United States General Accounting Office

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Report to the Honorable
Ron Wyden, U.S. Senate

September 1996

MATERNITY CARE

Appropriate Follow-Up Services Critical With Short Hospital Stays

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GAO

United States
General Accounting Office
Washington, D.C. 20548

Health, Education, and
Human Services Division

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September 11, 1996

The Honorable Ron Wyden
United States Senate

Dear Senator Wyden:

In an effort to contain health care costs, some health care plans have adopted guidelines to shorten hospital stays associated with maternity care—the most common condition requiring hospitalization. Some plans have limited hospital coverage for mothers and their newborns to a maximum of 24 hours after delivery, which has resulted in a dramatic increase in 1-day postpartum stays. Many in the medical community have voiced concerns that these shortened stays expose newborns to undue risks. More than half of the states have enacted maternity stay coverage requirements, and the Congress is considering legislation that would support the state measures.[1]

To better understand the issues involved, you asked us to (1) identify the risks that are attributable to short hospital stays for maternity care, (2) examine health plan actions to ensure quality postpartum care for short-stay newborns, and (3) determine state responses to concerns about patient protection. To develop this information, we obtained trend data on the length of inpatient stays for newborns, reviewed pertinent literature, interviewed medical experts on the health effects of abbreviated stays, and reviewed relevant state statutes. To collect information on how some providers and plans are managing the trend toward shorter hospital stays, we held discussions with staff at 8 hospitals and 13 health plans identified by health care experts as having well-established early discharge programs. We also interviewed other key players in the maternity care community, including home health agencies, medical specialty societies, and health care trade associations. We conducted our review from October 1995 to July 1996 in accordance with generally accepted government auditing standards.

Results in Brief

Many in the medical community are concerned that by discharging newborns early from the hospital, serious disorders may not be detected. But research on the safety of short postpartum stays is inconclusive. More specifically, there are mixed results on the association between newborn

[1]For example, the Senate recently passed legislation that included the "Newborns' and Mothers' Health Protection Act."

length of stay and rehospitalization, one indicator of adverse outcomes. One recent study of vaginal deliveries found no association between the number of days a newborn spends in the hospital and the rate of readmission, but other studies indicate increased risk for newborns discharged within 48 hours of birth. Regardless, many of these studies have methodological weaknesses that limit their conclusiveness. Guidelines issued by the American Academy of Pediatrics (AAP) and the American College of Obstetricians and Gynecologists (ACOG) recommend that, when complications are not present, postpartum hospital stays be at least 48 hours for vaginal deliveries and 96 hours for cesarean sections. However, the guidelines allow for shorter stays if criteria for medical stability are met, if agreed to by a physician and patient, and if provisions are made for follow-up care.

Some hospitals and some health plans with early discharge policies have developed programs to ensure that a full range of services is provided to their maternity care patients. This set of services includes prenatal assessment and education, inpatient stays that give physicians flexibility in applying early discharge policies, and follow-up care provided by a trained professional at home or in a clinic within 72 hours of discharge. Other plans with shortened postpartum stays, however, may not provide all recommended services. For example, some plans' follow-up care consists of telephone hotlines to address patient concerns, which do not allow for the type of direct observation recommended for mothers and newborns.

Early discharge policies have prompted more than half the states to enact laws or regulations that require insurers to cover minimum maternity stays. The requirements are similar but vary in detail and are limited in scope. Some are highly prescriptive, specifying, for example, the minimum length of postpartum stay (generally 48 hours following a normal delivery and 96 hours after a cesarean section), who is authorized to make decisions on postpartum stays, and the extent of follow-up care to be provided after discharge. Some states prohibit health plans from providing any incentive or disincentive that might encourage physicians to shorten maternity stays. Regardless, these requirements do not apply to about half of employer-sponsored insurance plans—those that are self-funded and, thus, not subject to state regulation under the Employee Retirement Income Security Act of 1974 (ERISA). In addition, many states do not apply such requirements to their Medicaid programs or to state employee health plans. Questions also arise when individuals live in one state but work and receive employer-sponsored insurance in another. Therefore, the Congress

is considering legislation to make maternity care more consistent nationally and available to all privately insured women.

Most of the experts we contacted agree that the debate over postpartum hospitalization needs to focus on overall quality of maternity care rather than the length of stay. What is more important is applying early discharge decisions selectively and ensuring that there is early, ongoing, and comprehensive care, including prenatal education and appropriate follow-up services.

Background

Childbirth is the most frequent reason for hospital admission in the United States, with about 4 million deliveries each year. Under pressure to contain rising premiums, some health plans have adopted guidelines to encourage early discharges of mothers and newborns from hospitals after birth.[2] Prices negotiated between hospitals and managed care plans are usually flat, per diem rates that are all-inclusive for treatment, room, and supplies. For example, a normal birth may be paid at a rate of $1,000 a day, regardless of the particular day in a patient's stay. Since the services required by the new mother and infant are not nearly as intense on the second day, the price charged for the discretionary day encourages plans to have new mothers and their babies discharged early from the hospital. The health plan would derive a savings of $1,000 from early discharge, which may be partially offset by the cost of any additional prenatal classes and follow-up care.

Over the last 15 years, the amount of time most newborns stay in the hospital has been reduced by nearly half.[3] Centers for Disease Control and Prevention data show that the national average length of stay for all normal newborns (including those delivered vaginally and by cesarean section) was 1.8 days in 1994, down from 3.2 days in 1980.[4] (See fig. 1.) Although this trend is evident in all regions of the country, American Hospital Association survey data show regional variation of almost a full

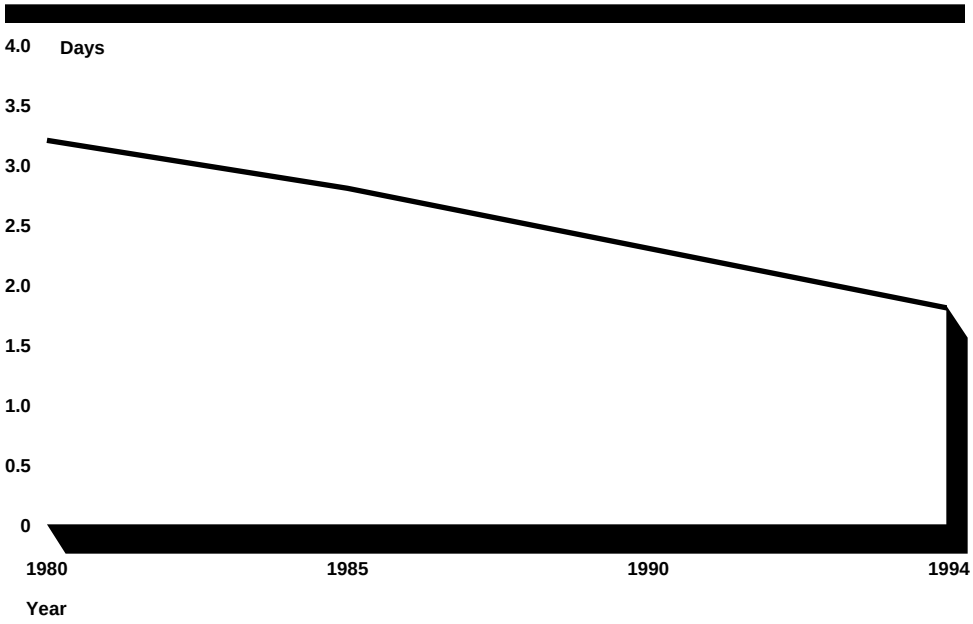
[2]The terms "early discharge" or "short stay" have been used interchangeably. AAP defines early discharge as a postpartum hospital stay of less than 48 hours for a normal vaginal delivery and less than 96 hours for a delivery by cesarean section.

[3]There has also been a steady decline in the maternal lengths of stay (measured as the period from admission to discharge). Although on average cesarean section stays are longer, the rate of decline in lengths of stay for vaginal and cesarean deliveries has been about the same. The average stay for a vaginal delivery dropped from 3.2 days in 1980 to 2.0 days in 1993. Similarly, for a cesarean section, the average stay declined from about 6.5 days to 3.9 days over this period. See Centers for Disease Control and Prevention, National Center for Health Statistics, National Hospital Discharge Survey.

[4]National Hospital Discharge Survey.

day.[5] For the first half of 1995, the longest newborn length of stay was 2.5 days in the mid-Atlantic and West South Central regions and the shortest length of stay was 1.6 days in the Pacific region.

Figure 1: Average Length of Stay for Normal Newborns, 1980-94



Source: Centers for Disease Control and Prevention, National Center for Health Statistics, National Hospital Discharge Survey.

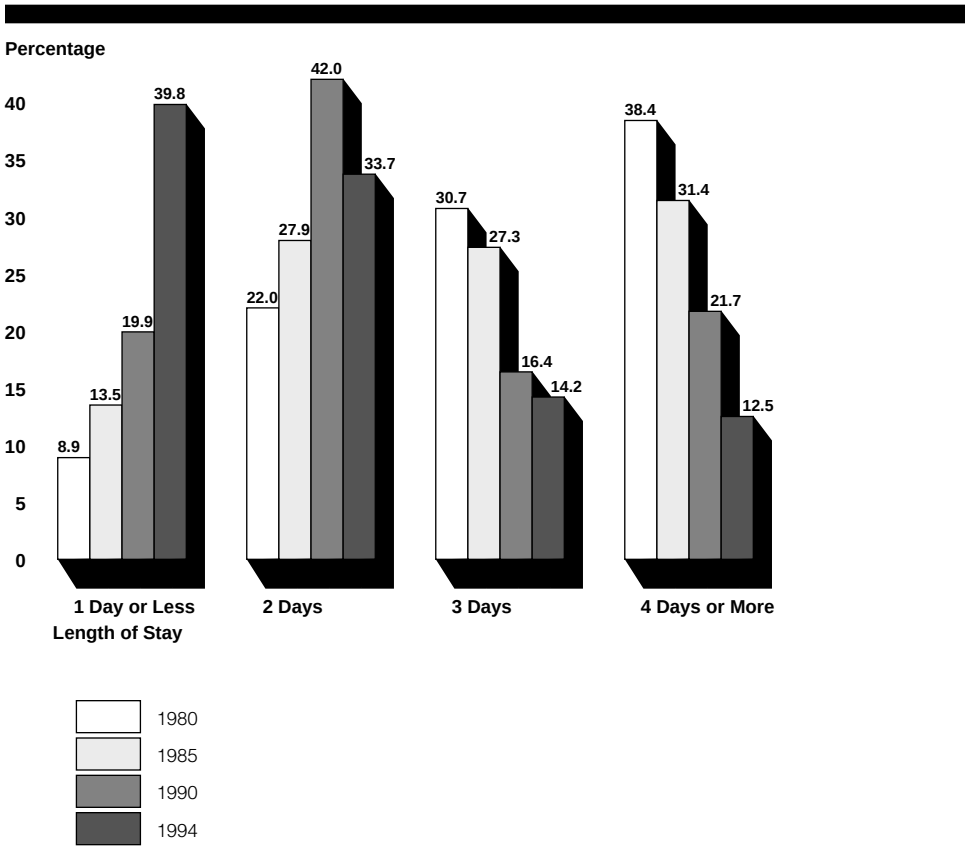
The percentage of 1-day stays for all newborns, which includes those delivered vaginally and by cesarean section, increased dramatically between 1980 and 1994. In 1994, 39.8 percent of newborns were discharged within 1 day, 33.7 percent at 2 days, and the rest stayed longer. By contrast, only 8.9 percent of newborns had 1-day stays in 1980.[6] (See fig. 2.) An analysis of about 180,000 deliveries in the Minneapolis-St. Paul metropolitan area from 1990 to 1994 indicated that the percentage of 1-day

[5]American Hospital Association, Maternal and Newborn Length of Stay (Chicago: Dec. 1995).

[6]National Hospital Discharge Survey.

stays for all normal newborns with commercial indemnity coverage generally tracked that of infants with private managed care coverage.[7]

Figure 2: Distribution of All Newborn Lengths of Stay, 1980-94



Source: Centers for Disease Control, National Center for Health Statistics, National Hospital Discharge Survey.

In addition to health plans' limits on maternity coverage, these trends reflect changes in patient preferences, medical technology, and the organization of health care delivery. Since the 1970s, many maternity patients have requested shorter hospital stays because of a growing

[7]Minnesota Hospital and Healthcare Partnership, Hospital Discharge Patterns for Pregnancy, Seven County Metro Area, 1985-First Quarter 1995 (St. Paul: Jan. 1996). In 1992, 44 percent of the population in the Minneapolis-St. Paul metropolitan area was enrolled in health maintenance organizations (HMO).

interest in less medical intervention for childbirth. In addition, improved use of anesthesia and the capacity to detect potential problems and intervene early enabled women to recover more quickly and deliver healthier newborns.

Evidence of Short Stays' Effect on Newborns' Health Is Inconclusive, Yet Concerns Prompted Revision of Guidance

Studies comparing the rates at which short-stay and longer-stay newborns are readmitted to the hospital for treatment show conflicting results. Regardless, clinicians critical of short postpartum stays assert that many health problems are not detectable in the first 24 hours of life. They are concerned that with a shorter stay, many newborns are not properly screened for metabolic and genetic disorders and many more leave the hospital with undetected diseases. Some also believe that shorter stays make it difficult to assess the mother's ability and readiness to care for her newborn. Yet health plans and some medical experts are skeptical that a slightly longer hospital stay will adequately address newborns' health risks and, therefore, emphasize establishing discharge criteria and comprehensive follow-up care.

Research Shows Mixed Results on Risk of Newborn Readmissions

There is no conclusive evidence that discharging women and their babies less than 48 hours after childbirth has or does not have adverse effects on the health and well-being of mothers and newborns. In December 1994, the Department of Health and Human Services' Maternal and Child Health Bureau met to evaluate the results of studies on whether the early discharge of newborns might affect metabolic screening, breast-feeding, readmission rates, and mortality rates. Noting numerous methodological flaws in these studies, the medical specialists found no conclusive evidence that early discharge following delivery had adverse effects. However, they noted that "failing to prove that shorter hospital stays are unsafe . . . is not the same as proving they are safe."[8]

Several recent studies on the effect of early discharge policies use data on hospital readmissions as an indicator of an adverse outcome. If an adequate medical review before a newborn's discharge is not conducted, medical conditions that require hospital treatment may not be identified. One such study, which looked at more than 123,000 vaginally delivered newborns, found no association between the number of days a newborn spends in the hospital and the rate of readmission. The readmission rate for infants with a 1-day stay was 1.7 percent; for a 2-day stay, 1.9 percent;

[8]W. Kessel, M. Kiely, A. Nora, and others, "Early Discharge: In the End, It Is Judgment," Pediatrics, Vol. 96, No. 4 (Oct. 1995), pp. 739-42. The Maternal and Child Health Bureau is sponsoring further studies to evaluate the types of care provided in various settings and the resulting outcomes.

and for a 3-day stay, 2.0 percent.[9] Similarly, statistics compiled by HMOs showed that the rehospitalization rate of early discharge infants was comparable with that of babies who were not discharged early. For example, Kaiser Permanente of Northern California examined data on about 19,000 infants born by vaginal delivery (without complications) at its hospitals. It reported no significant differences in rehospitalization rates between newborns discharged before 24 hours (2.7 percent) and those discharged 24 to 48 hours after birth (3.3 percent).[10]

But two other studies that used hospital readmissions as an indicator of an adverse outcome indicate increased risk for newborns discharged within 48 hours of birth. An analysis of normal newborns in National Perinatal Information Center hospitals[11] nationwide (61,991 births) and Massachusetts hospitals (50,843 births) demonstrated an increased risk of rehospitalization as the length of stay was shortened. While actual rates were low (varying between 1 and 2 percent), the authors calculated that a 1-day stay had a readmission risk that was 30 to 40 percent higher than that for a 2-day stay.[12] Similarly, in a study of 15,000 infants in New Hampshire hospitals, researchers found that the risk for hospital readmission within the first 2 weeks of life was 50 percent greater for infants discharged at less than 2 days of life.[13]

Regardless of their results, however, most of the studies have a number of design weaknesses that limit their conclusiveness.[14] First, most studies are limited to readmissions that occur in the same hospital where the infant was born. Health professionals acknowledge, however, that many infants with birth-related complications go to specialty hospitals and would

[9]The study also looked at data on 32,000 cesarean section deliveries and found a significant association between length of stay and readmissions: 4.3 percent of babies who had had 1-day stays were readmitted, compared with 1.0 to 1.4 percent of babies who had had stays of 2 days or more. See Dave Foster and Linda Schneider, Hospital Length of Stay and Readmission Rates for Normal Deliveries and Newborns: Relationship to Hospital, Patient, and Payer Characteristics (Baltimore, Md.: HCIA, Inc., July 1995).

[10]Peter I. Juhn, "Newborn Length-of-Stay and Hospital Readmission: Does Early Discharge Lead to Adverse Outcomes?" Health Services Research: Implications for Policy, Health Care Delivery and Clinical Practice, proceedings of the AHSR 13th Annual Meeting (June 9-11, 1996), p. 53.

[11]Nineteen perinatal facilities participate in the Center's data-reporting service.

[12]R. Schwartz, Q. Zhao, and R. Kellogg, data presented at Implications for Early Discharge of Mothers and Neonates From Hospitals (Bethesda, Md.: Maternal and Child Health Bureau, Dec. 2, 1994).

[13]J. Frank, data presented at Postpartum Stay: A No-Win for Managed Care? (Washington, D.C.: National Health Policy Forum, Feb. 22, 1996).

[14]For a comprehensive review of earlier investigations, see P. Braveman, S. Egerter, M. Pearl, and others, "Early Discharge of Newborns and Mothers: A Critical Review of the Literature," Pediatrics, Vol. 96 (1995), pp. 716-26.

therefore not be captured as readmissions. Second, the studies do not control for factors other than length of hospital stay that may contribute to readmission rates. A low readmission rate, for example, may be due to good postpartum care—not to the length of stay. Third, some studies are based on relatively small numbers of observations or geographically restricted areas, and some examine only highly selected, healthy, and middle-class populations. It is unclear, then, whether the outcomes would be similar for other populations. Finally, most of these studies address only hospital readmissions, an indicator of serious medical morbidity. It is possible that early discharges can lead to subtler problems evidenced by more frequent nonadmission contacts with health professionals, such as emergency room visits and unscheduled physician appointments.

Early Discharge Raises Concerns About Detecting Preventable Neonatal Problems

Many health professionals believe that short hospital stays increase the risk that neonatal problems will go undetected or that babies will leave the hospital before accurate health screening results are obtained. Some pediatricians and obstetricians report seeing many more babies with jaundice, infection, and dehydration caused by difficulty in breast-feeding.[15] Clinicians also express concern that mothers need more time to recuperate and learn how to care for their newborns, as they see new mothers struggling with breast-feeding, fatigued, and suffering from strep and urinary infections that could have been detected with an extra day in the hospital.

Severe metabolic diseases, such as phenylketonuria (PKU), may not be accurately detected before 24 hours after birth and, if untreated, can lead to mental retardation. A test given earlier than 24 hours after birth is more likely to show a false negative result and requires retesting after the first day to be conclusive. A 1995 study of PKU screenings found that in states that do not mandate rescreenings, retesting for PKU occurred at only 48 percent of nurseries that typically discharged newborns less than 24 hours after birth.[16] In addition, the study found that only 64 percent of pediatricians in these states rescreened for PKU, with some tests performed as late as 28 days after birth—later than the optimal 21 days to begin

[15]Breast-feeding protects infants from infections and allergies and has been linked to the optimal development of the brain and other organs.

[16]Laura N. Sinai, Susan C. Kim, Rosemary Casey, and others, "Phenylketonuria Screening: Effect of Early Newborn Discharge," Pediatrics, Vol. 96, No. 4 (Oct. 1995), pp. 605-608. Many states recommend repeat screenings 2 to 3 days after birth if initial tests were done less than 24 hours after birth. Rescreening is required in only five states: Nevada, New Mexico, Oregon, Texas, and Utah. See Council of Regional Networks for Genetic Screenings, Newborn Screening Committee, "National Screening Report 1992" (Atlanta: Dec. 1995).

treatment. States that require rescreening have considerably better retesting rates: 100 percent of pediatricians in those states conducted rescreening, and 93 percent retested between 72 hours and 2 weeks.

Although limited, some evidence exists that early discharges also may have an effect on the mother's well-being and her ability to care for the newborn. In a study of about 900 middle-class HMO patients who were discharged in less than 48 hours and received at least one home visit, researchers found significant maternal transitory depression and inadequate breast-feeding.[17] Another study reported a tendency to discontinue breast-feeding among the early discharge group.[18] Data on the effect of early discharge on psychosocial stresses are also limited, but a number of experts and practitioners we spoke with are concerned that shorter hospital stays decrease the opportunity to identify inexperienced, inept, or other potentially harmful behavior toward the infant.

Professional Guidelines Focus on Discharge Criteria Rather Than Timing

Health plans and some medical experts we contacted assert that a slightly longer hospital stay may not be enough to address newborn risks, because many neonatal medical problems cannot be reliably detected until 72 hours after birth. These professionals, therefore, believe that short postpartum hospital stays can be safe or safer than traditional 48-hour stays if professionally recommended discharge criteria are met and comprehensive follow-up care is provided. They further assert that screening services can be appropriately provided at home or in a physician's office.

To help ensure adequate maternal and newborn care, AAP and ACOG jointly published guidelines for hospital maternity stays in 1992, and AAP amplified this guidance in a 1995 policy statement.[19] AAP/ACOG recommended that mothers and newborns be hospitalized until certain medical criteria and conditions are met. These include an absence of medical complications, completion of at least two successful feedings, performance of certain laboratory tests, and a documented ability of the mother to care for the baby. (See app. I for more details.) AAP guidance recommends that most mothers and newborns have a 48-hour hospital stay to complete testing

[17]P. Jansson, "Early Postpartum Discharge," American Journal of Nursing, 1985, pp. 547-50.

[18]Robert Dershewitz and Richard Marshall, "Controversies of Early Discharge of Infants From the Well-Newborn Nursery," Current Opinion in Pediatrics 1995, 7:494-501.

[19]See AAP Committee on Fetus and Newborn and ACOG Committee on Obstetrics, Guidelines for Perinatal Care, 1992, and AAP, "Hospital Stay for Healthy Term Newborns," Pediatrics, Vol. 96, No. 4 (Oct. 1995).

and monitoring. It further states that the length of stay should be a decision made by the mother and her doctor and not a policy established by health plans. "The fact that a short hospital stay for healthy term infants can be accomplished does not mean that it is appropriate for every mother and infant. Each pair should be evaluated individually to determine optimal time of discharge." In cases where the mother and physician agree to discharge prior to 48 hours, a follow-up evaluation, including metabolic screening if necessary, is recommended.

Integrated Approach to Maternity Care Should Accompany Early Discharge Policies

Increasingly, health care providers believe that the debate over postpartum hospitalization should focus on the provision of a full range of maternity services, rather than on the length of the hospital stay. Health plans with early discharge programs contend that these services can be effectively delivered in settings other than the hospital where they are traditionally provided. Many physicians and other health care professionals we contacted agreed that what matters most is whether mothers and newborns receive a comprehensive set of services before, during, and after their hospital stays.

To provide a continuum of care, several large health plans and hospitals with short-stay policies have established early discharge programs. These programs generally include an assessment and education component during prenatal care, a hospital stay that is determined by the attending physician, and a home visit by a maternal and child health nurse within 48 to 72 hours after discharge. According to program officials, patients are more satisfied with their care, and outcomes have improved—fewer rehospitalizations for mothers and infants and fewer infant acute care visits. There is some evidence, however, that some health plans with early discharge policies do not offer a well-integrated program that meets recommended standards. Studies have shown that a home visit following a 1-day postpartum stay rarely occurs.

Some plans' organizational structures may make it difficult to develop a comprehensive approach that would help ensure that timely and appropriate care is provided. Physicians employed by group/staff model HMOs may be well positioned to coordinate all patient care, including prenatal and follow-up services. But in fee-for-service indemnity plans and other types of HMOs, physicians often make discharge decisions with only limited information about the specific follow-up services to be provided, and the responsibility for making arrangements for such care is left to the

mother. Furthermore, in some HMOs, financial incentives for physicians to discharge patients early may unduly influence the decision-making.

Adding Assessment and Education Components to Prenatal Care May Help Reduce Health Risks

Some health plans have added to their prenatal care an assessment component to identify medical and psychosocial problems that may complicate pregnancy or delivery.[20] Many of these plans use a standardized checklist to assess the mother's overall health needs and to tailor her care to meet those needs. Health plans also use the prenatal assessment to identify patients who are candidates for early discharge after childbirth. For example, obstetricians at a large group/staff model HMO told us that only women who meet specific program participation criteria developed by a team of physicians and nurses are eligible for early discharge programs. They do not consider early discharge to be a viable option for patients who are likely to have complicated pregnancies.

Several of the programs we contacted also provide extensive prenatal education to prepare women for a short hospital stay. In addition to classes on labor and delivery, these programs educate women on self-care, such as smoking and substance abuse cessation, and nutrition. Some education that traditionally has been provided in the hospital during the maternity stay is now being offered during the prenatal period. Many of these programs believe that because of the range of hospital-related stresses, the immediate postpartum period may not be the best time to educate the mother on breast-feeding and caring for the baby at home. In addition, plans use the prenatal period to explain the benefits of a short hospital stay, such as reducing the health risks that can occur with a longer stay. Studies show that the chances of newborn infection increase the longer the newborn remains in the hospital.

Not all women are assured of receiving prenatal education and risk-screening. Mothers in some plans are responsible for arranging their own risk assessment and education classes. One large independent practice association (IPA) model HMO we visited entitles patients to reimbursement of up to $40 for participation in prenatal education classes, but it is the women's responsibility to find and enroll in such a class and apply for reimbursement. Similarly, the HMO asks pregnant women to

[20]Although not all women have a prenatal care visit early in their pregnancies, HMO enrollees are more likely to have visits. A 1994 RAND Corporation study reported that 87 percent of women in HMOs have a prenatal visit during the first trimester compared with the national average of 76 percent. See P. Murata, E. McGlynn, A. Sui, and others, "Quality of Care for Prenatal Care: Comparison of Care in Six Health Care Plans," Archives of Family Medicine, Vol. 3, No. 1 (Jan. 1994), pp. 41-49.

complete and return a questionnaire to help the plan identify those at high risk.

Greater Plan Flexibility Would Enable Physicians to Make Discharge Decisions on the Basis of Patient Needs

Health care professionals we contacted told us that within a program that provides comprehensive care, early discharges were acceptable as long as medical and social criteria are met and discharge decisions are made by the attending physician. With extensive prenatal assessment and education and arrangements for follow-up care, most mothers and newborns are deemed ready for discharge within 36 hours.[21] To meet typical discharge criteria, the mother and baby must be medically stable; the mother must show competence in feeding her baby; and any perceived psychosocial problems with the mother, present family members, or both must be resolved. Metabolic screening tests for the infant must be done before discharge; if performed before the infant is 24 hours old, arrangements must be made to repeat the screen. Arrangements for follow-up care also must be made, including a home visit 2 to 3 days after discharge, an emergency medical contact, and pediatric care.

Many of the programs we visited stressed the importance of flexibility in early discharge decision-making.[22] At an HMO with about 2,000 maternity cases each year, women learn about the discharge program early in the pregnancy, but they are encouraged to wait until delivery to decide about their length of stay. Many women have longer than a 1-day stay because they or their physicians determine that they are not ready to be discharged. At a plan considered by experts to have an outstanding short-stay program, this flexibility, along with strict eligibility screening, has resulted in about 60 percent of the plan's maternity patients being discharged early.[23]

Some plans, however, provide financial incentives for physicians to reduce maternity stays, according to the physicians and health policy experts that we contacted. Plans may keep profiles on their physicians' practice

[21]Most of the plans and hospitals we contacted consider the mother and baby to be a pair for discharge purposes. Separating the pair may have an adverse effect on maternal-infant bonding and on breast-feeding, which has long-term health benefits.

[22]Some insurers provide coverage for longer maternity stays. Because most hospitals are not aware of the specific coverage limits for each patient, however, they defer to the discharge policy that is generally held by insurers in their community for all maternity patients.

[23]Responding to health plans' policies of covering only 24 hours of postpartum care, some hospitals provide mothers and newborns with a 48-hour postpartum stay at no cost to the patient, even if not covered by the insurer. At one hospital that adopted such a policy, nearly all eligible patients (those with uncomplicated vaginal deliveries) accepted the offer of an extra day on the maternity ward.

patterns and may drop them from the networks or reduce their payment depending on their conformance with early discharge policies. In some cases, plans require documentation or utilization review and preauthorization before agreeing to pay for an extended hospital stay or for a follow-up visit. In addition, with the dozens of varied health plan policies to work with, providers are often uncertain about the circumstances surrounding an early discharge. The physicians we met with also told us discharge decisions were sometimes made without knowing whether prenatal education was provided or appropriate follow-up care would be available.

Furthermore, many health care professionals assert that the practice of early hospital discharge may not allow for intensive education about breast-feeding or maternal and infant follow-up care. A nationwide representative survey of over 2,000 parents of young children found that short hospital stays provide little time for helping parents learn about newborn care.[24] Less than half of first-time parents reported feeling very confident about caring for their newborns when they left the hospital. According to one California physician, in his experience, postpartum education usually consists of minimal guidance about breast-feeding, a handout about common postpartum problems, and a short talk before discharge.

Follow-Up Care Helps Ensure the Health and Well-Being of Mothers and Newborns

Because most common neonatal problems become evident about 48 to 72 hours after birth, continued medical observation of the newborn is critical. The early discharge programs of several health plans and hospitals take steps to ensure that every short-stay patient receives a follow-up home visit within 24 to 72 hours of discharge by a qualified health professional. Some health plans provide a comprehensive home visit by a registered nurse with maternal and child care experience. The nurse specialist's role begins before discharge with discharge planning, instruction, and counseling.

Outpatient care generally includes an in-home visit, 24-hour telephone access to a nurse, and several nurse-initiated telephone contacts over a 2-week period. At the home, nurses use a standard protocol to structure the visit and direct further follow-up. All protocols we obtained provide guidance for a maternal and newborn physical assessment; a psychosocial assessment of the mother; newborn screening tests, if indicated; parent

[24]K. Young, K. Davis, and C. Schoen, The Commonwealth Fund Survey of Parents With Young Children (New York: The Commonwealth Fund, Aug. 1996).

and family education on baby and maternal care; a home safety assessment; and the opportunity for referral to additional services if a need has been identified. (Table 1 shows a home visit protocol used by a large New England hospital.)

Table 1: Typical Protocol for a Home Visit Following Early Discharge

Maternal assessment	Health history: allergies, prenatal vitamins, birth history, postpartum course Physical examination: vital signs, uterine exam, incision healing, breast changes, signs of postpartum complications Maternal adaptation: activity level, maternal-infant attachment, postpartum depression, social support, parenting issues, environmental risks
Newborn physical examination	Vital signs: cardiac, respiratory, circulatory, neurological Skin integrity Head circumference Abdomen Nutrition: weight, feeding, elimination pattern, sleep/wake cycles, circumcision, collection of lab specimens (PKU/metabolic screens, bilirubin)
Parent and family education	Maternal postpartum self-care Newborn care and safety Newborn feeding Normal newborn behavior and capabilities Developmental stimulation Consoling techniques Family adaptation Primary health care for mother and newborn Immunization Well-child care

(continued)

Follow-up communication and referrals	Primary care providers: appointment for postpartum and family planning, appointment for pediatric visit Referral to other health care professionals, as indicated: lactation consultant, social services, parent support resources Home visit report sent to appropriate primary care providers

Some programs have developed special arrangements to help ensure that their early discharge patients get home visits. For example, a plan serving a large inner-city population has arranged for local police escorts for nurses who are reluctant to visit patients living in areas that are considered unsafe; plan nurses also use a buddy system when they enter potentially unsafe areas. Another health plan with a mandatory home visit component requires nurses to immediately notify the patient's physician if the mother refuses to schedule a home visit. Several hospital-based maternity care programs we visited provide at least 90 percent of their early discharge patients with a follow-up home visit.

Nevertheless, many short-stay maternity patients are not receiving recommended follow-up care. A recent nationwide study found that home visits following discharge occurred in a minority of cases. Only 20 percent of parents with children under age 3 reported a home visit by a nurse or other health professional to teach them about infant care and to check the baby.[25] Similarly, a study in the Minneapolis-St. Paul metropolitan area found that the percentage of normal newborn discharges with home care was 9.6 percent for 1-day stays and 7.9 percent for 2-day stays in 1995.[26] Possible explanations for these low rates are that parents are not aware of the importance of home care or do not know that it may be a covered service. Also, many first-time mothers may not know how to arrange for follow-up care. One large, multistate HMO with a 24-hour discharge policy relies on mothers to request and schedule a home nurse visit after discharge from the hospital.

In addition, some follow-up services do not meet recommended standards. One plan serving a large rural population specified in its contract with a home health agency that follow-up service consist of a single telephone

[25]In the surveyed group, half of the mothers who delivered vaginally were discharged in 1 day or less. See The Commonwealth Fund Survey of Parents With Young Children.

[26]Hospital Discharge Patterns for Pregnancy, Seven County Metro Area, 1985-First Quarter 1995.

call to the mother, which does not allow for the type of direct observation that AAP/ACOG guidelines and other experts recommend. One contracted home health agency has employed an oncology nurse for home visits, although experts recommend that these visits be conducted by professionals experienced in maternal and child health care. Some home health agencies have reduced follow-up home care visits to 10 to 15 minutes—which is not enough time to conduct a comprehensive assessment. Some home health agencies have failed to conduct the assessment within the recommended 2 to 3 days after discharge or have failed to conduct the assessment at all. According to home health agency officials, these weaknesses are due, in part, to the increased demand for follow-up services, which has strained the capacity of their home health nurses.

Growing Number of States Are Passing Maternity Care Legislation

State legislatures have become increasingly concerned about the potential consequences of short maternity stays.[27] Since Maryland became the first state to pass maternity care legislation in 1995, 29 states have taken similar action.[28] In 25 states, the requirements are consistent with AAP/ACOG guidelines.[29] Another three states and the District of Columbia are actively considering such legislation. California, however, recently became the 10th state to consider but not enact a mandatory maternity stay bill.[30] (For a list of states that enacted laws, see app. II.)

States typically require insurers to cover a minimum length of stay or follow-up care if mothers and newborns are discharged early. The laws are similar but vary in detail and are not applicable to self-insured employer health plans because under ERISA provisions states cannot regulate them. Advocates of a proposed federal maternity care law contend that comprehensive legislation that applies to all insurers is necessary to protect patients from unsafe early discharges. The millions of uninsured women, however, would not benefit from the consumer protections afforded by the legislation.

[27]For an overview of state requirements, see, ACOG, "State Laws and Regulations Requiring Insurance Coverage for Postpartum Care," August 1996, and addendum.

[28]Twenty-eight states have passed laws. New Mexico has promulgated regulations. Tennessee promulgated emergency rules that, although they expired Aug. 4, 1996, were subsequently ratified by the state legislature when a law was enacted authorizing the promulgation of permanent rules.

[29]Maternity care legislation in South Carolina establishes a maximum of 48 and 72 hours for vaginal and cesarean delivery, respectively, while Washington law provides that coverage be based on "accepted medical practice."

[30]Other states that considered but did not enact maternity care legislation are Arizona, Colorado, Hawaii, Mississippi, Nebraska, Utah, Vermont, West Virginia, and Wisconsin.

State Requirements Are Similar but Details Vary

Although not identical, most state requirements include similar provisions prescribing a minimum length of stay, who should make the discharge decision, follow-up coverage, physician protections, and enforcement mechanisms.

Minimum Coverage for Inpatient Care

Nineteen states require that health plans cover a minimum postpartum stay in the hospital of 48 hours following uncomplicated deliveries and 96 hours following a cesarean section. To ensure that the mandatory minimum does not begin when the woman enters the hospital in labor, such laws generally specify that coverage begin at the time of delivery.

Since enactment of the New Jersey law in June 1995, postpartum stays for uncomplicated deliveries at four hospitals there increased by 10 to 12 hours. The average length of stay for vaginal deliveries increased 29 percent, from 1.4 days to 1.8 days; for cesarean deliveries, the average stay increased 18 percent, from 2.8 days to 3.3 days.[31] Medical staff at one New Jersey HMO told us patients have learned that they can extend their stay (to slightly less than 48 hours) and still receive a follow-up visit at home. According to the staff, the law has significantly increased the HMO's expenses because it must cover a slightly extended inpatient stay as well as the costs associated with home visits. As a result, they are concerned that they may have to implement the 48-hour minimum stay and discontinue their home visit program.

Some states do not stipulate coverage for a specific inpatient stay. Although they do not mandate a specific time per se, seven states mandate that insurers cover maternity stays in accordance with the medical criteria outlined in the AAP/ACOG guidelines. Providers in Virginia, which requires that coverage be in accordance with AAP/ACOG guidelines but not for a minimum length of stay, told us that there has been little effect on the length of inpatient maternity stays in the state.

Most state maternity care laws allow for exceptions to the inpatient care requirements. They recognize that an early discharge may be acceptable for some women and newborns if appropriate follow-up services are promptly provided. Consistent with AAP/ACOG guidelines, states generally provide such exceptions where follow-up care, such as home visits, parent education, and performance of clinical tests, is available.

[31]A study comparing lengths of stay 6 months before and 6 months after enactment included data on 9,000 births, representing 8 percent of births statewide. See Centers for Disease Control and Prevention, "Average Postpartum Length of Stay for Uncomplicated Deliveries—New Jersey, 1995," Mortality and Morbidity Weekly Report (Aug. 16, 1996).

Discharge Decision-Making

States with maternity care requirements provide that the authority to make decisions on postpartum stays rests with the attending physician, patient, or both. In 11 states, early discharge is permitted only upon the recommendation of the attending physician and then only if the mother consents or is at least consulted.[32] Seven other states provide for the decision to be made by the attending physician, usually based on medical necessity or whether the mother and newborn meet the AAP/ACOG guidelines. In Kentucky, New York, and New Jersey, the decision about when to go home rests solely with the mother.

Under the original Maryland law, the insurer could choose to cover less than a 48- to 96-hour stay if a newborn met the AAP/ACOG criteria for medical stability and at least one postpartum home visit (including newborn screening) was authorized. Because the home visit was much less expensive than another day of hospital care, many insurers chose early discharge. This was of such concern to Maryland legislators that the law was subsequently amended to provide that the decision regarding length of stay be made by the mother after conferring with her physician.

Provider Independence

Where state requirements provide for physicians to decide how long a hospital stay is needed, a physician can determine, on the basis of medical necessity, that early discharge is not appropriate or a stay beyond the days stipulated in the law is required. Because health plans must cover additional inpatient care, however, physicians may be reluctant to prescribe longer hospital stays out of concern that this will jeopardize their participation or good standing in provider networks. Many managed care organizations monitor physician performance to ensure compliance with contract provisions governing utilization and reimbursement. Many physicians we spoke with said dependence on managed care plans to sustain a viable practice was an influence in decisions regarding early discharge.

To curb health plan attempts to limit hospital stays, many states have additional requirements to protect physicians under contract with health plans when they prescribe postpartum care. Seventeen states that mandate minimum stays for new mothers or require that maternity care decisions be consistent with AAP/ACOG guidelines also provide some degree of protection to physicians making such decisions. For example, in Massachusetts, where HMOs have about 40 percent of the market, insurers may not terminate services; reduce capitation payments; or penalize an

[32]Missouri and Ohio laws prohibit insurers from offering money or gifts to encourage mothers to choose early discharge.

attending physician, nurse-midwife, or hospital for not discharging a maternity patient early. In New Mexico, regulations prohibit insurers from providing any financial incentive or disincentive to a provider to encourage early discharge.

Follow-Up Care

According to AAP/ACOG guidelines, if a patient is discharged from the hospital with less than the minimum stay, a follow-up visit by providers competent in postpartum care must be furnished within 48 hours. Twenty-three states have requirements addressing postpartum outpatient care. The types of follow-up services required in cases of early discharge vary, but such services are generally required only for mothers and newborns who are discharged early.

Most states with this type of requirement prescribe home visits and specify their timing and content. New Jersey specifically requires a minimum of three home visits be covered. New Mexico does also, unless the attending physician or home care provider determines that one or two visits are sufficient. Other states specify that one or two visits must be covered. New York, which specifies at least one visit, prohibits the charging of deductibles, coinsurance, or copayments for the visit.

States that do not specify a number of visits generally provide that insurers must cover care that is "medically necessary" or considered necessary by the attending provider. Under Tennessee's recently enacted law, rules must be promulgated to establish minimum standards of insurance coverage, but it is unclear whether insurers will be required to cover or simply offer minimum benefits. While they address follow-up care, the laws in Massachusetts and Rhode Island do not explicitly require insurers to provide coverage for such care.

Regardless of the legal provisions in place, states may not be able to ensure that home visits are of adequate quality or that they take place at all. A potential problem may arise if an insurer offers appropriate outpatient services after early discharge but does not ensure follow-up care takes place. While an insurer may comply with the requirement because coverage is provided for home visits, such visits may not be made because the mother does not know that such visits would be covered and, for that or other reasons, does not schedule them. Thirteen states require insurers to provide notice of coverage to policyholders, while New York requires hospitals to give all pregnant women they admit a leaflet developed by the state explaining coverage.

Implementation and Enforcement

In general, state insurance departments are responsible for overseeing and enforcing state maternity care requirements, including the promulgation of any implementing regulations. Seven states expressly provide for the promulgation of implementing regulations. As with any insurance requirement, consumers can report violations of the maternity care requirements to their state insurance department.

States have taken somewhat different approaches to the implementation and enforcement of maternity care requirements. Some states, for instance, require notification of one type or another. For example, New York provides notification to new parents by requiring its Health Department to add language to the explanatory leaflet pregnant women receive when they are admitted to the hospital, suggesting that parents check their insurance policies. In New Mexico, where early discharge is permitted only if the mother consents, each insurer is required to provide notification to the state through periodic reports that identify instances of early discharges of either mothers or newborns that were against the mothers' wishes.

States have also established explicit penalties for noncompliance. In Alabama, for instance, the Department of Insurance has the express authority to suspend or revoke an insurer's license and impose penalties on any insurer that violates the law. In Ohio, insurers that violate the maternity care provisions are subject to penalties for engaging in unfair and deceptive acts under the state insurance code.

Finally, some states have required studies of the effects of maternity care measures. Florida, which has issued voluntary practice guidelines, has directed its Agency for Health Care Administration to evaluate the clinical effects of shorter postpartum hospital stays and the effect of the state's law, and to report back to the legislature by January 1, 1998. Washington's Health Care Policy Board must analyze the effects of the Washington law—if funds are available—and submit a final report to the legislature by December 15, 1998.

Many Health Plans Are Not Covered by State Requirements

Not all health plans are required to comply with state maternity care requirements. As a result, millions of patients are unlikely to benefit from such state laws because they receive health coverage through employer or government-sponsored health plans, or an insurer outside the jurisdiction of their state. To address these limitations, some contend that a federal maternity stay law is needed to back up state laws.

Under ERISA, states can regulate insurers but cannot directly regulate self-insured employer-sponsored health plans. As a result, employers who self-insure—that is, they pay their employees' health care claims directly rather than purchasing health care coverage from an insurer—do not have to provide coverage specified in state laws.[33] We estimate that about 44 million people in the United States have hospital insurance not regulated by state law because they or their spouses are employed by companies that self-insure. Massachusetts and New York have partially overcome this limitation by imposing requirements directly on hospitals to provide minimum postpartum stays. This ensures that women have access to adequate care (even if they are uninsured) but is independent of requirements related to coverage for such care. In those states, hospitals are at risk of losing state licensure if they do not provide such care, but self-insured employer health plans would not be required by state law to pay for that care.

In addition, not all states made their maternity care laws applicable to state-employee health plans or Medicaid programs.[34] Of the 29 states with maternity care requirements, 11 made them applicable to the state Medicaid program and 10 to state employees. Although they may choose to comply with state requirements in many cases, the Federal Employee Health Benefit Plan and the Civilian Health and Medical Program of the Uniformed Services have statutory authority to disregard state requirements related to health insurance.

In addition, difficulties often arise when a person lives in one state but works or receives care in another state. States may regulate only those businesses that have certain minimum contacts within their borders. As a result, state laws do not cover a health plan operating outside the state. If a woman receives care through a plan that is based in another state, it is unlikely that she will be protected by her home state's maternity care requirements.

Legislation is being considered in the 104th Congress that would impose a single federal standard applied to self-insured plans as well as commercial

[33]ERISA generally blocks states from imposing requirements on employer-sponsored health plans. Because the act specifically permits states to regulate insurers, states can indirectly regulate many such plans by imposing requirements on the insurance these plans purchase. There is an increasing trend for employers to self-insure. In such cases, although the employer may contract with a third party administrator to manage the plan, the employer pays the health care expenses for its employees directly. In such cases, state maternity care laws will have no direct effect on maternity coverage.

[34]Disabled women under age 65 who are covered by Medicare would also not be covered by state maternity care requirements.

insurers. For example, on September 5, 1996, the Senate passed provisions[35] that would mandate coverage for a minimum 48-hour hospital stay for normal vaginal deliveries and 96-hour stays for cesarean section deliveries unless the attending provider, in consultation with the mother, makes the decision to discharge early and coverage is provided for prescribed timely follow-up care. Timely care would be defined as care that meets the health care needs of the mother and newborn, provides for appropriate monitoring of their conditions, and occurs within 24 to 72 hours immediately following discharge. Each state would generally be obligated to enforce the federal maternity care standards within its borders, but the Secretary of Labor would enforce them where states did not meet this obligation. Under the Senate measure, ERISA's preemption provision would not be affected or modified, but with respect to employee health benefit plans, the maternity care requirements would be enforced by the Secretary of Labor just as certain ERISA requirements are currently enforced.

If enacted, the legislation would provide nationwide protection—at least to mothers and newborns with health insurance. It would expressly apply to state employees, but there is no provision respecting its application to state Medicaid program recipients.

Conclusion

Although the public debate over maternity care has focused on the shortening of the hospital stay after childbirth, the critical issue is whether mothers and newborns are receiving all necessary services. Some services traditionally given in the hospital may be just as effectively furnished in other settings. For example, prenatal care at a clinic or physician's office can provide education regarding parenting and infant care. Medical professionals can conduct breast-feeding instruction and metabolic screening tests at a patient's home or a clinic.

Discharging mothers and babies after a postpartum stay of less than 48 hours appears safe in those cases where the policy is selectively and flexibly applied to uncomplicated vaginal deliveries and where proper follow-up services are provided. Some health plans have established comprehensive early discharge programs demonstrating that short stays do not result in adverse outcomes. However, not all patients are assured of receiving the full range of appropriate services. There is evidence that women and newborns are being discharged early without much follow-up

[35]These provisions are part of the Department of Veterans Affairs appropriations bill. The House of Representatives version of this bill does not include these provisions, and differences between the two bills will be resolved in conference.

care. Even when follow-up care is provided, it is not always delivered in a timely manner by properly trained health professionals.

Requiring insurers to either cover hospital stays of 48 hours for vaginal births or cover follow-up care within 72 hours of discharge may be giving the public a false sense of security. Extending hospital stays to 48 hours may provide for more medical surveillance, but it does not include the period when many neonatal problems usually occur—at 3 days of age. Follow-up care can be a safety net to protect mothers and newborns who are discharged early only if the appropriate services are actually provided.

Comments

Because information in this report did not deal specifically with federal agencies, we did not seek agency comments. We did, however, circulate a draft of the report to outside experts, who generally agreed with the presentation of material. The technical suggestions they offered were incorporated where appropriate.

We are sending copies of this report to other interested Members of Congress and will make copies available to others upon request.

Please call me on (202) 512-7119 if you or your staff have any questions. Other major contributors include Rosamond Katz, Ann White, Martha Elbaum, and Craig Winslow.

Sincerely yours,

Sarah F. Jaggar
Director, Health Services Quality
and Public Health Issues

Contents

Abbreviations

AAP	American Academy of Pediatrics
ACOG	American College of Obstetricians and Gynecologists
ERISA	Employee Retirement Income Security Act of 1974
HMO	health maintenance organization
IPA	independent practice association
PKU	phenylketonuria

Maternity Care Recommendations From Obstetric and Pediatric Providers

Assessment category	Criteria
Maternal health	Antepartum, intrapartum, and postpartum courses are uncomplicated
	Vaginal delivery
Newborn health	Single birth at 38 to 42 weeks' gestation
	Vital signs are normal and stable
	Newborn urinating and stooling successfully
	At least two successful feedings documented
	No abnormalities that require continued hospitalization
	No excessive bleeding at circumcision site for at least 2 hours
	No significant jaundice in the first 24 hours of life
Maternal and family education	Demonstrated knowledge of breast- or bottle-feeding and of cord, skin, and infant genital care
	Ability to recognize signs of illness and common infant problems, particularly jaundice and dehydration
	Proper infant safety, for example, car seat use, positioning for sleep
	Family or other support persons available who are familiar with lactation and newborn care and illnesses
Immunization and screening tests	Maternal syphilis and hepatitis B surface antigen status
	Cord or infant blood type and direct Coombs test result as clinically indicated
	State regulated screening tests—if performed before 24 hours of milk feeding, a system for repeating the test must be ensured during the follow-up visit
	Hepatitis B vaccine administered or an appointment made within the first week of life for its administration
Outpatient care	Identified physician-directed source of continuing medical care for both mother and baby
	If discharged less than 48 hours after birth, definitive appointment made for the baby to be examined within 48 hours of discharge; follow-up can take place in a home or clinic as long as personnel are competent in newborn assessment and the results are reported to the infant's physician on the day of the visit
	Evaluation should include general health, hydration, feeding pattern and technique, stool and urine patterns, maternal/infant interaction, review of laboratory test results or screening tests performed as indicated

(continued)

Assessment category	Criteria
Family, environmental, and social risk factors	Untreated parental substance abuse
	History of child abuse, neglect, or parental mental illness
	Lack of social support, particularly for single, first-time mothers
	No fixed address
	Teen mother

Source: Excerpted from AAP Committee on Fetus and Newborn and ACOG Committee on Obstetrics, Guidelines for Perinatal Care, 1992, and AAP, "Hospital Stay for Healthy Term Newborns," Pediatrics, Vol. 96, No. 4 (Oct. 1995).

States With Maternity Care Requirements as of September 1, 1996

State	Effective date
Alabama	October 1, 1996
Alaska	June 1, 1996
Connecticut	May 24, 1996
Florida	October 1, 1996
Georgia	July 1, 1996
Illinois	September 15, 1996[a]
Indiana	July 1, 1996
Iowa	July 1, 1996
Kansas	April 11, 1996
Kentucky	July 12, 1996
Maine	April 5, 1996
Maryland	October 1, 1995[b]
Massachusetts	February 19, 1996
Minnesota	March 20, 1996
Missouri	August 28, 1996
New Hampshire	January 1, 1997
New Jersey	June 28, 1995
New Mexico	March 1, 1996
New York	January 1, 1997
North Carolina	October 1, 1995
Ohio	October 17, 1996
Oklahoma	May 14, 1996
Pennsylvania	August 31, 1996
Rhode Island	September 1, 1996
South Carolina	October 1, 1996
South Dakota	July 1, 1996
Tennessee	May 13, 1996
Virginia	July 1, 1996
Washington	June 6, 1996[c]

[a]For state employees, effective on July 17, 1996.

[b]Significant amendments effective on July 1, 1996.

[c]For state employees, effective on January 1, 1998.

Source: ACOG, "State Laws and Regulations Requiring Insurance Coverage for Postpartum Care," August 1996 and addendum.

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