imagery was to stimulate internal visualization, then perhaps these considerations make little difference to our appreciation of what the Tang artists achieved. In fact, the contemporary assessments by those who designed the caves suggest they felt that at least some of their creations really encompassed the entire cosmos [Whitfield, p. 327, regarding the Late Tang cave 156]. However, if visual realities were important — and I think they still were — then something essential was being lost.

The west wall of cave 328 creates a very different impression from that of cave 331. The niche is set higher above the floor, and even though its top penetrates the decorative band on the wall just under the ceiling, there is less of a sense of niche space opening fully into the main space of the cave. This impression is accentuated by the fact that the niche ceiling and back walls are essentially flat, rather than curved as in cave 331, providing a kind of boxy appearance. While on the one hand the sculpture in this cave can be seen as providing a particularly "accessible" group — kneeling bodhisattvas in the corners outside the niche and at the outer edge of the niche, followed by seated bodhisattvas in the "royal ease" position — on the other hand, the sight lines that might lead one's gaze inexorably to the central figure are broken by the relatively small size of the figures and lack of any sense of progression in size, and by the fact that the painted images on the walls seem if anything disproportionately large, thus not contributing to an illusion of the extension of the space. The density of the color and decorative aspects of the ceiling of the niche similarly do not invite the viewer to imagine an expanding space. Finally, we note that for the imagery in the niche to have its full effect, the viewer really

has to be kneeling in front of the niche. That way the full glory of the ceiling depiction and its juxtaposition to the buddha statue can be best appreciated. However, arguably the visual effects do not signal to the viewer as he enters the cave that he is in cosmic space; it takes proximity to the altar niche to reinforce that impression.

Another of the Tang creations that can legitimately be considered to represent the most skilled work of the Dunhuang artists is cave 45, with its elegantly decorated statues and elaborate, rich painting. Here though, the flatness of the niche ceiling is even more pronounced, and the placement of guardian figures as the outermost ones in the niche defines the space as being separate from the room, notwithstanding the fact that their elbows protrude in front of the plane of the west wall. The ceiling image can be seen only if one kneels just below the edge of the niche: as Whitfield puts it, "Seen from below, the decoration carries straight over from the back wall of the niche to the ceiling" In general, the decorative elements in the painting almost overwhelm the [p. 315]. iconographic focus both in the ceiling image and in the painted images of the bodhisattvas on the niche wall. The statuary and those figures are of approximately the same size now — among other things, Ananda and Kasyapa have grown to full height so that one does not get the same visual reinforcement of sight lines focussing on the central buddha image as in some of the caves discussed above. It is true that the images in this quite small cave are "accessible" and by virtue of their comparatively large, "naturalistic" size convey a feeling of intimate connection with the worshipper. However, the paintings on the north and south walls do not fully contribute to a sense extending the cave space into cosmic space. On the south is a large image of Guanyin, flanked by the many small scenes depicting his/her manifestations and salvation from perils. On the north is a dominating central panel depicting the paradise of Amitayus. Here there is full development of the sophisticated illusion of space through the angling of various architectural elements. The image is flanked by rather large side panels portraying the story of Ajatasatru and the sixteen meditations of Queen Vaihedi. Whereas in cave 217, the Ajatasatru story was treated differently, with one particularly large "iconic" summary image, here we see the more formal organization of a "panel." This presages the continuing elaboration of "screen panels" in the later Tang to illustrate details connected with the paradise illustrations. As a concentration on small depictions

grows, the possibility that the larger images such as the paradises can really be integrated into a total sense of cosmic space in the caves diminishes. The viewer increasingly is on the outside looking in, across an invisible spatial barrier.

XI. The "truncated-pyramid"-roofed niches

It appears as though several significant changes occur almost simultaneously in the development of the niches during the middle and late Tang. As we have seen in the discussion of niche architecture, they become fully rectangular boxes, with truncated pyramid ceilings and a front "proscenium." Increasingly, the figures within them are placed on a U-shaped dais, rather than being on separate pedestals or lotuses. And finally, the paintings on the back walls are framed to form "screens" or panels.

An early example, cave 113 could be seen as a transitional type — the architectural features are there, and the painted figures of additional disciples and bodhisattvas on the niche walls are framed off so that they do not interact with each other in the way that we see in earlier niches [DMK, III, pl. 143]. This treatment is echoed on the slopes of the niche ceiling, where each image is in its own rectangular frame. One wonders whether this treatment of the paintings in the niche is not somehow related to distinctions being made in this period between icons and their "real" prototypes [Wu 1996 and lecture July 8, 1998]. That is, what may be happening is a move away from any attempt to portray the niche as an integrated cosmic space and toward an understanding that its function is to juxtapose icons with their prototypes. Increasingly the niche may be moving toward a function primarily as a display of icons. As that happens, the artists eventually abandon any attempt to expand the sculpture group in the niche by painting additional bodhisattvas and disciples on the wall; instead they start to illustrate the niches with screens containing sutra "narratives" or other small images difficult to see, much less decipher.

The visual impact of the niche in cave 113 is that of a stage quite separate from the rest of the room, even though the sculpture is "extended" by the placing of large guardian figures in the corners of the room itself. If anything, their size creates the impression that the niche is even more distant from the viewer than it is; the effect is not one of a gradual transition into a distant realm that is connected to the space where the viewer is physically present. It is true that a worshipper praying right below the main buddha image would sense the space differently, with the guardian figures looming up on either side of him. At that location in the cave, the viewer would at least be at the edge of the cosmic space. represented in the niche.

Cave 159, "regarded as a masterpiece of the late Tibetan period," provides an excellent illustration of where these developments lead [DMK, IV, pl. 75; Whitfield, p. 318 and pl. 118]. The visual impression of the painting, at least, is one of separating the wall and niche space into a group of panels delineated either by floral borders or simple red bands and then filling each with very minutely drawn details that provide a sense of unified space only by virtue of their similar style and coloring. Thus, flanking the niche in cave 159 are the by now well-elaborated images of Samantabhadra and Manjusri on their steeds surrounded by myriad attendants, and below each is a two panel depiction of the holy mountain associated with the central figure above. We are told, incidentally, that the depiction of Mt. Wutai under Manjusri is the earliest such representation of it in the caves [DMK, IV, pl. 76]. It is true that the main images on the west wall face in toward the niche, and it is entirely possible that the same kind of analysis provided above for the Manjusri/Vimalakirti images would suggest ways in which they are intended to integrate the iconographic program and also the space within the cave into a whole.

Within the niche, we see wall panels with various religious scenes set into elaborate landscapes in the same style as the Mt. Wutai picture outside the niche on the lower right wall. To the left of where the buddha statue once stood, one of them depicts in some detail a monastery [see Whitfield, pl. 317, and p. 319, for extended comments about the painting's "lively conception"]. What impresses me about these screens within the niche is less the quality of the painting and more the fact that with all the statuary in place, they are virtually invisible to any observer outside the niche. The artists painted the scenes; then the statues were placed in front of them, largely covering them up. This fact suggests that creating any sense of illusion whereby the wall space interacted with and extended the space within the niche containing the statues was rather far from the artist's mind. If anything, what we have here is not integration of wall and statuary but dis-integration, except insofar as some elements of landscape can be seen around the statues which might be understood as a paradise in which they were located. In any event, whatever was the substance of the screen paintings in the niche, it seems not to have been something the viewer was supposed to divine.

In discussing cave 112, another one in this group, Whitfield observes analogous phenomena both for the niche paintings and for the sutra panels on the walls. They lack the attention to perspective and detail, the "spatial niceties" found earlier in the Tang. The effect ends up being more decorative "than to exploit the interest of spatial effects and interactions between figures in sub-groups, as was the case in the Early Tang" [p. 323; see the series of detailed plates in DMK, IV, pls. 53-62]. He speculates that this may be a result of provincial isolation or perhaps a reflection of the fact that the effort to illustrate as many sutra texts as possible left little room for "artistic invention." What also is worth noting here though is that these paintings seem to have employed an abundance of gold leaf — all of it now gouged out. The faces of the main buddha and bodhisattva figures, the jewelry and tiaras of the latter and the flaming jewels all would have gleamed from the walls in flickering light. Even if "decorative effects" seem to dominate in the paintings, the artists seem to have been highly consious of the overall impact.

An analogous treatment of the niche architecture and its painting can be seen in caves 231 and 237 [for details of the second, DMK, IV, pls. 104, 106, 108, 109]. The wall paintings seem to illustrate the Sutra for the Redemption from Indebtedness, the connection of which with the rest of the iconographic program still requires study. Here though, it is of particular interest to examine the paintings on the slopes of the niche ceiling. They depict in almost identical fashion the various miracle-working icons and scenes regarding miraculous events all of which have a particular connection with Khotan. Cave 231 is dated 839; 237 must have been decorated at about the same time. The Khotanese images also were were portrayed on the south wall of cave 220 when it was repainted in the 850s [see Ning 1998a]. We find them as well in the corridor paintings of caves 9 (892) [DMK, IV, pl. 173] and 98 (914-925), where the angled sides of the ceilings present surfaces visually analogous to those in the niches of caves 231 and 237. The flat corridor ceiling also offered the opportunity to display in really visible fashion the miracle scenes (e.g., the drying up of the lake that had inundated Khotan) which had been tucked away out of sight in the front corners of the niches. It is possible

that the interest in depicting these images connects with the changes that lead to the development of the new architecture of the niches. The slopes of those niches either have the specific miraculous icons or they have other buddha images each contained within its rectangular frame and thus visually analogous. The images face a worshipper directly when he stands or kneels in front of the niche; also, those on the front slope of the niche, invisible to the worshipper, face the buddha statue at the back of the niche. As Wu Hung has suggested, what we seem to have here is a case of the icon "reflecting" the real prototype represented by the statue and juxtaposed to it.

Whatever exactly is going on here in these spatial relationships, there seems to be a specificity regarding the niche iconography whereby the walls are now of secondary importance to what is essential. By indenting the niche ceilings, the architect has created a physical opening upwards toward the heavens which directs a properly positioned viewer to look there. The sequence for viewing then might be that one enters the cave, sees the statuary standing largely unconnected with the back wall of the niche (whose imagery would not have been decipherable from afar and maybe not even upon close examination), then approaches the niche, kneels, and looks up to see not only the statues but the icons above them. The wall of the niche thus is of little importance, and so also curiously enough is the flat ceiling surface, which normally has a lotus-in-grid pattern rather than an illusionistic painting of a heavenly scene.

Another feature of this type of niche is the placement of all the statues on a raised, U-shaped altar or dais, something which may contribute to the visual effects just described. Since this feature becomes a major element in the composition of the later caves, some comments are in order regarding its evolution. According to Huie, the earliest example of the use of such a dais within a niche is in cave 335, where she argues it is a device that helps create a "three dimensional space into which the viewer can penetrate or participate. In this way the clear separation of the area surrounded or enclosed by the U-shaped platform and in that manner he becomes the eighth member of the assembly." [pp. 376-377] Her insight is very important, although I am not sure it applies accurately to most niche caves that contain such a U-shaped platform. The platform can provide a visual device to emphasize depth perspective in the niche (the one

in cave 159 seems to do that), but as much as anything, the effect seems to be to remove the sculpture even farther from the viewer by elevating it. Only if one had a case where the floor of the niche was very close to the ground would the impression be that which Huie describes (to a degree this is what we indeed have seen in cave 46).

Such platforms visually and conceptually seem to be connected with honorific platforms placed under holy figures in some of the paintings, and by extension it is possible one should seek their origin in ruler imagery from some court. One of the earliest examples I have noted from the Mogao caves is in the depiction of Manjusri in cave 314 [DMK, II, pl. 135]. There was a tendency to show him raised on a platform, reinforcing the idea of his Bodhisattva status, in contrast to Vimalakirti, who sits on the floor, reinforcing the sense of his guise as a layman. Of particular interest is the way in which the platform under Manjusri is raised on cut-out "frames" of a particular shape, revealing in a three-dimensional fashion the floor underneath. It is precisely this frame motif that comes to be standard on the U-shaped daises or platforms in the niches. It further is found in depictions of Manjusri and Vimalakirti in some of the late Tang caves [e.g., cave 138; DMK, IV, pl. 193] and, with some variations in shape, around the edges of the U-shaped altars in the centers of a number of the later caves [e.g., cave 16]. Insofar as we are concerned here with three-dimensional effects in the caves, it is worth noting that on many of such altars, the platform "arches" are formed by sculpted relief, giving a sense of the three-dimensionality of the space and presumably echoing the depictions thereof in the wall paintings. Cave 98 even uses these molded arches to create an honorific dais for the donor portraits in the entrance corridor [Whitfield, pl. 139]. Furthermore, the same "arch" motif finds its way into the pedestals of Buddha and bodhisattva statues or painted versions of the same, in come cases as a genuinely threedimensional element — behind their arches is a separate "cube" painted with decorative motifs that the arch frames (e.g., caves, 245, 98; compare the early example of a molded arch in cave 244) [For cave 245, DMK, V, pl. 141, a painted pedestal with an open frame; the buddha statue is on an unusual pedestal, with the arched platform below, and above it a high "Mt. Sumeru" table-top platform. For cave 98, again no photo of the statue base; but note the platforms under Manjusri and Vimalakirti, DMK, V, pls. 9, 10. For cave 244, DMK, II, pl. 172.]

If we attempt to establish the genealogy of the way in which the U-shaped platforms become an essential part of the presentation of the sculpture, we probably need to look first of all to the early caves that place statuary on three sides of the main room-e.g., a cave such as 427 (ca. 600) [plan: DMK, II, p. 427] and 332 (late 7th century) [plan: DMK, III, p. 238], where the statuary which surrounds the worshipper in the gabled area in front of the pillar is not yet raised on a single platform. A further development would be in cave 244 (apparently just slightly later in date than cave 427), where the statues are on a raised U-shaped platform around the S, W and N sides of the room [DMK, II, pls. 177, 180, 181]. Another example is the small High Tang (i.e., 8th century) cave 319, although there the U-shaped altar is confined to the West end of the room. Then comes the integration of the platform into the niches, in cave 335 (late 7th century, a bit less than a century after cave 244), although one might argue that this first attempt was still experimental. The cutting of a step in the niche floor in cave 46 (ca. 735) was a different way to suggest a U-shaped platform, one not involving building it up from the floor. The norm comes to be the built-up platform though, such as we see in cave 159 (820-830). That the inclusion of such a platform could have been designed not to bring the images closer to the space of the worshipper but rather the opposite can be seen in cave 231 (dated 839), where the floor of the niche is about four feet off the ground, and thanks in part to the platform, the hem of the central buddha image's robe is about 6 1/2 feet off the ground. This would have to place the images well above the head of any worshipper and, combined with their relatively small size, would have created a kind of perspective from immediately in front and below that would lead the viewer's eye upward to the miraculous icon images on the ceiling slopes above.

Even in the early examples where the sculptures are placed on such a platform, there seems to be a tendency to experiment with the imagery on the walls behind them and not always really integrate that imagery visually with the statues themselves. One can argue that such is the case in cave 244, even though the predominant wall imagery of preaching pentads echoes the theme of the statuary. In the case of cave 335, the niche wall contains the unique depiction of the battle between Raudraksha and Sariputra [see sketch, Wu 1992b, p. 147, fig. 4]. The oppositional placing of the two protagonists at the upper outer edge of the niche seems consciously to have been intended to echo the

oppositional depictions of Vimalakirti and Manjusri, which framed many of the niches on the west wall. Here Vimalakirti and Manjusri have been displaced to a single large composition on the north wall. The portrayal within the niche does attempt to work the various key elements of the scene in and around where the statuary would have stood (we cannot tell exactly how the sight lines would have worked, since some of the statues are missing). As Wu Hung suggests [Wu 1992b], it may be a mistake to seek here a coherent "narrative," since the artist chose rather some selected moments and did not present them in a clearly sequential order. Yet one might argue, given the fact that this depiction comes in a period when there was a conscious effort to intregrate all the niche imagery, that there should be a clear relationship between the paintings and the statuary. The logical connection, one might suppose, is analogous to that which we discussed for Vimalakirti and Manjusri, where the "subject" of the debate (in this case the contest) is in a sense that which the niche statues embody. In the case of both "contests" a series of miracles occurs that reflects the intervention of the Buddhist divinities. I am not sure whether the niche paintings in cave 335 successfully convey this connection; if that perception is accurate, perhaps that helps to explain why the experiment seems not to have been repeated within a niche. In some ways, placing the subject on the west wall of a cave containing a U-shaped altar in front backed by an architectural screen may have seemed to make more sense, even if thereby the central images of the scene would have been invisible to anyone upon first entering the cave.

XII. The free-standing U-shaped altar caves

Of particular interest is the issue of the relationship between the caves with the truncatedpyramid niches and a series of dramatic large caves built beginning around 850, all of which contain free-standing U-shaped altars with architectural screens in back of the main image on their west side. These caves include nos. 16 (ca. 850), 196 (893-894), 55 (894), 146 (907-923), 98 (914-925), 61 (945-951) 152 (Song era, 960-1035) [Cave 100 is related in time and spirit to some of these, but has a niche, not the U-shaped altar]. Perhaps somewhat oddly, given the overwhelming visual impression these caves can impart, there seems to have been little effort to analyze their treatment of space and its relationship to the iconography. Cave 16 generally becomes no more than an appendage to the famous cave 17 located in its corridor. Cave 196 contains an impressive and justly celebrated group of statues [see Rhie 1977] and to many is as interesting for its original Tang beams in the antechamber as for what is inside the main chamber. Cave 61 is famous for its depiction of Mt. Wutai across the whole of its back wall, even though curiously enough the screen of the altar blocks from view the central third of that painting [see Wong]. While the proposition may seem a bit odd, I would venture to suggest that these large caves may even derive their inspiration in part from the truncated-pyramid niches, disproportionate as the two architectural forms are in size and visual impact. In any event, the two seem to have developed almost simultaneously some interesting features that offer significant parallels.

I believe that the most striking feature of this late group of U-shaped-altar caves is the fact that they thrust the worshipper into the real presence of the Buddhist deities. Both he and they are encompassed in a cosmic space that is delineated by a few specifically chosen, large architectural and iconographic features. The truncated-pyramid niches probably influenced the conception of these large caves in part for what they offered and in part for what their very design prevented them from offering. What they represent is really a closing off of the cosmos into a niche that is somewhat remote from the worshipper and to a large degree is self-contained. Given the small size of the niches and some of their other features I have discussed, they could not really provide for a worshipper the sense that he was genuinely present in the cosmos inhabited by the icon/statues. One might argue that this was a logical development of the trends in respect to delineating icons from their prototypes; certainly the elements of design in the caves that came to dominate until late Tang reinforced such trends. If one thinks about those niches, they represent something that artistically and conceptually seems far removed from the situation in the early Mogao caves with their pillars, abundant sculpted detail, and/or integrated programs connecting niche and ceiling. A cutaway diagram of one of these truncated pyramid niche caves [Whitfield, p. 322, cave 112] reveals that the niche creates a cosmic replica of the larger space in parallel to it, rather than integrated with it in a unified whole.

This is not to say that alternative models were not around and very much alive. We know that the pre-Tang caves continued to be used. Surely a Hong Bian (who presided over the initiation of cave 16) would have appreciated the visual impact of a cave such as no. 427. There the guardian statuary in the antechamber protects the cosmos within that encompasses the total space of the main chamber. Within that main chamber, supra-human statues of the deities surround the worshipper on three sides. While on stylistic grounds modern art historians might characterize the statues of cave 427 and its contemporaries as stiff or remote, in fact in the presence of those statues the viewer might feel himself truly in a heavenly paradise dominated by the deities. Even many of the niche caves could have reinforced this awareness, in the cases where they placed statuary in the corners of the west wall outside the niche. A cave such as 282 in fact combined such an arrangement with sculpture triads along the north and south walls [see plan, DMK, II, p. 198, fig. 34]. One can imagine that the two giant Buddha caves, nos. 96 and 130, would have contributed to an awareness of the desirability of projecting the sculpture back into the same space as the believer. The two striking caves depicting the Parinirvana [nos. 148 [776] and 158 [839]; see diagrams, DMK, II, p. 195, figs. 22, 23] also could have been an inspiration. It is difficult in any photographs to capture awe inspired by, for example, cave 148, starting with its imposing statuary in the antechamber and then the huge reclining buddha in a transverse nave with high niches at either end. To enter it is truly to enter another world.

Thus by the middle of the 9th century, when Hong Bian and his successors were confronted with challenges of creating new caves that would be worthy of their subjects and also, perhaps, convey to outsiders the donors' standing and political loyalties, a number of precedents and inspirations were available. Important commemorations may have been seen to require truly monumental art, and there certainly were examples which could provide a sense of the emotional impact of the presence of larger-than-life images in three-dimensional space. It was then a relatively simple matter to take a space containing a U-shaped altar dominated by its sculpted images placed under a canopy of its own (we might thus characterize the niches) and translate it into a cave of vast proportions, where the altar was moved out from the wall and of necessity a screen was added to accomodate the essential imagery behind the central Buddha figure. This indeed then was the kind of spatial arrangement where the U-shaped altar could accomodate the believer and offer him admission into the space, as Huie suggested in her somewhat misfocussed discussion of cave 335.

That the niches in question and the large caves are connected might be argued with reference to the wall paintings too, since one can make the case that a feature of both structures is the separation of much of the painted iconography from the architectural and sculptural features. Visual juxtapositions of certain painted images with the sculptures apparently was still important, but with rare exceptions, we are not dealing with the same kind of effort to integrate two-dimensional and three-dimensional space into a continuum. It is almost as if there are concentric "spheres," the outer one characterized by elaborate surface decoration, and the inner one containing the altar and sculpture.

In analyzing the conceptualization of the space in these large caves, we need to consider carefully where the worshipper would have been located *vis-à-vis* the altar and statuary. We might suggest that in the first instance, the separation of the altars from the walls was not intended to provide an exterior path for circumambulation analogous to that in the pillar caves. This is not to say, of course, that circumambulation rituals did not take place (see below). However, the key viewpoints in these caves were from the entrance corridor, where its arch framed the central image against its screen, set out against a background darkened by shadows, and from the point right at the front of the altar, with its U-shaped wings projecting on either side of the worshipper. It seems likely that prayer also would have taken place up on the altar closer to the buddha image at its back--in some of Pelliot's photos, for example, we can see that portable altars had been placed on the altar directly in front of the images.

Thanks to their relatively good preservation of the sculpture, two of these caves convey particularly well the visual impression of how they must have been conceived. One is cave 196, where the worshipper at the front of the altar has huge guardian statues towering on either side of him [plan, DMK, IV, p. 236]. A line following the heads of the statues slopes down on each side to the bodhisattva and disciple and then rises again to the head of the central buddha image — all this, one imagines, carefully designed to emphasize both presence and hierarchy and to convey at the same time a sense of even more grandiose perspective. In cave 55, the arrangement is different, as the altar

platform contains three major buddha figures, one in the center and one at each side, with their accompanying disciples, guardians and bodhisattvas [DMK, V, pl. 87]. Since all the statuary is no longer in place, we cannot be certain of the exact iconography beyond the buddhas, all three of which have pendant legs and probably represent the Buddhas of the Past, Present and Future. The images that would have been closest to the worshipper at the east end of the platform are now missing, although one might reasonably posit that they, as in cave 196, were guardian deities.

The screens behind the central figures in these caves generally had a sculpted backdrop for the central buddha figure, consisting of a throne back and/or a mandorla, angled out from the screen in a fashion analogous to the sculpted mandorlas of the pre-Tang caves. Depending on its width, the screen might depict a flanking pair of bodhisattvas (cave 55) or an array of bodhisattvas (cave 61) [DMK, V, pl. 52]. The tops of the screens bulge out to the sides, providing space for a central canopy flanked by the branches of jeweled trees. Thus what we see on the screens is the core of the imagery that we find in most traditional preaching scenes and many of the Tang-era niches. Here the three dimensionality of the representation is emphasized precisely because the screen stands out from the west wall, catches the light, and is framed by shadow [Whitfield, pl. 142 gives a sense of this effect for cave 61, where, unfortunately, the buddha image is missing; DMK, V, pl. 87 (showing cave 55) provides exactly the opposite of natural lighting, with the back wall illuminated but the screen in front in shadow.]

What seems to be unique to cave 55 in this group is the way in which the artists connected the top of the screen to the imagery above on the west slope of the truncated pyramid ceiling. There one sees a heavenly paradise, positioned directly on top of the canopy. What we appear to have then is a combined two- and three-dimensional representation of the Paradise of Maitreya. The central statue is the lower part of a representation of the Paradise of Maitreya such as we see in the early Tang cave 329 on the north wall [DMK, III, pl. 45]. In the painted depiction, the image closer to the foreground represents Maitreya in the Ketumati paradise, while that above and in the background is the image of Maitreya in the Tushita heaven. Cave 55 then represents an innovative but perfectly logical visual realization of what we have traced in earlier caves where the artists experimented with different ways of depicting the Tushita heaven in

relationship to the buddha image below it. That cave 55 is a "Maitreya cave" seems to be confirmed by the similar portrayal of all the major sculpted buddha figures with pendant legs. In this cave then, the worshipper could be physically present in Maitreya's paradise in a way that would not quite have been possible in spatial and visual terms in any of the earlier caves.

Cave 61 is another example of how the artists of this period might create a place of worship within which the believer could share a physical space devoted principally to a single deity. In this case, the central figure appears to have been Manjusri [Whitfield, p. 335], and the dedication of the cave to Manjusri is reinforced by the fact that the central icon was shown against the backdrop of a wall devoted to an imposing depiction of Mt. Wutai, the focus of Manjusri worship in China [see Wong]. Presumably the juxtaposition of the painting and the sculpture was intended to convey the worshipper in cave 61 to Mt. Wutai and encourage visualization of the physical presence of the deity in the place devoted to his worship. We have seen earlier in cave 159 how the image of the mountain was placed on "screens" below a standard depiction of Manjusri, an arrangement that could not have had the overwhelming visual impact of the presentation in cave 61.

The ceilings of this large group of U-shaped-altar caves also display important common features. In the corners are "squinches" each with a figure of one of the guardians of the four corners of the universe who reside on Mt. Sumeru. While these squinches have been considered by at least one modern scholar to be awkward oddities of design, they noneless were often repeated (in addition to these caves, they are found in the architecturally and temporally related cave 100 and in the later cave 465). They are placed literally at the corners of a huge cosmic space in a way that would reinforce in the worshipper the impression he was in the center of that cosmos. In several cases where key features of the guardian deities and the squinches framing them are highlighted in gold, even in relatively dim light a sense of their real, living presence would have been felt, reinforcing or echoing the presence of additional guardian deities on either side of the worshipper at the end of the platform.

The other feature of the ceilings which strikes us is the extraordinary size of the central canopy, a feeling created both by the architecture and the painting. In describing cave 146, Huie puts the matter this way:

The central square has expanded to cover almost half of the ceiling; it is no longer the crowning glory but a ponderous canopy heavy with fringe, tassels, floral rinceaus, Greek fret-like motifs as well as geometric patterns all confined to their respective receding squares stacked one within the next. At the top a huge stylized rosette enclosing a circular dragon hovers heavily....[pp. 581-582]

A curious perception indeed. In fact, what the architects of this group of caves have achieved is a canopy that visually arches over the whole altar and along with the guardians at the corners suggests that all within — first and foremost the sculpted figures and the worshipper who would experience this scene — is in sacred, cosmic space,. This is precisely the kind of effect we saw in a few early caves (e.g., no. 285) and again in some of the niches (e.g., cave 66), but unlike in the case of the latter, here the space includes everything. Everything means, *inter alia*, all the multiple paradises depicted in the panels of the walls and in some cases (notably cave 55) on the ceiling as well. [Fraser suggests that the central decorative elements of the late Tang canopy ceilings do seem to foster the illusion of a "beam structure," which would emphasize the three dimensional aspects and connect them with the much earlier treatments of ceilings as entrances into cosmic space (Fraser 1996b, p. 670)].

While I cannot undertake a full analysis of the matter, I wish to conclude this section with some observations on what the worshipper would or would not readily see among the wall paintings in these caves. It seems to me that a heightened appreciation of the skill of the late Tang and Song period artists at Mogao has to include an effort to understand how they may have consciously considered sight lines from particular vantage points that would highlight selected aspects of the two-dimensional imagery in its relationship to the three dimensional. Of particular interest are caves 55 and 196, since in both cases the depiction that covers the whole of the west wall is the "Subjugation of Demons," that is, the struggle between Sariputra and Raudraksha. We cannot be certain that the current placement of the statues flanking the central buddha in these caves is original, for in fact there is an asymmetrical arrangement in both cases and

statues are missing. In cave 55, to the central buddha's right is a guardian, separated by a space from the altar screen; to the buddha's left but overlapping with the screen is one of the disciples. Given this configuration, a worshipper standing at the east edge of the altar would see the main figures of Sariputra and Raudraksha on the back wall even in natural light. In analogous fashion in cave 196, the panorama seen from the center of the east edge of the altar includes a space, the disciple Ananda overlapping with the screen, the screen with the main image, and then Kasyapa separated by a space from the screen. Given this configuration, Sariputra on the back wall is visible, but Raudraksha is not, since a statue stands directly in the line of sight. We can imagine various explanations here — most likely, the large size and recognizable iconography of those figures must be conscious devices to ensure that they would be visible with natural light. Seeing the main protagonists provides a "shorthand" for visualization of the rest of the scene and also allows the oppositional figures to frame and focus attention on the central Buddha figure (cf. cave 335 and the standard west-wall depictions of Vimalakirti/Manjusri discussed above). An alternative in the case of cave 196 is that there was a conscious intention for only the good Sariputra to be visible, and the evil Raudraksha concealed behind another of Buddha's disciples.

Both in these two caves and in the case of cave 61 with its famous west wall depiction of Mt. Wutai, we can see how architecture, sculpture and painting combine in a very different treatment of spatial relationships from what we find in the niche caves. In the latter, the artists were confronted with tasks involving the framing and definition of space that retreats from the viewer. The solutions they adopted might emphasize the visual and conceptual connection of the total space within the cave and might create the illusion of ways that the space opened out to the infinity of the cosmos. At the same time (in fact, it seems, chronologically a bit later), the artists of some niche caves might seem to be stressing that the niche space with its sculptures was separate. In the caves with the free-standing U-shaped altars, the paintings may call attention to or reinforce "message" of the sculptures, but always in a way that emphasizes their projection toward the viewer and the space in which he is standing.

What we see in the niche caves containing the "panel" or screen paintings on their back walls reinforces the sense that the issue of the relationship between the "background paintings" and sculpture is a subject worth further investigation. I have indicated how at least in their early incarnations, the screens seem to have been painted in their entirety and then simply covered by most of the sculpture. Another, presumably later variant can be seen in a cave such as no. 79 (dated 962), where the artists have not even bothered to paint the whole of the screens, either because they anticipated where the statues would be placed or because they painting was done when the statues were already installed. While the iconography here needs more careful analysis, at least in one case on the right side of the niche, a small painted image of a worshipper on the lower part of the screen faces toward the adjoining statue and can be construed visually not as worshipping within a painted composition on the wall but rather worshipping the deity represented physically by the statue. In other words, the two- and three-dimensional representations are consciously connected, but with an effect very different from what we saw in the earlier Tang niches where ranks of painted bodhisattvas are part of the group surrounding the central buddha. The illusory effect in the case of the Cave 79 niche is perhaps analogous to what a worshipper in one of the late U-shaped altar caves would have felt — that is of the overwhelming presence of the larger-than-life sculpted images and thus the relative insignificance of the worshipper in their midst. Within the niche then would be contained spatial analogy to what appears in the caves with the U-shaped central altars, where the emphasis is on focussing into the three-dimensional space and its icons rather than outward from it.

It is possible that a case such as the niche of cave 79 should also be examined in conjunction with the later iconography of the sixteen arhats (cave 97), where in each panel a small attendant figure is to be seen with the disproportionately large figure of the arhat. This is visually analogous to a statue against the backdrop of a painted screen, within the frame of which is an associated small figure worshipping the statue or at least in attendance on it. Granted, one can easily imagine a range of earlier examples juxtaposing worshippers with larger images of preaching buddhas and their attendants--in some cases small figures in the foreground of paradise scenes; in other cases small donor or memorial figures below or within the space of painted panels [e.g., cave 329; Whitfield, p.308; pl. 307]. These, however, involve a matter of vertical registers or

virtual three-dimensional space (depicted in two dimensions), rather than a combination of two- and three-dimensional images.

It is likely that these specific examples of how verneration of holy figures might have been represented in visual and spatial terms needs to be seen within a broader context, incorporating material such as that provided by Wu Hung and Ning Qiang with regard to the early depictions of miraculous icons such as the Fanhe statue and the Khotanese images [Wu 1996; Ning 1998a]. One can think of a number of examples of how such depictions seem to be connected in interesting ways with innovative artistic approaches to the treatment of spatial relationships and problems of viewing the caves. I have already mentioned the issue of the truncated-pyramid niche architecture and its display of such icons. The depictions of the Fanhe statue include an attempt in the early Tang to create a very realistic sculpted mountain setting in the niche [cave 203--photo, Wu 1996, fig. 5] and in cave 323 an iconographic program where it is at least possible that the central niche had a depiction of the famous statue, to be viewed in conjunction with the painted scenes regarding the miraculous icons on the north and south walls. As Wu Hung suggests, these early representations seem to suggest a certain ambiguity regarding the issue of whether the central image represented the icon or its prototype, the Buddha himself. The resolution of any such ambiguity, his argument runs, can be seen in caves such as 231 and 237 and in several of the large caves with the U-shaped altar and screen. In the latter, the image of the Fanhe statue is placed on the back of the screen [e.g., cave 55, DMK, V, pl. 88; other examples are caves 16, 61, 98], as a kind of "reflection" of the sculpted image on the front. Thus the two are not to be confused, and clearly the main object of veneration is the "real" Buddha, not its reflection. One might suggest that the process illustrated here is connected with the developments I have been discussing regarding the ways in which the niche imagery seemed to retreat from the main space of the cave (thus making the statues more icons than "real" embodiments of the prototypes). What is then involved in the emergence of the late caves is a very significant attempt to resolve the larger conceptual issue of "icon vs. reality," of which the example of the Fanhe icon is only one very specific expression.

Apart from such "cosmic" considerations, there are many other indications that the artists beginning in the middle Tang were exercising a great deal of imagination and were, among other things, particularly sensitive to issues of spatial relationships and visual devices. I have already noted examples of their use of gold to highlight features in the painting and sculpture that would have created a shimmering effect of points of light around the entire interior of many caves. Such techniques had been employed earlier, e.g., in Sui cave 420, where gold highlighted the faces and quite noticeably the Parinirvana scene in the otherwise perhaps indecipherable and complex narrative on the ceiling, and in cave 397, where the thousand buddha figures on the walls have gold faces. The depictions of bodhisattvas in elaborate, bejeweled garb opened many opportunities for the use of gold leaf, as we can see in caves ranging from the early Tang no. 57 to the middle Tang no. 112. The abundant use of gold in the caves of the mid-9th century on could focus attention on key elements of the iconographic scheme (notably the guardian figures in the squinches — e.g., cave 98) that would emphasize the idea of cosmic space in the cave as a whole. I was particularly struck by the visual impact of cave 16, whose redoraction in the early 11th century included the placing of gold bosses at the intersections of the grid pattern on the ceiling and extensive use of gold to outline the haloes and canopies in the thousand buddha motif on the walls.

Presumably the gold was employed with multiple purposes in mind. That is, it was used both to highlight aspects of the caves connected with their religious content; at the same time it was used to honor and focus attention on the secular donors or dedicatees whose depictions loom so large especially in the caves of that period. For example, in cave 156, the famous hunting scene of Zhang Yichao and his consort was replete with gold highlights, even to the spokes on the wheels of the wagons [Whitfield, pls. 137, 138, 308, the last of which shows very clearly how the gold has been gouged off the wall]. The lady donors of the Cao clan depicted in cave 61 were resplendant in what we assume was gilded jewelry [Whitfield, pl. 145]; at least one image of what we assume is the Xi Xia ruler had the coiled dragon roundels of his robe rendered in gold [cf. Whitfield, pl. 158 for cave 409, although I believe that the example I noted was in a different cave].

The popular visual devices of the period beginning in the middle Tang also included many molded decorative elements. Occasionally stucco roundels were used for special effects, for example to highlight in the niches in cave 148 the bodhisattva images

associated with the sun and moon [DMK, IV, pl. 33]. I have already noted the sculpted treatment of the daises and pedestals, where the effects are decorative but perhaps with a deeper intent of emphasizing visually that which is symbolic of the honor due those seated or standing on them. That is, we are reminded of "royal platform" par excellence. In a lot of the caves redecorated during the Five Dynasties (e.g., nos. 263, 265), a frequent device was the use of stucco applique tassel ends for the fringes around the ceilings. Caves 61 [DMK, V, pl.52], 98 and others have molded squares forming a frieze on the upper walls of the corridors, in which might be either lotuses or buddha figures, and cave 16 has an elegantly sculpted central ceiling panel, with a dragon that resembles a lacquered carving. Finally, I would note another decorative device used extensively during the Yuan period but originating earlier. This was to highlight features such as jewelry or tiaras on bodhisattvas, donors or other images by a slightly raised applique. The effect is subtle and easily missed now because it is dark, whereas originally it may have been reflective or otherwise colored so as to stand out. We can see examples of this on the bodhisattvas of the entrance corridor to cave 16, the paintings of the guardian kings in the anteroom of cave 100, and the famous images of the Water Moon Guanyin in Yulin cave 3. While all of the enumerated molded devices may have been principally decorative--part of an effort to emphasize a sense of elegance and richness--at the same time they presumably would have been especially highlighted by shadow effects, in a way analogous to what I discussed for the pre-Sui caves. Thus they would have contributed to the effects produced by gold leaf in helping to make the walls of the caves and their images come alive in some kind of integrated impression.

An essential part of that impression obviously would have been, as it is now, the stylistically uniform carpet of sutra/paradise depictions on walls and, in many instances, ceilings. These paintings included both central panels and detailed "narrative" examples that might be arranged in or around the central ones or in screen or panel paintings below them. The issue of whether or how these panels might have been "seen" or "read" still merits a discussion that goes well beyond what I can attempt here. Even in relatively small caves, it is likely that as the sutra panels multiplied, most distinctions between them would have been lost to the eye of the beholder. Granted, it is usually possible to identify which sutra is being illustrated in a panel by looking at the central lower part of the

depiction, where often there is a characteristic iconography [e.g., the tonsure scenes in the Maitreya Paradise — Whitfield, pl. 318]. However, it seems that increasingly generic elements came to be used to illustrate more than one of the "narratives." One might suggest, as does Whitfield, that this displays a lack of imagination for dealing with the task of illustrating increasing numbers of sutras. Alternatively, one might emphasize that clear delineation of them was simply not important, for they were less and less likely to be "read" carefully. That they were there on the walls and ceilings was the only thing that really mattered. Granted, the screens along the bottoms of the walls even in the large caves such as 158 or 98 could have been seen. In cave 61, there is a "complete" scroll of them encompassing the stages in the existence of the Buddha,; the panels start right after the end of the donor portraits midway on the south wall and move around in sequence clockwise to the west wall and up to the middle of the north wall. This might suggest that circumambulation was intended to take place in these large caves with the U-shaped altars and that along the way the screens might have been "read". However, the rest of the sutra imagery on the walls (and, in the case of a cave such as no. 55, on the ceiling) would have been largely a blur. In these paintings, the too numerous haloed ranks of holy figures overwhelm the architectural setting and move the images away from the three-dimensionality the early Tang artists had perfected and back in the direction of twodimensionality [see, for example, DMK, V, pls. 72, 73]. In effect, the walls were being hung with these panels in the same way that temples were hung with illustrated banners in the first instance simply as a mark of veneration and presumably as a way of accumulating merit for the artists and donors. There is an analogy here with what happens to the mural painting in some Russian Orthodox churches, whereby increasingly by the early fifteenth century the formerly carefully delineated monumental images give way to a crowded carpeting of the surface.

Yet not all the sutra/paradise paintings display such "monotonous" convention. One cannot but be impressed with the way that, especially on the slopes of the ceilings, the artists would attempt to design different configurations precisely, it would seem, to avoid uniformity. Cave 9 is a particularly good illustration of this, where each slope places the "narrative" scenes very differently, showing a sensitivity to what we might term grace and proportion and focussing the eye in a different way for each [see DMK, IV, pl. 180, which unfortunately cuts off the bottom of each panel]. For example, on the south slope, there is a very skillfully executed focus on Mt. Sumeru for the Lankavatara Sutra and on the adjoining slope the pavilion with Sakyamuni and Prabhutaratna readily identifies the Lotus Sutra. There are shared iconographic conventions for these ceiling depictions in several caves beginning in the second half of the 9th century [another example is cave 85, where the equivalent pictures to those in cave 9 for the indcated sutras are DMK, IV, pls. 154, 156]. Yet there was room for variation, and the compositional skill of the artists in designing for these spaces is abundantly evident. These are not mere repetitive images that could be outlined with a stencil.

In summary then, a study of some of the major caves of the late Tang and beyond should inspire us to look more closely at their artistic conceptions and execution. We should not equate certain features such as repetitive stencilled thousand buddha patterns [regarding this technique, see Fraser 1996a, 1996b] or a lack of refined line drawing with something like a total absence of artistic imagination and skill. Styles changed; presumably what was important for the artists and their patrons also changed. Some of these later caves are arguably among the most innovative, carefully thought out and visually striking of all the Mogao caves. Furthermore, the genealogy of the elements which their artists brought together in their design can be traced back at Mogao to many of the great caves of earlier eras whose artistic principles indeed may have been very different.

XIII. Conclusion

I have argued here that there are important patterns in the changing perceptions of ritual and cosmic space in the caves. At certain times, it seems as though the visual devices employed to convey a sense of cosmic unity were more successful than at others. Perhaps what we should say, however, is that the artistic devices employed were different and changed in very interesting, interconnected ways over a period of some six centuries. They all were undoubtedly aimed at a common goal; arguably for the contemporaries they all achieved it. One has the sense that the artists of the caves made adjustments along the way which may in fact have been addressed at enhancing the way that visual elements in the caves contributed to a sense of the believer's relationship to a cosmos where non-duality prevailed and where all might achieve buddhahood. One of the earliest caves to have a fully developed set of sutra panels in the late Tang style that we sometimes lament is no. 156, completed in 865 and dedicated to Zhang Huaishen in honor of his uncle Zhang Yichao, of the prominent local ruling family [DMK, IV, pls. 131, 132, 139]. A contemporary document describes the building of the cave and its contents:

Within the main niche there was modelled an image of Sakyamuni and a group of his attendants; on the four walls there were depicted sixteen groups of sutra illustrations, which showed every variation, demonstrating the many gates of the Buddha's teaching. The portrayal was wonderful, with no difference from the Threefold Body. Inside the "ten foot" chamber, all the ten directions are transformed; within a single cave, it is just as though the Three Worlds [are revealed]. [quoted by Whitfield, p. 327, from Pelliot document No. 2762]

Cave 156 is an example which I might have used to suggest that perhaps the articulation of cosmic space in the caves was not being successfully achieved in artistic terms. However, clearly in the minds of the creators and contemporaries, the cave contained within it the universe, as embodied in each of the sutra panels and in their collective impression of commonality under the dome of heaven of the ceiling. I think it is significant that this statement was written precisely at the time when the first of the great free-standing U-shaped altar caves had been constructed. Perhaps by extension then we can use it as a statement of the way in which their creators envisaged a cosmic space within the caves where, as much or even more so than centuries earlier, key visual devices helped to unify the whole.

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APPENDIX Chronology of the Mogao Caves

This chronology is based in the first instance on the date of the initial construction and decoration of each of the Mogao Caves. Where there is relatively precise information about later re-decoration or rededication, I include that too, delineating the later datings with parentheses. I have undertaken this compilation in the hope of providing a more precise time-line than that supplied by the Dunhuang Academy's scheme according to dynastic dates; however, where the only information is that provided by the Academy or where the Academy's dating differs significantly from that found in other sources, I supply that information.

My "precise" dates derive principally from two sources. The first is the series of articles and lectures by Prof. Marylin Rhie, where, in the first instance, her conclusions are based on a careful analysis of sculpture. Where she provides the same dates for more than one cave, the order nonetheless reflects her perception of their relative chronology. As she recognizes, the date of the sculpture may not also be the date of the murals, even in instances where we are not dealing with obviously later re-decoration; furthermore, her observations on sculpture do not always coincide with dates provided in inscriptions. Nonetheless, after some initial skepticism, I now tend to agree with her that the sculpture, where original, may provide the best evidence for dating a great many of the undated caves.

In her dissertation, Baker has criticized Rhie's approach as being too narrowly based and not taking into account considerations other than the sculpture. However, with rare exception, her own datings, which in the first instance rely on stylistic analysis of the painting but do also examine architecture and sculpture, agree with those of Rhie. Occasionally Rhie's observations in her articles differ from those presented in lecture, in part during our *de visu* examination of the caves. I assume that her most recent observations are the most authoritative, since the articles often were written before she had the opportunity for *in situ* examination of the sculpture; furthermore, it is clear from her lectures that sculpture is not the only feature she brings to bear for dating purposes.

My second source for precise dates is the tabulation of dated inscriptions appended to Dr. Ma De's book [pp. 362-364] on the history of the construction of the caves. Unfortunately I cannot read the explanatory details, but in most cases I believe I have managed to establish which of these inscriptions indicates a later renovation or rededication.

The Dunhuang Academy dating is that presented in the tabulation appended to the collection of Duan Wenjie's essays in English (referred to as Duan). It is worth keeping in mind, as Dr. Ma indicates, that caves adjoining one another in certain sections of the cliffs from the early centuries seem to have been constructed at about the same time. Hence many of the Academy's numbers that are consecutive, as indicated below, probably are for caves of approximately the same date, even within a range narrower than that of the dynasty under which they are grouped. Careful stylistic analysis would probably allow some more precise sub-groupings. In some cases clearly the Academy has been misled by the later re-painting or reconstruction of particular caves; in a tabulation arranged by date of first constuction they must be placed earlier. Since virtually all of the caves were at least partially re-decorated in the Song, Xi Xia or Yuan periods (generally this can be seen in the anterooms and corridors), I have included such information primarily when we can provide a firm date from an inscription or dedicatory portrait.

At the end of the comprehensive list, I provide a separate list culled from the dissertation by Huie. She examined carefully the information in print prior to ca. 1980, notes varying opinions regarding dating, and adds observation based on her stylistic analysis of information in the photographs of the caves. Since her material is now somewhat dated, I tend to prefer the sources discussed above where there are substantial discrepancies. Nonetheless, her discussion is useful for arranging in relative chronological order or at least relatively-ordered groups several of the caves that are given more general dates by other sources.

Cave No. Date Remarks/source

268	ca. 420	Rhie
272	420s	Rhie
275	mid-430s	Rhie
[Also Sixteen Kingd	oms, 366-439:	
267, 2	269, 270, 271	Duan]
257 2r	nd half 5th c.	Rhie
260 2n	nd half 5th c.	Rhie
259	450s (ca. 453)	Rhie; Huie: late 9th c.(??)
254	ca. 470s	Rhie
[Also Northern Wei		
	263, 265, 487	Duan; note that 263 and 265 both had structural renovation during Xi Xia and 5 Dynasties periods, respectively.]
249	535-545	Ho 1985, citing Academy
285	538-539	Ma
[Also Western Wei,	535-556:	
	3, 286, 288, 431,	432,
435, 437		Duan]
300 (?)	579	Ma
428	565-576	
442	563-580	Ma
[Also Northern Zhou		201 (20
	1, 297, 298, 299,	
438, 439, 440), 461	Duan; for 290 Huie cites an inscription of 520-524,
		but I find no other evidence to support that early a
296 late N	7	date.] Baker places just prior to po 202
412 Ide N	I. Zhou(?) 580s	Baker places just prior to no. 302 Rhie
412 427	580s	Rhie, who seems alone in dating this early; cf.
427	5008	Baker calls it "Middle Sui", following nos. 302,
		303, 305, 419, 420; Huie, citing Akiyama and
		Swann: ca. 600.
302	584	Ma; Baker, inscr., 593
305	584-585	Ma; Baker, inscr., 594
	time of 302	Both 302 and 303 have unique circular pillar; From
(505 4004		location in cliff and stylistic considerations, 302, 303, 305 of approx. same date, but Baker sees 303 stylistically slightly later than other two.
419	590s	Rhie
420	590s	Rhie; Baker sees 419 and 420 created as pair at essentially the same time.
417	600-604	Rhie
423, 404, 56, 396	600-606	Rhie; Huie seems to place 404 in Early Tang.
401 early	600s, 606-617	Rhie; painted ca. 630

[also Sui, 581-618:

	Jul, 301-010.	
	56, 59, 62-64, 206, 253, 255,	262, 266, 274, 276-280, 284, 292, 293, 295, 304,
	311-317, 388, 389, 393, 394,	397, 398, 402, 403, 405-407, 410, 411, 413, 414,
	416 418 421 422 424-426	430, 433, 434, 436, 451, 453, 455, 485Duan]
[409	also Sui	Whitfield; in Duan, dated Xi Xia, time of restor.]
-		Rhie
392	ca. 610, 612-614	
244	ca. 610(609)-612	Rhie; Baker places with 390 but after 282; Huie
		after 390
262	589-613	Ho, p. 188
282	613	Ma; Baker: late-Sui/Early Tang transition, after
276		but before 390
380	610-617	Rhie
276	610-617	Rhie; Huie groups with 390, 244, 314.
383	610-617	Rhie
398	610-617	Rhie
390	ca. 624	Rhie; Ma: 618-624; Baker suggests painting argues
		for early end of this range.
379	620s	Rhie; inscr. 379, Ma
375	620s	Rhie
381	620s	Rhie
373	mid-620s	Rhie; cf. Academy, ca. 630
57	ca. 630, ca. 627-630	Rhie; renov. 894; Huie groups with no. 209.
401	ptgs. ca. 630	Rhie
322	630-635/40	Rhie
207	ca. 640	Rhie
220	642	Ma; re-painted 857, renov. 925
(431	648	Ma, renov.)
203	640-650	Rhie; cf. Wu 1996: late 7th-early 8th c.; renov. 962
386	675	Ma; Rhie: ca. 700, ca. 710, ptg. ca. 800.
331	670s	Rhie; Ma: 698
334	ca. 680	Rhie; Huie, second quarter 8th c., before 740-50.
335	686(-702)	Ma; Huie suggests painting may be earlier than 686.
328	latter half 680s	Rhie; Huie, early 8th c.
323 (?) 689	Ma; cf. Whitfield: 705-713; Duan: High Tang;
[×]	, ,	Huie: right after first quarter 8th c
96	695	Ma; renov. 966, 1927-1934
123	697	Ma; anteroom renovated 953
332	698	Ma; Rhie: ca. 700-710; Huie, earlier?
laiso e		1, 77, 202, 204, 205 (?see below), 209-213, 242,
		e places between 205, 148), 329, 333, 338-342, 371,
	372, 392, 448Duan]	
172	690-700	Rhie; Whitfield: 742-755; Huie, appar. mid-8th c.
317 (t <u>y</u>	ypo?=217) 705-706	Ma; cf. DMK, III, p. 162
217	710-720	Rhie; Huie: 725, plus or minus.
23	ca. 720	Rhie

41	726	Ma
45	ca. 730; ptg. ca. 750	Rhie
(288	as no. 45	Whitfield suggests 288, built in W. Wei, was
		refurbished at time no. 45 built. It is right above no.
103	725-735	45.) Rhie; probably between nos. 45, 46
46	ca. 735	Rhie
66	ca. 730s	Rhie; "right after" no. 45
171	730-740	Rhie; not clear where it fits among nos. 45-66
130	721-746	Ma; renov. 1002-1004; cf. Rhie, ca. 690, but, as
		cited by Huie, ca. 740s.
33	before 740-750	Huie
205	ca. 740	Rhie; Ma: inscr. 790; cf. Duan: Early Tang; Huie,
		begun early Tang but painted in mid-8th c. and
		later.
320	ca. or after 740	Rhie
180	748	Ма
185	749	Ma
(383	sculpt. 735-755	Rhie; cave cut in Sui)
79	735-755	Rhie; Whitfield: 763-780
194	760s	Rhie; Whitfield: 756-780
148	776	DMK, III, p. 162; Ma: 767 (probably typo); also
		inscription from 890
91	777	inscr., ?
[also High T	Tang, 705-780:	
26, 2	28, 31, 32, 34, 39, 42, 44	, 47-52, 74, 75, 80, 101, 109, 113, 115-117, 119-125,
129,	162, 164-166, 170, 175,	, 176, 182, 199, 208, 214-216, 218, 219, 225, 264,
319,	323, 374, 384, 387, 444	-446, 458, 460, 482, 484, 490Duan]
126	after 782	inscr. (?); cf. Duan: High Tang, before 781.
201	790	Ma
(205	790	Ma; date of renovation)
(379	790	Ma; date of renovation)
99	early 800s	Rhie; cf. Duan: 5 Dynasties, 907-923
(130	817	Ma; renovation)
159	820-830	Rhie; Whitfield: shortly after 824;
365	832-834	Whitfield; Hongbian dedicated cave to
		Bhaisajyaguru in that pd.
158	839	Ma; ca. 800, Rhie
231	839	Ma;
	e Tang, 781-847:	
		3-155, 157, 179, 186, 188, 191, 197, 200, 202, 222,
		366, 369, 370, 447, 469, 471, 472, 474, 475, 478,
479-	,	oosely groups various caves into period beginning
		Tibetan occupation (847), among them some dated
1 < 15	•	Aiddle Tang: 159, 158, 231, 236, 237, 360.]
16, 17	850	Ma; no. 16 re-decorated in early 11th century

(220	857	Ma; renovation)	
156	865	Ma	
85	862-867	Ma	
192	867	Ma	
12	869	Ma	
107	871	Ma	
94	876-888	Ma; Huie: 867-872	
54	881	Ma	
256	889	Ma; cf. Duan, Song Dynasty, 960-1035	
(148	890	Ma; renovation)	
9	892	Ma	
30	892	Ma; cf. Duan, Xi Xia, 1036-1226	
196	893-894	Ma	
55	894	Ma; renov. 962; cf. Duan, Song, 960-1035.	
(56	894	Ma, renov.; built in Sui)	
(57 (?)	894	Ma; Duan: early Tang; renov. late Tang.)	
198 (?)	894	Ma	
97	896	Ma; Duan: Xi Xia, 1036-1226	
138	900-905	Ma	
(44	901	Ma, renov.; Duan: built in High Tang, 705-780	
468	907	Ma; cf. Duan: Middle Tang, 781-847	
193 89	3-910	Huie	
[Also Late Tang, 848	-906:		
- 0		02, 104-106, 111, 114, 127, 128, 132, 139, 141, 144,	
		168, 173, 177, 181, 183, 184, 190, 195, 221,	
		459, 470, 473Duan]	
147	911	Ma	
98	914-925	Ma; cave opened 924 or 925; ptg. of Khotan king	
		936; Whitfield: 920-921; Huie: 938.	
84	919	Ma; cf. Duan: Xi Xia, 1036-1226	
(401[=402?]	922	Ma, renov.; built during Sui; cf. Huie)	
(123, 124, 125	923	Duan, anterooms renovated; built in High Tang)	
[also 5 Dynasties, 907-923:			
		53, 72, 86, 90, 99, 137, 146, 187, 226, 261, 300,	
		441, 468, 469, 476Duan]	
(220	925	Ma, renovation; built 642)	
27, 29, 30	929	Ma; cf. Duan: Xi Xia, 1036-1226	
143	933	Ma, renov.?; cf. Duan: Late Tang, 848-906	
(387	934	Ma, renov.?; cf. Duan: High Tang)	
35, 36	934-935	Ma; for no. 35, cf. Duan: Song, 960-1035	
38	935	Ma; cf. Duan: Xi Xia, 1036-1226	
108	939	Ma; cf. Duan: 5 Dynasties, 907-923.	
100	935-939	Ma; Rhie: 936-940between nos. 196, 61; cf.	
		Duan: 5 Dynasties, 907-923; Huie: 924.	
(166 (?)	935-939	Ma, renov.; Duan: built High Tang, 705-780)	
(244	935-939	Ma, renov.; Duan: built Early Tang, 618-704)	
<u></u>		,,	

(329	936	Ma, renov.; Duan: built Early Tang)
454	939-944	Ma; cf. Duan: Song, 960-1035
(412	939-944	Ma, renov.; built in Sui)
22	945	Ma; cf. Duan: 5 Dynasties, 907-923
(205	945	Ma, renov.; built early Tang)
61	947-951	Ma; renov. 1311; cf. Duan: 5 Dynasties, 907-923
(129	948-949	Ma, renov.; built High Tang, 705-780
78	949	Huie; cf. Duan: 5 Dynasties, 907-923, and Xi Xia.
261	ca. 950	Rhie; cf. Duan: 5 Dynasties, 907-923
(53	953	Ma, renov.; built Middle Tang, 781-847)
5	957	Ma; cf. Duan: 5 Dynasties, 907-923.
(55	962	Ma; renov.)
79	962	Ma
(203	962	Ma; renov. of mid-7th century cave)
(96	966	Ma; renov.)
(427	970	Ma, re-dedication)
449	970	Ma
437	970	Ma; cf. Duan: Xi Xia, 1036-1226
5	970	Ma; cf. Duan: 5 Dynasties, 907-923
25	974	Ma
454	974-976	Ma
43, 44	976-978	Ma
)s-980s	Huie)
(342, 311	980	Ma, renov.; 242 built in Early Tang; 311 built in Sui
431	980	Ma
	lf 10th c.	Rhie; position vis-a-vis preceding not clear; cf.
2114 114	in roure.	Duan: built Middle Tang, 781-847
(130	1002-1014	Ma; repainting)
256	1002-1014	Ma
[also Song, 960-1035		
•		76, 89, 94, 118, 136, 152, 170, 174, 178, 189, 230,
		, 368, 376, 377, 427, 443, 444, 452, 456, 457,
467, 478Dua		, 500, 570, 577, 127, 115, 111, 152, 150, 157,
97	-	Rhie (?); Duan: Xi Xia, 1036-1226.
(265	•	Rhie, renov.; built N. Wei.
•	arter 11th c.	Rhie, renov.; built N. Wei
· ·		ilt earlier: 206, 328, 409, 418, 420, 432, and others.]
[also Xi Xia, 1036-1226:		
6, 16, 27, 29, 30, 37, 38, 69, 70, 81, 83, 84, 87, 88, 140, 142, 151, 164, 165,		
169, 207, 223, 224, 229, 233, 234, 239, 245, 246, 252, 281, 291, 306-310, 324-		
		-354, 356, 363, 365-367, 378, 382, 388, 389, 395,
		, 460, 464, 491Duan]
(61	1311	Ma; renovation)
465	1308-1311	inscription
3	1357	Ma
[also Yuan, 1227-136		

1, 2, 95, 149, 462, 463, (464renov.), 477Duan]		
(16, 365, 366	1907	Ma; renovation, building of facade)
(146	1916	Ma; renovationre-building of facade)
(96	1927-1934	Ma; re-building of facade, with additional floors)

Huie's chronological groupings of the caves:

275, 272, 257, 254, 260 (based on Soper). 251, 259, 249 (also Soper). 290, 432, 428. 285. 301, 299 (both about same date, citing Hsieh), 295, 296, 302, 303, 305, 297 (these all "Early Sui"). 419, 420, 424, 423, 433. 266, 204 (structure close to 420, but ptgs. later?), 404, 375. 394, 402, 56. 427, 390, 244 (synthesizes style of preceding two), 314, 276; "ear caves" of no. 61 (i.e., nos. 62, 63). 57, 209. 322, 220, 329, 335. 103, 217, 323. 33, 334, 332 (anachronism, echoing 427 in structure and statuary placement), 328. 45, 445, 172, 130. 205, 321, 148. 156, 159, 158, 231, 236, 237, 259 (?), 360, 85, 94, 9, 193 (all loosely grouped but not discussed in detail). 146. 402, 100, 98, 78, 469, 124, 427, 444, 431, 61 (all Cao family dedications, ca. 920-1030).