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Cultural Variation in Infants' Sleeping Arrangements: Questions of Independence

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This study examines the decisions of middle-class U.S. and Highland Mayan parents regarding sleeping arrangements during their child's first 2 years and their explanations for their differing practices. All 14 Mayan children slept in their mothers' beds into toddlerhood. None of the 18 U.S. infants slept in bed with their mothers on a regular basis as newborns, although 15 slept near their mothers until age 3 to 6 months, when most were moved to a separate room. The Mayan parents explained their practices in terms of the value of closeness with infants; the U.S. parents explained their practices in terms of the value of independence for infants. The U.S. families, but not the Mayan families, used bedtime routines and objects to facilitate the transition to sleep.

> It was time to give him his own room . . . his own territory. That's the American way.
>
> Reflections of a middle-class U.S. mother

Among middle-class families and child-care experts in the United States, it is assumed that the proper sleeping arrangement for infants and parents is separate. The purpose of this article is to examine this assumption as a cultural practice. A sociocultural approach involves understanding how practices within a community relate to other aspects of the community's functioning, such as adult work roles, physical space arrangements, climate, and values and goals regarding desired characteristics of citizens. One of the most valuable aspects of comparisons across cultural communities is that they make us aware of the cultural basis for and the assumptions underlying our own practices, whoever we are (Cole, 1985; Munroe, Munroe, & Whiting, 1981; Rogoff, 1990; Rogoff & Morelli, 1989; B. B. Whiting & Edwards, 1988).

In this study, we review work demonstrating that the middle-class U.S. practice of separating infants from their mothers is unusual compared with the practice in most communities around the world, and we examine speculations regarding values and other practices that may be associated. Then we make an explicit comparison of practices and rationales described by parents of infants in two communities: a small Guatemalan Mayan town and a middle-class sample from a U.S. city.

Folk wisdom in the United States considers the early nighttime separation of infants from their parents as essential for the infants' healthy psychological development. This widespread belief is reflected in the advice parents have received since the early 1900s from child-rearing experts regarding cosleeping. Spock (1945) wrote, "I think it's a sensible rule not to take a child into the parents' bed for any reason" (p. 101). Brazelton (1978, 1979) and Ferber (1986), pediatricians and writers nationally known as specialists on parenting, also warned parents of the dangers of sleeping with their infants. The concerns of such authors included possible smothering by a restless parent (Bundesen, 1944), the increased likelihood of catching a contagious illness (Holt, 1957), the difficulty of breaking the habit when the child grows older (Spock, 1945), and sexual overstimulation for the oedipal child (Spock, 1984). Although several accounts now acknowledge the value placed on cosleeping by some families (Brazelton, 1990), or advocate the practice (Thevinin, 1976), pediatricians generally advise parents to avoid cosleeping (Lozoff, Wolf, & Davis, 1984).

Research indicates that cosleeping is not commonly practiced by middle- to upper-class U.S. families. Lozoff et al. (1984) found that only 35% of urban Caucasian 6- to 48-month-olds slept with their parents for all or part of the night on a regular basis. Crowell, Keener, Ginsburg, and Anders (1987) reported even lower figures: A mere 11% of the 18- to 36-month-olds they studied shared a bed with their parents 3 or more nights a week, and only 15% shared a room with them. Valsiner and Hall (1983) found that 18 out of 19 infants from well-educated U.S. families slept in a room separate from their parents from before 3 months of age. Over half of the infants studied by

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Hong and Townes (1976) slept in their own rooms by 2 months of age, 75% by 3 months, and 98% by 6 months. Other researchers have noted that by 6 months, middle-class U.S. infants' designated sleeping place is in a room separated from their parents (Keener, Zeanah, & Anders, 1988; Richman, Miller, & Solomon, 1988; B. B. Whiting & Edwards, 1988). From these and other studies it appears that in the U.S. middle class, cosleeping is not a frequently occurring event in infancy and early childhood (Mandansky & Edelbrock, 1990; Rosenfeld, Wenegrat, Haavik, Wenegrat, & Smith, 1982).

In many non-U.S. communities it is customary for infants to sleep with their mothers for the first few years of life, at least in the same room and usually in the same bed. J. W. M. Whiting (1964) reported that infants sleep in bed with their mothers in approximately two thirds of the 136 societies he sampled around the world, and in the remainder the babies were generally in the same room with their mothers. Infants regularly slept with a parent until weaning in all but 1 (the United States) of the 12 communities studied by B. B. Whiting and Edwards (1988); in the U.S. community no cosleeping was observed. In a survey of 100 societies, American parents were the only ones to maintain separate quarters for their babies (Burton & Whiting, 1961; see also Barry & Paxson, 1971; McKenna, 1986). These findings are consistent with other work on sleeping arrangements in urban Korea (Hong & Townes, 1976) and urban and rural Italy (Gaddini & Gaddini, 1971; Gandini, 1990; New, 1984).

Communities that practice cosleeping include both highly technological and less technological communities. Japanese urban children usually sleep adjacent to their mothers in early childhood and generally continue to sleep with a parent or an extended family member until the age of 15 (Caudill & Plath, 1966; Takahashi, 1990). Parents often separate in order to provide all children with a parental sleeping partner when family size makes it difficult for parents and children to share a single room. Space considerations appear to play a minor role in cosleeping practices for Japanese families (Caudill & Plath, 1966).

Within the United States, demographic, ethnic, and economic correlates of cosleeping have been identified. There is less cosleeping by mothers with some college education than by mothers with a high school education (Wolf & Lozoff, 1989). Black U.S. children are more likely than White U.S. children to fall asleep with a caregiver present, to have their beds in their parents' room, and to spend all or part of the night cosleeping with their parents (Lozoff et al., 1984; Ward, 1971). Thirty-six percent of infants growing up in eastern Kentucky shared their parents' beds as newborns, and 48% shared their parents' room. Over 65% of infants from this community slept with or near their parents through the first 2 years of life (Abbott, 1992); again, space did not seem to be the issue.

Previous literature has identified a stress on independence training as being connected with middle-class parents' avoidance of cosleeping (Munroe et al., 1981). Kugelmass (1959) advocated separate rooms for children on grounds that it would enable them to develop a spirit of independence. The rare middle-class U.S. families who do practice cosleeping often recognize that they are violating cultural norms (Hanks & Rebelsky, 1977). In contrast, Brazelton (1990) noted that "the Japanese think the U.S. culture rather merciless in pushing small children toward such independence at night" (p. 7). Parents in communities where cosleeping is common may regard cosleeping as important for the development of interpersonal relationships (Caudill & Plath, 1966).

In the present study, we examine differences between a U.S. middle-class community and a non-Western community in the sleeping arrangements of infants, including where the babies sleep and nighttime feeding and waking practices, as well as parents' rationales for and comfort with their infants' sleeping arrangements. We are particularly interested in the values expressed by parents regarding the consequences for children of cosleeping or sleeping apart. We also investigate practices that may be associated with sleeping arrangements, such as special activities occurring around bedtime. The transition to sleep may be a difficult process for young children that is eased by the presence of their caregivers or by substitute attachment objects or special bedtime activities (Albert, 1977; Wolf & Lozoff, 1989).

Although middle-class U.S. parents and child-care specialists regard sleeping problems as among the most common disturbances of infancy, our goal is not to prescribe any changes but rather to come to a broader understanding of cultural practices in which middle-class U.S. and Mayan families, like all other families, participate.

Method

Participants

Eighteen Caucasian, middle-class mothers living in a U.S. city (with 7 girls and 11 boys aged 2 to 28 months, median age = 16 months) and 14 Mayan mothers living in a rural Guatemalan community (with 7 girls and 7 boys aged 12 to 22 months, median age = 19 months) were interviewed on topics related to the sleeping arrangements of their youngest child.

U.S. families were randomly selected from birth information supplied by the Bureau of Vital Records and were invited to take part in the study. Mayan families were selected from a small town in highland Guatemala. The families from the two communities were similar in number of children (*Mdn* = 2, range = 2–7 for the U.S. sample; *Mdn* = 3, range = 1–9 for the Mayan sample). Approximately one third of the children were firstborn in both communities. The U.S. mothers averaged 30 years of age (range = 22–39, based on 13 respondents) and the Mayan mothers averaged 26 years (range = 19–42). The U.S. mothers had completed more years of schooling, with a median of 14 grades (range = 12–18, based on 14 respondents), compared with a median of 3 grades for the Mayan mothers (range = 0–9). All of the Mayan mothers were the primary daytime caregivers for their toddlers; two thirds of the U.S. mothers were. Most families included a father; all of the 18 U.S. fathers and 11 of the 14 Mayan fathers were living with the child and mother. The religious affiliations of the families reflected those of their communities. Over half of the U.S. families were Mormon (58%, based on 12 respondents), and the remainder were Catholic, Protestant, or Jewish; over half of the Mayan families were Catholic (64%), and the remainder were Protestant.

Procedure

Parents were interviewed in their homes, with family and community members often included in the session. A North American researcher familiar with the language, community, and families interviewed the Mayan sample, with a community member assisting in

translation when parents preferred speaking Mayan. A second North American researcher interviewed the U.S. sample.

Family sleeping arrangements at the time of the interview were determined by asking parents to draw a map of their home indicating relative positions of rooms as well as beds and identifying each person's present sleeping location. Parents were asked about their infant's sleeping locations from the time of birth, about other practices associated with sleeping arrangements (e.g., night feedings), and why they made the choices they did. Questions were grouped topically, but the interviewer used her judgment to decide the order in which they were asked. Information on family background was also gathered. The interview was tailored in ways appropriate to each community. It took approximately 60 min to interview an American family. Mayan interviews took longer (approximately 120 min) because the questions were embedded in a larger study.

Sleeping Arrangement Variables

Questions on infants' sleeping locations, night feedings, and bedtime routines were parallel in the two communities. Questions exploring rationale for and comfort with decisions were tailored to each community, because the practices and issues were different for each.

Infant's sleeping location is categorized as being in the mother's bed (which we term *cosleeping,* after Lozoff et al.'s, 1984, definition), in the mother's room, or in another room. We also report any changes in location since the infant's birth and information on who else besides the mother shared the infant's bed or room.

Night feedings includes information on whether the baby is breast or bottle fed, where night feedings occur (in mother's bed, mother's room, or another room), and where the baby is put to sleep following night feedings.

Bedtime routines are reported in terms of whether the infant fell asleep alone or in someone's company, whether the infant fell asleep at the same time as the mother or separately, whether the infant received special bedtime activities (e.g., bedtime story, lullaby, bathing or toothbrushing routines), and whether the infant used a security object for falling asleep.

Sleeping arrangement issues and reflections differ in format in the two communities because of their very different practices. For the Mayan families, we report on the issues that appear when toddlers are shifted away from cosleeping with the mother, usually at age 2 or 3, and on some of the Mayan parents' reflections on U.S. middle-class infants' sleeping arrangements.

For the U.S. families, we report the parents' rationales for the infant's sleeping location (and changes in location), their comfort with the infant's sleeping location, their perceptions of the relation between the baby's sleeping location and development, and their attitudes toward cosleeping. Table 1 lists coded categories and representative statements by U.S. parents.

Reliability

Reliability estimates were unnecessary for the data that did not involve judgments by the researchers (e.g., sleeping location, night feedings, bedtime routines). The reflections of the U.S. parents on sleeping arrangements were grouped into coding categories requiring judgments; 50% of them were selected for reliability assessment using percentage agreement scores. The values ranged from 75% to 100%, with a median of 88%.

Results

The practices of the Mayan and U.S. middle-class families with regard to sleeping locations, night feedings, and bedtime routines are reported first. We then follow up the differences in practices by examining parents' reflections on the different issues with questions tailored to the community's practices.

Sleeping Location

Mayan families. All 14 Mayan mothers slept in the same bed with their infants through the 1st year of life and into the 2nd year (see Table 2); 1 child had spent some time sleeping apart from her mother, on a cot in the same room, but was now sleeping with her mother again. In this case, the sleeping arrangement reflected changes in the presence of the father, from whom the mother was now separated.

Most of the Mayan toddlers (8 of them) also slept in the same bed with their fathers. Of the 6 who did not share a bed with their fathers, 3 had fathers sleeping in another bed in the same room (in 2 cases, father was sleeping with other young children), and the other 3 involved absent fathers. Four of the toddlers had a sibling (newborn to 4 years of age) in the same bed with them and their mothers, and of these, 2 also had the father in the same bed. Ten of the 14 toddlers had siblings sleeping in the same room with them, either in the same bed or another bed. Of the 4 toddlers who had no siblings sleeping in the same room, all were only children; one of these had paternal uncles sleeping in the same room.

U.S. families. In none of the 18 U.S. families did parents sleep with their newborns on a regular basis (see Table 2). Rather, most mothers and fathers (15 families) chose to share a room with their newborn infants, often placing them in a bassinet or crib near the parents' bed. This was a temporary arrangement; by 3 months of age 58% of the babies were already sleeping in separate rooms. This figure climbed to 80% by the 6th month of life. When the babies were moved to a room apart from their parents, firstborns were placed in a room of their own, but most second- and laterborns (89%) were moved into rooms with siblings. However, none of them shared a bed with a sibling.

In 3 of the 18 U.S. families, parents chose not to share a room with their babies from the time the babies were brought home from the hospital. These 3 newborn infants slept in their own rooms, despite the fact that 2 of them had siblings with whom they could have shared a room. For 1 family this meant keeping the infant in the living room.

Of the 15 families in which parents had slept near their newborn infants and then moved their babies to a separate room, 3 moved the infants back in the second half year of their baby's lives. Two babies were moved to cribs located in their parents' rooms; 1 baby was moved to her parents' bed. In addition, 1 family moved their child from a separate bed in the parents' room to the parents' bed when the child was 1 year old.

Night Feedings

Mayan families. The pattern of night feeding arrangements in the Mayan families was for the baby or toddler to sleep with the mother until shortly before the birth of another child (about age 2 or 3) and to nurse on demand. The mothers reported that they generally did not notice having to feed their babies in the

Table 1
Issues Related to Sleeping Arrangements, Coding Categories, and Associated Representative Statements: U.S. Sample

Topic	Coding category	Representative statement by parents
Reasons for sleeping near baby	Pragmatic (e.g., reference to temporary phenomenon such as illness, room renovations, or convenience)	"My husband's mother . . . decided to come to visit, so he (baby) stayed (in parent's room) until she left."
	Developmental (e.g., reference to vulnerability or infant features associated with physical or psychological attributes)	"I could look over and see, yes he is still alive. He's still there, he's still breathing."
	Affectionate/emotional (security, closeness, comfort)	"I think he was able to look over and feel comfortable. It was a good experience for him, and for me, for the closeness."
Sleeping near mother and baby's development	Develop security or closeness	"I think that being in our room was probably healthy for him . . . he could see our bed . . . and feel more comfortable."
Reasons for moving baby out of mother's room	Pragmatic (e.g., reference to temporary phenomenon such as illness, room renovations, or convenience)	"It is kind of a strain for a couple to tiptoe in (the bedroom) and be quiet."
	Developmental (e.g., reference to infant features associated with physical or psychological attributes)	"My baby was sleeping through the night, he didn't need me anymore."
	Foster independent or autonomous behavior	"It was time to give him his own space, his own territory."
	Fear of establishing a difficult-to-break habit	"She just might as well get used to it (sleeping by self)."
Sleeping apart from mother and baby's development	Develop independent or autonomous behavior	"I think it would have made any separation harder if he wasn't even separated from us at night."
Comfort with sleeping apart from mother	Comfortable	"It was not bad because we put him right across the hall. I wouldn't say a big adjustment."
	Ambivalent	"There is good and bad both ways."
	Uncomfortable	"But I don't know how they are doing. I can't check up on them. No it is not comfortable having (him) in the other room."
Reasons for not sleeping with the baby	Fear of establishing a difficult-to-break habit	"Once you start it (cosleeping) it will continue. They (friends who cosleep) are sorry now that they have started it because now he is older and they can't get him out."
	Safety issues	"We might roll over him, hurt him . . . he could get smothered."
	Uncomfortable with idea	"I . . . don't think that I ever want him right in the same bed as me. I don't really know why."
	Concerns about encouraging dependency	"I think that he would be more dependent . . . if he was constantly with us like that" (i.e., asleep near them).

night. Mothers said that they did not have to waken, just to turn and make the breast accessible. Hence night feedings were not an issue for the Mayan mothers or for their infants and toddlers.

U.S. families. All but 1 of the 18 U.S. mothers reported having to stay awake during night feedings (which, for most mothers, lasted 6 months or so). Ten mothers chose not to feed their babies in their rooms, even though 7 of them had infants sleeping there and 8 of them were breastfeeding. Two mothers (both breastfeeding) fed infants in the parental room, but not in the parental bed; and 6 mothers (all breastfeeding) elected to feed their babies in the parental bed, but 5 of them regularly returned babies to their own beds when finished. The 1 mother whose infant regularly remained in bed with her following feedings was the only mother who said that nightly feedings did not bother her.

Bedtime Routines

Mayan families. The idea that sleeping arrangements were not an issue for the Mayan families is supported by the lack of bedtime routines carried out in the nightly transition to sleep. There was not a separate routine to coax the baby to sleep. Most of the babies simply fell asleep when sleepy, along with the rest of the family or before if they got tired. Seven of the babies fell asleep at the same time as their parents, and most of the rest fell asleep in someone's arms. Ten of them were nursed to sleep (as

Table 2
Sleeping Locations in the Two Communities

Location	U.S. (n = 18)		Mayan (n = 14)	
	0–3 months	After 6 months	0–3 months	After 6 months
In mother's bed, with father and/or sibling	0	2	10	10
In mother's bed, with no other bedmates	0	0	4	4
In separate bed, in mother's room	15	2	0	0
In another room, with a bedmate	0	0	0	0
In own bed in another room, with a roommate	0	6	0	0
In another room, alone	3	8	0	0

they are nursed on demand during the daytime as well). Of the 4 who were no longer nursing, 1 fell asleep alone with a bottle, 1 fell asleep with a bottle and his mother going to bed with him, and 2 who had been nursed to sleep until recently (and were being weaned) usually fell asleep on their own but were cuddled by their father or older brother on the occasions when they needed company at bedtime.

None of the babies received a bedtime story; there were no reports of bathtime or toothbrushing in preparation for bed; none of the babies sucked their thumbs; only 1 was reported to use a security object for falling asleep (a little doll—this belonged to the 1 child who had for a time had a bed by herself!). There was thus no focus on objects as comfort items for falling asleep.

None of the Mayan families sang special children's lullabies to the babies at bedtime; some laughed at the idea. However, 4 of the mothers admitted with embarrassment that they sometimes sang their babies church songs at bedtime. (One added that she does this when she feels badly about not having taken the baby out during the day.) The babies were not changed into pajamas in preparation for bed. (They do not have specialized nightclothes; nor do the parents.) However, 11 of them were changed into their oldest clothes for sleeping. The other 3 just slept in the clothes they had worn during the day. Thus it appears that no special preparations or coaxing are needed for these babies, whose sleeping occurs in the company of the same people with whom they spend the day.

U.S. families. Events surrounding bedtime for the U.S. families played a significant role in the organization of family evening activities. Besides the daily evening activity of putting on nightclothes and brushing teeth, 10 of the 18 parents engaged in additional routines such as storytelling. Routines varied in their degree of elaborateness, with some parents spending just a few minutes reading a story to their babies and other parents investing a fair amount of time getting their child ready for sleep. One mother jokingly said, "When my friends hear that it is time for my son to go to bed, they teasingly say 'See you in an hour.' "

Once infants were in bed, 11 were expected to fall asleep by themselves. It is interesting that 5 of the 8 infants who fell asleep alone took a favorite object such as a blanket to bed with them (data are missing for 3 children). By comparison, only 2 of the 6 infants who fell asleep in the company of another person (data are missing for 1 child) needed to do the same.

Reflections of Parents on Sleeping Arrangements

Mayan families. Most of the families regarded their sleeping arrangements as the only reasonable way for a baby and parents to sleep. In addition, in five interviews the subject of how U.S. families handle sleeping arrangements came up. Invariably, the idea that toddlers are put to sleep in a separate room was received with shock, disapproval, and pity. One mother responded, "But there's someone else with them there, isn't there?" When told that they are sometimes alone in the room the mother gasped and went on to express pity for the U.S. babies. Another mother responded with shock and disbelief, asked whether the babies do not mind, and added with feeling that it would be very painful for her to have to do that. The responses of the Mayan parents gave the impression that they regarded the practice of having infants and toddlers sleep in separate rooms as tantamount to child neglect. Their reactions and their accounts of their own sleeping arrangements seemed to indicate that their arrangements were a matter of commitment to a certain kind of relationship with their young children and not a result of practical limitations (such as number of rooms in the house).

In Mayan families, sleeping arrangements are not an issue until the child is displaced from the mother's side by a new baby. At the time or before the new baby is born, the toddler is weaned and may be moved to sleep beside the father in the same bed or in another bed in the same room. One mother and father told us that their little boy got very angry at his mother (when the next child arrived) and even cried when he was moved to his father's bed; he wanted to be the last born—he did not want someone else to take his place beside his mother. For most families, though, this transition is usually made without difficulty. Parents sometimes try to prevent any difficulties by getting the child accustomed to sleeping with another family member before the new baby is born.

The transition is sometimes difficult for Mayan mothers and fathers. Mothers may regret letting the child move from their care to that of another family member, and fathers may lose sleep as they often become responsible for the displaced child. One father of a toddler told us that his older son, whose wife was expecting a second child in 4 months, needed to move their 2-year-old firstborn to another bed soon, even though she did not want to move. The older man told us that the firstborn needed to become accustomed to sleeping apart from the mother or the father would have trouble later. "I know," said the older man, "because I went through this . . . If the first child doesn't sleep through the night, apart from the parents, when the new child comes, the father suffers. He has to get up in the night to give the child something."

If there are older siblings, they often take care of the displaced child if needed during the night, allowing the father to sleep. Of the 10 Mayan families with older siblings, in 5 of them the older siblings had moved to sleep with the father when our subjects were born (3 in the same bed with mother and the new baby, 2 with father in another bed in the same room), in 2 they had moved to sleep with a sibling in the same room, in 2 they had moved to a separate bed in the same room, and in 1 they slept with the mother and the new baby as father slept in a separate bed in the same room. It is noteworthy that even when the children are displaced from their mother's side, they still sleep in the same room with her, usually at someone else's side.

U.S. families.[1] U.S. parents chose to sleep near their newborn infants for pragmatic reasons (mentioned by 78%, e.g., "Because I nurse them . . . it is sort of convenient to have them here") as well as for developmental and affectionate reasons (57% and 64% mentioned these). Of the parents who slept near their babies starting at birth, an overwhelming majority (92%) felt that sleeping near infants helped foster the development of an affectionate tie between them and their babies. (Table 1 contains a description of coding categories and representative statements by parents.)

Although these parents acknowledged that sleeping near their infants was a meaningful experience for both them and their babies, all but 1 family decided to move their infants to separate quarters within the 1st year of life (most moves occurred during the first 3 to 6 months).[2] When asked about the reasons for shifting sleeping quarters, parents often talked about the infant's developmental readiness for separation (69%): "She didn't need to be watched as close"; "He was old enough to be by himself." This suggests that a perceived decrease in the vulnerability of the infant and readiness for separation played an important role in the parents' decision to move the infant out of the parents' room. Pragmatic factors (e.g., "It was time for me to go back to work") were cited as important in the decision-making process by 54% of the families. Fostering independence and preventing conflict over separation were given as reasons for moving the baby out of the parents' room by 38% and 15% of the families, respectively. Most U.S. families did not consider the transition from sleeping near parents to sleeping apart from them in these early months to be stressful for the infants. One family speculated that a baby might find the move stressful if the baby was a firstborn.

Twelve of the 14 families who moved their babies out of their rooms expressed satisfaction with their decision.[3] Many emphasized that the move allowed continued proximity to their babies. Half of the parents told us that the baby's room was close to their room, making it easy for them to monitor their infant's movements. Some families also made a regular habit of keeping doors slightly ajar so that they could better hear their babies' cries. Just 2 mothers who moved their babies out of their room were unhappy with their decision. For 1 mother, the baby's move to the living room severely hampered her daytime activities.

Three parents participating in the study never had their infants sleep in the same room with them. Two of the 3 families made this choice because of concerns related to independence training. All 3 families were comfortable with their decision to maintain separate sleeping quarters; 2 families commented that the rooms were sufficiently close to allow them to hear their infants in case of an emergency.

Most of the 17 families who slept in different rooms from their infants (from birth, or within months following the baby's birth) focused on issues related to independence training when discussing what their practices meant for their baby. Sixty-nine percent of these families believed that it was important for their infants' developing independence and self-reliance to sleep apart from them, with some reporting that separations at night made daytime separations easier and would help reduce their babies' dependence on them.

The findings suggest that encouraging independence during infancy is an important goal for many U.S. families and that parents believe that sleeping apart helps train children to be independent. But the age at which parents think it is appropriate for infants to sleep apart is somewhat variable, ranging from 0 to usually 3 to 6 months. This range of variability is narrow compared with worldwide sleeping practices.

Sixteen of the 18 U.S. mothers reported that they would not want to sleep with their baby on a regular basis. The explanations for avoiding cosleeping included the fear of establishing a habit that would be difficult to break (50%; e.g., "She would like it and not want to leave"), concern about encouraging dependency in their baby (19%), safety reasons (44%; e.g., "I was so afraid that I would crush him"), or simply being uncomfortable with the idea (44%). However, the majority of parents (77%) did report allowing occasional night visits, often as a way to comfort their infants. But some families felt that it was just not acceptable to bring a baby into the parental bed for any reason.

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[1] Some of the findings reported in this section involve a few cases of missing data. The percentages do not include these cases.

[2] One family made cosleeping a regular family practice when their son was 1 year of age, after having had the infant in a separate bed in the parents' room. The mother already had a history of falling asleep with the infant while nursing; the decision was one of convenience, prompted by the baby's increasing resistance to sleeping alone. Nonetheless, the parents were ambivalent about their decision to cosleep. They felt that cosleeping provided their son with emotional security but, at the same time, they wanted their privacy.

[3] The 3 families who made additional changes in their babies' sleeping arrangements after their infants had been moved to separate rooms were unhappy about their decisions, although they reported that their decisions were necessary (because of medical concerns or space issues). One mother exclaimed, "I am a human being, and I deserve some time and privacy to myself."

Sleeping within listening distance (but not within touch) of babies during the first months of life is a practice preferred by most of the U.S. middle-class mothers participating in the study. As parental perceptions of the developing infant shifted, it seemed increasingly inappropriate to the U.S. mothers for their babies to be within their beds or bedrooms. Cosleeping was often seen as a bad habit that is difficult to break or as a practice that impedes the development of independence.

Discussion

Mayan and U.S. middle-class families differed in the way they managed their infants' and young children's sleeping arrangements. Cosleeping, a practice found in many communities worldwide, was common in the Mayan community (Burton & Whiting, 1961; B. B. Whiting & Edwards, 1988; J. W. M. Whiting, 1964; see also Barry & Paxson, 1971; McKenna, 1986). Mayan infants slept with their mothers, and often their fathers and siblings, from birth onward, with changes in sleep location not expected until around the time of the birth of a sibling.

None of the middle-class U.S. parents, by comparison, coslept with their newborn infants on a regular basis. Rather, many parents chose to sleep near their babies in the same room but moved them to separate rooms by 3 to 6 months of age. Some parents, however, chose not to share a room even with their newborn infants. The pattern observed in our U.S. sample is similar to what has been described for other Caucasian middle- and upper-class families living in the United States (Hong & Townes, 1976; Keener et al., 1988; Richman et al., 1988; Valsiner & Hall, 1983; B. B. Whiting & Edwards, 1988). U.S. middle-class parents may differ somewhat in their sleeping arrangements for their newborn infants, but they are working toward a common goal, which is to have infants sleep in rooms of their own as early as possible. In fact, it seems as though U.S. parents are more comfortable with the idea of newborn infants sleeping in a room alone than with the idea of 1-year-olds sharing a room with their parents.

The few U.S. parents who had difficulty achieving the goal of sleeping apart from their babies and had moved them back to the parents' room after they had already been sleeping in separate quarters felt their decision was necessary but were unhappy about it. Discussion of their infants' present sleeping locations suggested that these parents knew that they were going against conventional practices and were reminded of it by family and community members alike, who expressed surprise and concern about the consequences of the parents' decision for both the infants' and the parents' well-being.

The practice of sleeping with babies may relate to concerns with infant survival. According to LeVine (1980), concerns about survival take precedence during infants' first years of life and shape infants' early caregiving environment. In our middle-class U.S. sample, many parents' decisions regarding newborns were based on their perceptions of infant vulnerability. U.S. parents were comforted by the fact that they could check up on their babies during the night to make sure that they were still breathing. (But note that U.S. parents chose not to sleep with their babies.) Once parents felt that their babies' health was not in jeopardy (around the 3rd to 6th month of life), they expected them to sleep apart. The Mayan practice of cosleeping may help minimize threats to infant survival, which are considerably greater than in the U.S. middle class because of malnutrition and illness.

McKenna (1986) argued that cosleeping was a panhuman practice with survival value for infants during much of our evolutionary past (see also Konner & Super, 1987). His view is based on the claim that infants rely on cues from parents when sleeping to help them regulate their breathing, allowing them to survive "breathing control errors" (p. 53) that might play a role in sudden infant death syndrome. Evidence that infants in some communities wake and feed about every 4 hours at night (as they do in the daytime) for at least the first 8 months of life adds to the argument that forcing babies to be alone through the night may go beyond the limits of some infants' physiological systems (McKenna, 1986; Super & Harkness, 1982).

Decisions about infants' sleeping arrangements, like other parenting decisions, also relate to the community's values and goals regarding desired characteristics of citizens. Some Mayan parents who reflected on the possibility of sleeping apart from their infants and toddlers emphasized qualities related to *inter*dependence. It seems that their arrangements reflect commitment to this type of relationship with their young children. Speculations at one interview lend support to this idea:

> Upon being asked how she teaches her 13-month-old that there are some things not to handle, the mother said she tells her, "Don't touch it, it's no good, it could hurt you," and the baby nods seriously at mother and obeys, and knows not to touch it. (This was a common statement by the Mayan mothers.)
>
> The interviewer commented that U.S. babies don't understand so young, and instead of understanding and obeying when they are told not to touch something, they might get more interested in it. With much feeling, another mother who was present at the interview (in which we reported on U.S. sleeping arrangements) speculated that perhaps U.S. children do that because of the custom of separating children from parents at night. "In our community the babies are always with the mother, but with North Americans, you keep the babies apart. Maybe that's why the children here understand their mothers more; they feel close. Maybe U.S. children feel the distance more." She went on to speculate that if children do not feel close, it will be harder for them to learn and understand the ways of the people around them.

In many respects, Mayan infants and toddlers were regarded as not yet accountable (they were not punished for misdeeds, being considered unable to understand) and not yet ready to be treated as individuals who could be separated from their families, especially their mothers. On the other hand, the mothers generally reported that their infants and toddlers understood social rules and prohibitions from an early age. Almost all of the Mayan mothers reported that they could trust their young children not to put objects in their mouths and not to touch prohibited objects. Contrast this with the vigilance with which U.S. parents watch over their children around small objects until age 2 or 3. The mothers in our U.S. sample reported that they did not trust their young children with small objects. This difference is consistent with the Mayan mothers' speculation that the relationships fostered in sleeping close with babies may relate to the Mayan babies' learning from those around them (see also Rogoff, Mosier, Mistry, & Göncü, in press, on Mayan

babies' keenness of observation and alertness to their social surroundings).

The relation between cosleeping and interdependence was noted by Caudill and Plath (1966) in their work on Japanese families. Japanese parents believe that their infants are born as separate beings who must develop interdependent relationships with community members to survive; cosleeping is thought to facilitate this process (Caudill & Weinstein, 1969). In contrast, U.S. parents believe that infants are born dependent and need to be socialized to become independent. Abbott (1992) argues that the Eastern Kentucky practice of parents sleeping with or near their children through the first 2 years of life is a strategy used by parents to foster the development of interdependence. Our U.S. middle-class mothers indicated that having newborns sleep in the parents' room fostered their feelings of closeness and the newborn's sense of security and emotional attachment. However, for the U.S. middle-class families, the fostering of closeness in this fashion seemed to be limited to the newborn period and involved parents sleeping in sight or hearing of but not in contact with their newborns.

In criticizing cosleeping, many U.S. mothers talked about the need to train babies to be independent and self-reliant from the first few months of life, and they reported concern with establishing a habit that would be difficult to break. A number of authors share this view (Edelman, 1983; Hoover, 1978; Spock, 1945). This reveals an assumption that from birth children should become accustomed to the requirements of later life, an assumption that child-rearing practices in infancy should be continuous with those of childhood (Benedict, 1955). This is an assumption that is not shared by many communities where infants are treated differently than young children; in such communities infants are assumed not to have sense or to understand and to have needs different than those of children. Rather than making the break in closeness with mother at or shortly after birth, infants are treated as part of a mother–infant unit until about the end of the 2nd year (when the appearance of a new baby and the need for weaning often occur). This latter view of infancy is consistent with Mayan beliefs and practices surrounding sleeping arrangements and with Kawakami's (1987) statement regarding Japanese child rearing: "An American mother–infant relationship consists of two individuals. . . . On the other hand a Japanese mother–infant relationship consists of only one individual, i.e., mother and infant are not divided" (p. 5).

Loss of privacy and associated concerns about sexual intimacy were also mentioned by some of the U.S. mothers when discussing their decision not to sleep with their babies on a regular basis. One U.S. mother said, "My husband did not like that idea (cosleeping). He was afraid that it would be unnatural, too much intimacy." It appears that unlike the Mayan community, who view sleeping as a social activity, some U.S. families see sleeping as a time for conjugal intimacy.

It is possible that spending extended periods of time alone may provide training in self-comforting and self-regulation (LeVine, 1980, 1990; Munroe et al., 1981). Although many U.S. parents believe that their infants are asleep during the night, this is not always true. Anders (1979) found that 78% of 9-month-olds were not removed from their cribs from midnight to 5 a.m., satisfying conventional criteria for sleeping through the night. Yet 57% of these infants woke up during these hours. When babies wake in the absence of a caregiver, they are responsible for dealing with their own emotional or physiological distress (e.g., fear, hunger, cold). The fear of sleeping alone was well put by one U.S. middle-class 3-year-old who developed nightmares and trouble sleeping. He went into his parents' room and complained, "If there was a human in the same room, I wouldn't be 'fraid." When he was moved into his baby brother's room, his sleeping troubles disappeared (V. K. Magarian, personal communication, July 1991).

However, Wolf and Lozoff (1989) questioned the relation between sleeping alone and independence training. They noted that "if leaving children to fall asleep alone truly fosters independence, it is perhaps surprising that during historical periods in the U.S. in which 'independence' was most vividly demonstrated, such as the colonial period or the westward movement, children were not likely to fall asleep alone" (p. 292). It might be that infants and young toddlers who sleep alone during the night find it more difficult (rather than easier, as assumed by middle-class parents) to separate from their parents during the day (E. Z. Tronick, personal communication, September 1991).

The struggle seen around bedtime between many U.S. middle-class parents and their children may be related to the stress infants experience when required to make the transition to sleep without assistance (Albert, 1977; see also LeVine, 1990). It may also reflect a conflict of goals, with parents wanting their child to go to sleep as soon as possible, and the child wanting to delay bedtime as long as possible because of fears engendered by having to sleep on his or her own (Gandini, 1986). For the U.S. toddlers, bedtime was associated with separation from family social life: All toddlers went to bed earlier than their parents, and most were expected to fall asleep alone, in their own rooms. Anders (1979) and LeVine (1990) reported similar findings. In contrast, most Mayan babies went to sleep when their parents did or fell asleep in the midst of ongoing social activity. This is consistent with a general pattern, observed in communities around the world, in which there is little distinction between daytime and nighttime events for infants and toddlers (LeVine, 1990).

Bedtime routines, common in many U.S. families, including those we observed, are thought to help ease the child's nightly transition from being with others to being alone (Albert, 1977; Crowell et al., 1987; Lozoff et al., 1984). Many of the U.S. children who were expected to fall asleep alone took objects to bed with them that were seen by their parents as offering solace to their children. This finding replicates that of Wolf and Lozoff (1989), who found that middle-class children who did not have an adult present as they fell asleep were more likely to use transitional objects or to suck their thumbs at night. The nightly passage to sleep appears to be difficult for young children who have to do it alone; security objects and bedtime routines may be used to help infants in the transition to sleep. This view is consistent with findings showing that infants who sleep near or with their parents tend not to use transitional objects (Gaddini & Gaddini, 1971; Hong & Townes, 1976) and with our finding that Mayan toddlers did not use security objects for falling asleep.

It is interesting from a cultural perspective that some parents would prefer that their children become attached to and depen-

dent on an inanimate object (e.g., a blanket) rather than a person. U.S. parents feel obliged, in many cases, to avoid giving their children comfort during the night or while getting to sleep. One mother reported putting a pillow over her head to drown out the sounds of her crying baby as she fell asleep—consistent with the advice of some child-rearing specialists (such as Ferber, 1986).

The Mayan infants, who generally go to sleep with the rest of the family or in the company of a family member, appear not to experience bedtime as an issue for negotiation with parents or as a time of stress. However, Mayan families face a transition at age 2 or 3 when a new sibling is expected and toddlers are weaned from the breast and their mother's bed. Parents report attempts to prevent difficulties at this transition by moving the child from the mother's side to sleep with another person before the new baby is born. Most children are reported to make the transition without difficulty.

The Mayan children generally continue to sleep with others throughout their childhoods. In a study of 60 9-year-olds in this Mayan community, only 8% were in a bed by themselves, and none were in a separate bedroom (Rogoff, 1977). Most (63%) shared a bed with siblings, 20% shared a bed with one or both parents, and 8% shared a bed with a grandmother or aunt. The idea of sleeping alone was disagreeable to the Mayan 9-year-olds, who expressed pity for U.S. 9-year-olds when told that they sleep in rooms of their own. And Mayan adults often find a sleeping companion if for some reason their family is away. Sleeping alone is seen as a hardship.

In both the middle-class U.S. and the Mayan communities, sleeping arrangements reflect child-rearing goals and values for interpersonal relations. It is not our aim to determine causality in the patterns we observed or to make recommendations for change in either community. It is instructive simply to note the patterns and to come to a broader understanding of cultural practices in which all families participate. In the Mayan community, infants and toddlers sleep with their mothers, and when a new baby appears they make a transition to sleeping with another family member or to a separate bed in the same room. Bedtime has social continuity with the relationships in which the Mayan children participate throughout the day and is not specially marked with transition routines or aided by attachment objects. In the U.S. middle-class community, infants generally sleep in a room separate from their parents by the second half of the 1st year of life. Infants seem to adjust to the changes made in their sleeping arrangements and may develop sleep patterns and rhythms similar to those of family members as they make adjustments associated with sleeping separate from their parents. The transition to sleep and to spending long hours alone is eased by attachments to objects and by special transition routines at bedtime. The transition is often stressful for parents and children alike, with parents at times acting in an adversarial role with their children in order to force adherence to what is seen by many as a cultural imperative—children sleeping alone—that aids in developing self-reliance and independence, personal characteristics valued by the community.

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