California Health Care Foundation

Listening to Mothers in California: Results from a Population-Based Survey of Women’s Childbearing Experiences

Data Snapshot

September 2018
Executive Summary

With half a million babies being born in California every year, childbirth is the number one reason for hospitalization in the state. Yet little is known about women’s childbearing experiences, outcomes, and preferences. Listening to Mothers in California survey aims to fill these knowledge gaps and identify opportunities for improving the experience and outcomes of pregnancy and childbirth.

Listening to Mothers in California is the first fielding of the national Listening to Mothers survey at a state level and in Spanish. It included California women who gave birth to a single infant in a hospital in 2016. Listening to Mothers in California: Results from a Population-Based Survey of Women’s Childbearing Experiences reports selected findings from this survey and highlights important differences by race, ethnicity, and insurance coverage (Medi-Cal, California’s Medicaid program, pays for nearly half of California births).*

Key findings:

- While the vast majority of women used an obstetrician for their prenatal care and births, over half of women said they would definitely want (17%) or would consider (37%) a midwife for a future pregnancy.
- Three-quarters of California’s childbearing women agreed that childbirth is a process that should not be interfered with unless medically necessary. Black and Latina women, and women with Medi-Cal coverage held this belief most strongly.
- Four in 10 women reported that a health professional tried to induce their labor (starting labor before it started on its own). Three-quarters of women who felt pressured by a health professional to have their labor induced had the intervention.
- Only 1 in 7 women with a prior cesarean had a vaginal birth after cesarean (VBAC), despite nearly half of women with repeat cesareans reporting interest in VBAC. Women with prior cesareans reported that providers disproportionately focused discussions and recommendations on having a repeat cesarean birth.
- One in 5 California women reported symptoms of anxiety, and 1 in 10 reported symptoms of depression during pregnancy. Across race/ethnicity groups, Black women were on the high end of the range for symptoms of anxiety and depression, during and after pregnancy.

Finding and Using Information About Quality
Maternity Care Provider and Hospital, California, 2016

BASE: WOMEN WHO FOUND COMPARATIVE QUALITY INFORMATION (n = 1,309)

<table>
<thead>
<tr>
<th>Found Provider Information</th>
<th>Did not use the information</th>
<th>Did use the information</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>4%</td>
<td>36%</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Found Hospital Information</td>
<td>4%</td>
<td>34%</td>
</tr>
</tbody>
</table>

Notes: “Not sure” and “did not find any information” not shown. Not all eligible respondents answered each item.


Care Team and Place of Birth

Over the last decade, more information about the quality of health care has become publicly available. Many expectant women sought and found quality information about prospective maternity care providers (40%) and prospective hospitals for giving birth (38%). Nearly everyone who found this information used it to help decide which prenatal care providers and hospitals to use. At the same time, only one in three women correctly understood that quality of maternity care varies across obstetricians and across hospitals (not shown).
Choice of Prenatal Care Provider by Race/Ethnicity and Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,513)

Overall, 80% of women had a choice of providers for prenatal care; however, only 76% of Latina and 77% of Black women did. Compared with women with private insurance, those covered by Medi-Cal were also less likely to have a choice and were twice as likely to have their prenatal care provider assigned to them. Many expectant mothers appreciate the opportunity to choose a prenatal provider who matches their needs and preferences. Just a fraction of survey participants received no prenatal care.

Notes: Not all eligible respondents answered each item. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. \( p < .01 \) for differences by race/ethnicity and by payer. Segments may not total 100% due to rounding.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Maternity Care Provider Type
Prenatal Care and Birth, California, 2016

BASES: ALL WOMEN WHO ANSWERED THIS QUESTION

- Obstetrician
- Midwife
- Nurse practitioner
- Family physician
- Physician assistant

Obstetricians were by far the most common type of maternity care provider for prenatal care and childbirth. While midwives are the most commonly used maternity care provider in high-income countries with favorable maternal health outcomes* (not shown), only 7% of California mothers used midwives as their main prenatal care providers and 9% as their birth attendant. Midwifery care has consistently been found to be safe and effective, and to result in high satisfaction scores.*


Notes: Not all eligible respondents answered each item. “Other” not shown. Prenatal care is the provider most often providing care during pregnancy. Birth is the provider who delivered the baby. Segments don’t total 100% due to rounding.

Midwife Use: Actual and Future Interest by Race/Ethnicity and Payer, California, 2016

BASES: ALL WOMEN WHO ANSWERED THIS QUESTION

If you have a future pregnancy, how open would you be to having a midwife as your maternity care provider (with doctor care, if needed)?

Interest in using midwives for future births far exceeded current use. While only 9% of women used midwives as birth attendants, 17% said they would definitely want a midwife for a future birth, and 37% would consider it. Black and White women expressed the greatest interest in future midwifery care among racial and ethnic groups. Research consistently finds that midwives provide high-quality, cost-effective, and satisfying care.*


Notes: Data shown for use of midwife as birth provider. Midwives were the main prenatal care providers for 7% of survey participants (not shown). Not shown: “Would definitely not want this” and “not sure.” Not all eligible respondents answered each item. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Differences within groups were not significant.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Reasons for Not Wanting a Midwife for Future Birth
California, 2016

BASE: WOMEN WHO DEFINITELY WOULD NOT WANT A MIDWIFE FOR A FUTURE BIRTH (n = 595)

- I think a doctor provides higher quality care: 63%
- I think a doctor handles emergencies better: 60%
- I already have a maternity care provider (not a midwife) who I like: 42%
- I know about doctors and don’t know much about midwives: 36%
- I have health problems that are best handled by a doctor: 30%
- I thought that midwives did not give care in hospitals: 13%

Notes: Not all eligible respondents answered each item. Respondents could select more than one answer choice. “Other” not shown.

When asked about their maternal care provider preferences for a future birth, one-quarter of women said they definitely would not want a midwife. Their reasons reveal a lack of knowledge about midwives and the high quality of maternal care they provide. While many studies have demonstrated that midwives provide care that is as good as physicians,* 63% of women thought that a doctor provided higher quality care and 60% that a doctor handled emergencies better.

Support from a Labor Doula by Race/Ethnicity and Payer, California, 2016

BASE: WOMEN WHO PRIMARILY SPEAK ENGLISH AT HOME (n = 1,433)

During their recent labor, slightly less than 1 in 10 English-speaking women used labor doulas — non-clinical health workers who offer continuous physical, emotional, and informational support to women around the time of birth. Doula support offers many benefits, including reduced likelihood of using pain medicine and of cesarean birth and increased likelihood of having a satisfying childbirth.*

Notes: Due to evidence of overcounting use of doulas among some non-English speakers, we limited our analysis of doula support to women who primarily speak English at home. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. p < .01 for differences by race/ethnicity and by payer.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

Labor Doula Use: Actual and Future Interest by Race/Ethnicity and Payer, California, 2016

BASE: WOMEN WHO SPEAK PRIMARILY ENGLISH AT HOME (n = 1,433)

If you have a future pregnancy, how open would you be to having the support of a doula (trained labor companion) while you are giving birth?

Care Team and Place of Birth

Interest in the use of a doula for a future birth was high among California women who spoke English at home and exceeded actual use for their recent birth. Nearly one in five women said that they would definitely want and an additional two in five would consider doula support for a future birth. Women of all race/ethnic groups showed high levels of interest in doula support, with Black women expressing the greatest interest in doula use.

Notes: A labor doula is a nonclinician health worker who offer continuous physical, emotional, and informational support to women around the time of birth. Due to evidence of overcounting the doula role among some non-English speakers, we limited our analyses of doula support to women who primarily speak English at home. “Would definitely not want this” and “not sure” not shown. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. P < .01 for differences by race/ethnicity and by payer.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Future Interest in Birth Center Use by Race/Ethnicity and Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,482)

If you have a future pregnancy, how open would you be to giving birth in a birth center that is separate from a hospital (with hospital care, if needed)?

![Bar chart showing future interest in birth center use by race/ethnicity and payer.]

Overall
- Would consider: 29%
- Definitely want: 11%

Black
- Would consider: 29%
- Definitely want: 14%

White
- Would consider: 29%
- Definitely want: 12%

Latina
- Would consider: 30%
- Definitely want: 10%

Asian/Pacific Islander
- Would consider: 25%
- Definitely want: 7%

Medi-Cal
- Would consider: 30%
- Definitely want: 11%

Private
- Would consider: 27%
- Definitely want: 10%

Care Team and Place of Birth

In 2016, less than one percent (0.3%) of California women gave birth in a free-standing birth center (not shown). While all survey respondents had hospital births,* 11% would definitely want a birth center birth for a future pregnancy, and an additional 29% would consider it. Black women expressed the greatest interest in giving birth at a birth center, and women with Medi-Cal were more interested than women with private insurance.

Notes: *Survey was limited to women who gave birth in a hospital.

Sources:
Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018;
Future Interest in Home Birth
by Race/Ethnicity and Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,482)

If you have a future pregnancy, how open would you be to giving birth at home (with hospital care, if needed)?

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>Payer</th>
<th>Would consider</th>
<th>Definitely want</th>
</tr>
</thead>
<tbody>
<tr>
<td>Black</td>
<td>Overall</td>
<td>6%</td>
<td>8%</td>
</tr>
<tr>
<td>Latina</td>
<td>Overall</td>
<td>8%</td>
<td>7%</td>
</tr>
<tr>
<td>White</td>
<td>Overall</td>
<td>7%</td>
<td>7%</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>3%</td>
<td>9%</td>
<td></td>
</tr>
<tr>
<td>Medi-Cal</td>
<td>8%</td>
<td>12%</td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>5%</td>
<td>0%</td>
<td></td>
</tr>
</tbody>
</table>

Notes: “Would definitely not want this” and “not sure” not shown. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. p < .01 for differences by race/ethnicity and by payer.

Sources:

Care Team and Place of Birth

While all survey respondents had hospital births,* 6% said they would definitely want a home birth for a future pregnancy, and an additional 15% would consider it. This level of interest contrasts with the low rate of home births in California in 2016 (0.7%). Black women and women covered by Medi-Cal reported the highest level of interest in a future home birth.

*Survey was limited to women who gave birth in a hospital.
Beliefs About Childbirth and Medical Interference
United States, 2002 to 2012, Selected Years; California, 2017

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,451)

*Childbirth is a process that should not be interfered with unless medically necessary.*

<table>
<thead>
<tr>
<th>Year</th>
<th>United States</th>
<th>California</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Agree strongly</td>
<td>Agree somewhat</td>
</tr>
<tr>
<td>2002</td>
<td>19%</td>
<td>26%</td>
</tr>
<tr>
<td>2006</td>
<td>24%</td>
<td>25%</td>
</tr>
<tr>
<td>2012</td>
<td>34%</td>
<td>25%</td>
</tr>
<tr>
<td>2017</td>
<td>47%</td>
<td>27%</td>
</tr>
</tbody>
</table>

Notes: Not all eligible respondents answered each item. Segments may not add to 100% due to rounding.


Maternity Care Practices

Nearly half of California women agreed strongly that childbirth is a process that should not be interfered with unless medically necessary, and an additional 27% agreed somewhat with this idea. Since this question was first asked in a 2002 national Listening to Mothers survey, an increasing number of women nationally have strongly agreed with this idea. These beliefs contrast with the many interventions respondents experienced during their labors and births, including labor inductions, intravenous drips, and catheters to remove urine.
Beliefs About Childbirth and Medical Interference by Race/Ethnicity and Payer, California, 2017

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,451)

Childbirth is a process that should not be interfered with unless medically necessary.

Maternity Care Practices

Black and Latina women expressed the highest levels of agreement that birth is a process that should not be interfered with unless medically necessary. Medi-Cal beneficiaries were more likely to agree than women with private insurance.

Notes: Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. p < .01 for differences by payer. Segments may not add to 100% due to rounding.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Birth Weight: Provider’s Prenatal Estimate vs. Actual
California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,523)

About 3 women in 10 reported that their providers said their baby might be getting quite large near the end of pregnancy, a speculation that can raise concerns in women and lead to higher rates of intervention such as induction of labor. However, just one in six babies born to women receiving this message could be classified as large; the rest were in the normal or low birth-weight ranges.

Notes: Low birth weight is < 2,500 g (< 5 lb., 8 oz.); normal birth weight is 2,500 – 3,999 g (5 lb., 8 oz. to 8 lb., 13 oz.); high birth weight, sometimes called “macrosomia,” is ≥ 4,000 g (≥ 8 lb., 13 oz.). Not all eligible respondents answered each item. Segments may not add to 100% due to rounding.

Adjusted Labor Induction by Race/Ethnicity and Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,521)

Did your maternity care provider try to induce your labor in any way?

Maternity Care Practices

Four in 10 women reported that a care provider tried to induce their labor (using medicine and/or other methods to try to cause labor to start before it starts on its own). While there was little variation across race/ethnicity groups, women with private insurance were more likely than women with Medi-Cal coverage to experience attempted induction. While induction is sometimes necessary, inducing labor without a clear medical reason needlessly exposes the woman and baby to medications and other procedures.

Notes: Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. p < .01 for differences by payer. Differences by race/ethnicity were not significant.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
### Reasons for Labor Induction

**California, 2016**

**BASE: WOMEN WHOSE CARE PROVIDER TRIED TO INDUCE LABOR (n = 995)**

<table>
<thead>
<tr>
<th>Reason</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Baby was full term: it was close to my due date</td>
<td>35%</td>
</tr>
<tr>
<td>Baby needed to be born soon due to a health problem (for one or both of us)</td>
<td>25%</td>
</tr>
<tr>
<td>They were worried that I was “overdue”</td>
<td>22%</td>
</tr>
<tr>
<td>Water had broken and they worried about infection</td>
<td>19%</td>
</tr>
<tr>
<td>Baby was getting too big</td>
<td>12%</td>
</tr>
<tr>
<td>I wanted to give birth with a specific provider</td>
<td>5%</td>
</tr>
<tr>
<td>I wanted to control the timing for personal reasons</td>
<td>4%</td>
</tr>
</tbody>
</table>

**Indications for Labor Induction**

- Not evidence-based*
- Evidence-based

*Author analysis of write-in answers found that 15% of women indicated an additional non-evidence-based reason for labor induction.

**Maternity Care Practices**

More than one-third of women who had labor induced (labor started by a provider using a drug and/or other methods before it started on its own) said the reason was that their baby was full term, which is not an evidence-based indication for labor induction. One-quarter said they had labor induced due to a health problem. At least 37% of women with attempted induced labor solely cited non-evidence-based reasons for having their labors induced, a procedure that can add medical risks.

*Some other reason* (not recoded) and “not sure” not shown. Respondents could select more than one answer. Not all eligible respondents answered each item.

**Sources:**

Cascade of Intervention
Induction, Epidural, and Cesarean, California, 2016

BASE: WOMEN HAVING THEIR FIRST BABY WHO EXPERIENCED LABOR AT 37 OR MORE WEEKS OF PREGNANCY (n = 841)

Maternity Care Practices
Among first-time mothers who experienced labor at 37 or more weeks of pregnancy, there was a strong association between cesarean birth and use of labor induction and/or epidural for pain relief. Only 1% who had neither induction nor an epidural had a cesarean birth, whereas those experiencing both interventions had a 30% cesarean rate. While cesareans are critical in some circumstances, medically unnecessary cesareans can pose serious complications for women and their babies.

Notes: Not all eligible respondents answered each item. A term baby is one that is born at 37 or more weeks of gestation. In this group, which included 80% of women giving birth for the first time, the overall epidural rate was 84% and overall cesarean rate was 22%. p < .01 for differences in cesarean birth rate across induction-epidural groups.
Cesarean Rate, by Centimeters Dilated at Admission
California, 2016

BASE: WOMEN WHO HAD ONE OR MORE VAGINAL EXAMS AND EXPERIENCED LABOR (n = 1,461)

Maternity Care Practices
Experts recommend avoiding unneeded cesarean birth and other interventions by delaying hospital admission until the woman is in active labor (cervix dilated, or opened, least five or six centimeters).* Just 23% of women reported that they were five centimeters or more dilated at their first vaginal exam upon hospital admission (data not shown). Of women experiencing their first birth, one-fifth or more had cesareans if they were less than five centimeters dilated at their first vaginal exam.

Centimeters Dilated

Notes: Not all eligible respondents answered each item. p < .01 for differences in cesarean rate across dilation groups.

Maternity Care Practices

Women with both vaginal and cesarean births experienced numerous interventions around the time of birth, in many cases at high rates. Large majorities of all women experienced an intravenous drip and a catheter to remove urine. These interventions can restrict mobility, lead to additional interventions during childbirth, and introduce health risks to mother and baby. Many women also had Pitocin and/or had membranes broken to try to induce labor (not shown).

Selected Interventions, by Mode of Birth
California, 2016

BASE: WOMEN WHO EXPERIENCED LABOR (PITOCIN, MEMBRANES BROKEN)
ALL WOMEN (INTRAVENOUS DRIP, BLADDER CATHETER)

Notes: “Not sure” not shown. Also not shown here are interventions experienced to assess cervical dilation and position of the baby, induce labor, monitor the status of the baby, and help with pain, among others. Not all eligible respondents answered each item. p < .01 for differences by mode of birth.
Among women with vaginal births, those who had a midwife birth attendant were significantly less likely to have an intravenous drip or a catheter inserted to remove urine than women with an obstetrician birth attendant. Many laboring women also had Pitocin or had their membranes broken as methods of labor induction. These interventions can restrict mobility, cause discomfort, and introduce health risks to mother and baby.

* p < .01 for differences by provider.

Notes: Provider type listed is the provider who delivered the baby. “Not sure” not shown. Also not shown are interventions experienced to assess cervical dilation and position of the baby, induce labor, monitor the status of the baby, and help with pain, among others. Not all eligible respondents answered each item.

Use of Pain Medications
by Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,516)

<table>
<thead>
<tr>
<th>Medication Type</th>
<th>Medi-Cal</th>
<th>Private</th>
</tr>
</thead>
<tbody>
<tr>
<td>Epidural or spinal*</td>
<td>79%</td>
<td>72%</td>
</tr>
<tr>
<td>Narcotics</td>
<td>19%</td>
<td>18%</td>
</tr>
<tr>
<td>Nitrous oxide gas*</td>
<td>10%</td>
<td>5%</td>
</tr>
<tr>
<td>General anesthesia</td>
<td>4%</td>
<td>3%</td>
</tr>
<tr>
<td>No pain medication</td>
<td>18%</td>
<td>15%</td>
</tr>
</tbody>
</table>

*p < .01 for differences by payer.

Notes: "Other" not shown. Not all eligible respondents answered each item. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Epidurals often deliver a combination of local anesthetic and narcotic medications. Nitrous oxide, a colorless, odorless gas that has long been used for labor pains in many countries, is administered via a mask that the woman controls.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

Maternity Care Practices
Three-quarters of women surveyed had an epidural when they gave birth. While effective for pain relief in most women, epidurals increase the risk of longer labor, low blood pressure, and fever, as well as expose women to other interventions.* Women with private insurance were more likely to report having epidurals than women with Medi-Cal coverage, while women with Medi-Cal had nitrous oxide gas for pain relief at twice the rate of women with private insurance.

### Vaginal Birth Without Pain Medication
by Provider, Parity, and Race/Ethnicity, California, 2016

**BASE: WOMEN WHO HAD A VAGINAL BIRTH (n = 1,799)**

<table>
<thead>
<tr>
<th>Provider</th>
<th>23% Overall</th>
</tr>
</thead>
<tbody>
<tr>
<td>Obstetrician</td>
<td>18%</td>
</tr>
<tr>
<td>Midwife</td>
<td>28%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Parity</th>
<th>28%</th>
</tr>
</thead>
<tbody>
<tr>
<td>First birth</td>
<td>15%</td>
</tr>
<tr>
<td>Second/Subsequent birth</td>
<td>28%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>25%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asian/Pacific Islander</td>
<td>18%</td>
</tr>
<tr>
<td>Black</td>
<td>18%</td>
</tr>
<tr>
<td>White</td>
<td>19%</td>
</tr>
<tr>
<td>Latina</td>
<td>21%</td>
</tr>
</tbody>
</table>

Notes: Provider type shown is the provider who attended the birth. Not all eligible respondents answered each item. *p < .01 for differences by provider, by parity, and by race/ethnicity.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

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**Maternity Care Practices**

Fewer than one in four women with a vaginal birth used no pain medications during labor. Of all respondents, women who used a midwife as their birth attendant and women who had given birth previously were most likely to have used no pain medication. One-quarter of Latina women gave birth with no pain medication. The use of pain medications can have an adverse impact on mother and baby and can increase the need for additional interventions during labor.*

**Strategies for Coping with Pain by Payer, California, 2016**

**BASE: WOMEN WHO EXPERIENCED LABOR (n = 2,113)**

- Heating pad, ice pack, or similar
  - Medi-Cal: 10%
  - Private: 11%
- Shower, tub, or pool
  - Medi-Cal: 11%
  - Private: 13%
- Relaxation, visualization, hypnosis, or similar*
  - Medi-Cal: 8%
  - Private: 20%
- Massage, stroking, acupressure, or similar*
  - Medi-Cal: 14%
  - Private: 21%
- Large, inflated ball*
  - Medi-Cal: 10%
  - Private: 23%
- Change of position or moving around*
  - Medi-Cal: 37%
  - Private: 50%
- Breathing method*
  - Medi-Cal: 39%
  - Private: 50%
- None*
  - Medi-Cal: 37%
  - Private: 27%

*p < .01 for differences by payer.

Notes: “Some other method” not shown. Use of labor doula not shown. Respondents could select more than one answer. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item.

Sources:
- Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

*Approximately one woman in three who labored reported not using any of the listed strategies for coping with pain. These strategies can help relieve pain and have no adverse effects on the woman, the fetus, and labor progress.*

Among respondents who labored, those with private insurance were more likely to have used most of these strategies for coping with pain than women covered by Medi-Cal. One woman in three who labored used no drug-free strategies to cope with pain.
Skin-to-Skin Contact in the First Two Hours After Birth by Provider and Mode of Birth, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,527)

Overall

Provider

Obstetrician

Midwife

Mode of Birth

Cesarean

Vaginal

Notes: “Not sure” not shown. Provider type listed is the provider who attended the birth. Not all eligible respondents answered each item. p = .0118 for differences by provider; p < .01 for differences by mode of birth.


Maternity Care Practices

Skin-to-skin contact just after birth promotes breast-feeding and newborn adaptation to life outside the womb.* Nine in 10 women had some skin-to-skin contact with their newborns just after birth, with nearly 4 in 10 reporting an hour or more of this contact. Women with midwife support or who had vaginal births were more likely to have longer skin-to-skin contact than those who used obstetricians or who had cesarean births.

Mode of Birth: Vaginal vs. Cesarean
California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,529)

The majority of women had vaginal births, most of which were unassisted (no forceps or vacuum) and very few (2%) were VBACs. Nearly one in three had a cesarean. Most first cesareans were unplanned, while nearly all repeat cesareans were planned. Most women who had a cesarean birth in the past had repeat cesareans. Professional guidelines support offering a VBAC to nearly all pregnant women who have had one or two past cesareans, due in part to increased risks of complications for both mothers and babies from repeat cesareans.

Notes: VBAC is vaginal birth after cesarean. Assisted vaginal birth involves use of vacuum or forceps. Not all eligible respondents answered each item.

Total Cesarean Rates
by Provider, Payer, and Race/Ethnicity, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,529)

### Provider

<table>
<thead>
<tr>
<th>Provider</th>
<th>Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Obstetrician</td>
<td>32%</td>
</tr>
<tr>
<td>Midwife</td>
<td>18%</td>
</tr>
</tbody>
</table>

### Payer

<table>
<thead>
<tr>
<th>Payer</th>
<th>Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medi-Cal</td>
<td>34%</td>
</tr>
<tr>
<td>Private</td>
<td>28%</td>
</tr>
</tbody>
</table>

### Race/Ethnicity

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Black</td>
<td>42%</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>31%</td>
</tr>
<tr>
<td>Latina</td>
<td>31%</td>
</tr>
<tr>
<td>White</td>
<td>29%</td>
</tr>
</tbody>
</table>

Mode of Birth

Nearly one-third of women had a cesarean birth, and over 40% of Black women gave birth by cesarean. Women who used an obstetrician as their prenatal care provider were more likely to have a cesarean birth than women who used a midwife. The difference in cesarean rates between the two types of providers persisted when researchers limited the comparison to low-risk, first-birth women (17% for midwife versus 28% for obstetrician).

While cesareans are critical in some circumstances, they can pose serious complications for women and their babies.

Notes: Not all eligible respondents answered each item. Provider type listed is the provider most often providing care during pregnancy. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. p = .05 for differences by race/ethnicity; p < .01 for differences by payer and by provider.

Sources:
Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Interest in and Access to Vaginal Birth After Cesarean
California, 2016

BASE: WOMEN WHO HAD A REPEAT CESAREAN (n = 331)

Were you interested in VBAC?

Yes 46%

Did you have the option of VBAC?

No 48%

Why didn’t you have the option of VBAC?

My maternity care provider did not allow VBAC 66%

I needed a c-section for a health problem 28%

My hospital did not allow VBAC 23%

Notes: Respondents could select more than one answer for “Why didn’t you have the option of planning a VBAC?” Not all eligible respondents answered each item.


Mode of Birth

Nearly half of women who had repeat cesareans were interested in the option of vaginal birth after cesarean (VBAC). However, almost half who were interested in a VBAC said that they did not have the option of planning a VBAC, with the most common reason being that their maternity care provider did not allow VBAC. Professional guidelines support offering a VBAC to nearly all pregnant women who have had one or two past cesareans, due to increased risks of complications for both mothers and babies from cesarean.*

Discussion with Provider About Repeat Cesarean
California, 2016

BASE: WOMEN WHO TALKED WITH PROVIDER ABOUT SCHEDULING REPEAT CESAREAN BECAUSE OF PAST CESAREANS

How much did you and your maternity care provider talk about the reasons you might...

...want to schedule another c-section? (n = 285)

6% 25% 28% 42%

...not want to schedule another c-section? (n = 283)

36% 24% 21% 18%

Mode of Birth

Professional guidelines support offering a vaginal birth after cesarean (VBAC) to nearly all pregnant women who have had one or two past cesareans, due to increased risks of complications for both mothers and babies from cesarean births.* Despite this guidance, discussions with providers were more likely to focus on reasons to schedule another c-section.

Notes: Not all eligible respondents answered each item. Sections may not add to 100% due to rounding. p < .01 for differences across groups in patterns of discussion for versus against a repeat cesarean.


**Vaginal Birth After Cesarean Rates**
by Payer, Language, and Race/Ethnicity, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,529)

### Payer
- Medi-Cal: 13%
- Private: 17%

### Language
- Usually speak English at home: 12%
- Usually speak Spanish at home: 19%

### Race/Ethnicity
- Black: 8%
- Asian/Pacific Islander: 13%
- Latina: 15%
- White: 16%

Notes: Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. \( p < .01 \) for differences by payer, by language, and by race/ethnicity.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

---

**Mode of Birth**

Professional guidelines support offering a vaginal birth after cesarean (VBAC) to nearly all pregnant women who have had one or two past cesareans.* This helps women and babies avoid the harms of repeat cesareans. However, just one in seven women (15%) with one or more past cesareans had a VBAC. Black women had VBACs half as often as White women. Women who primarily spoke English at home had a notably lower VBAC rate than those who primarily spoke Spanish.

---

Unfair Treatment Due to Race or Ethnicity by Race/Ethnicity, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,502)

During your recent hospital stay when you had your baby, how often were you treated unfairly because of your race or ethnicity?

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>Sometimes</th>
<th>Usually</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>Black</td>
<td>8%</td>
<td>&lt;1%</td>
<td>3%</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>6%</td>
<td>2%</td>
<td>&lt;1%</td>
</tr>
<tr>
<td>Latina</td>
<td>4%</td>
<td>&lt;1%</td>
<td>1%</td>
</tr>
<tr>
<td>White</td>
<td>1%</td>
<td>1%</td>
<td></td>
</tr>
</tbody>
</table>

Notes: “Never” not shown. Not all eligible respondents answered each item. $p < .01$ for differences by race/ethnicity.

## Unfair Treatment Due to Language Spoken by Language, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,507)

*During your recent hospital stay when you had your baby, how often were you treated unfairly because of the language you spoke?*

<table>
<thead>
<tr>
<th>Language</th>
<th>Sometimes</th>
<th>Usually</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asian language</td>
<td>8%</td>
<td>3%</td>
<td>1%</td>
</tr>
<tr>
<td>Spanish</td>
<td>7%</td>
<td>1%</td>
<td>2%</td>
</tr>
<tr>
<td>English</td>
<td>&lt;1%</td>
<td>1%</td>
<td>1%</td>
</tr>
<tr>
<td>Some other language</td>
<td>6%</td>
<td>2%</td>
<td>1%</td>
</tr>
</tbody>
</table>

Notes: Languages are those usually spoken at home. “Never” and “English and Spanish spoken equally at home” not shown. Not all eligible respondents answered each item. *p < .01 for differences by language spoken.


---

### Treatment During Hospital Stay

The majority of respondents did not perceive receiving unfair treatment due to the language they spoke. Twelve percent who speak an Asian language stated that they had experienced unfair treatment in the hospital because of their language, followed by 10% of those who speak Spanish at home, and 9% who speak some other language.
Unfair Treatment Due to Type of Insurance
by Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,501)

During your recent hospital stay when you had your baby, how often were you treated unfairly because of the type of health insurance you had?

<table>
<thead>
<tr>
<th>Treatment During Hospital Stay</th>
<th>Medi-Cal</th>
<th>Private</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sometimes</td>
<td>5%</td>
<td>1%</td>
</tr>
<tr>
<td>Usually</td>
<td>2%</td>
<td>1%</td>
</tr>
<tr>
<td>Always</td>
<td>2%</td>
<td>&lt;1%</td>
</tr>
</tbody>
</table>

Notes: Not all eligible respondents answered each item. “Never” not shown. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. p < .01 for differences by payer.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Experience of Harsh Treatment
by Race/Ethnicity, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION

During your recent hospital stay when you had your baby, did a nurse or maternity care provider ever...

. . . use harsh, rude, or threatening language? (n = 2,511)

- Black: 9%
- Asian/Pacific Islander: 9%
- White: 8%
- Latina: 7%

. . . handle you roughly? (n = 2,514)

- Black: 11%
- Asian/Pacific Islander: 11%
- White: 8%
- Latina: 7%

Notes: Not all eligible respondents answered each item. Differences by race/ethnicity were not significant.


Treatment During Hospital Stay

Overall, about 1 in 12 women reported experiencing harsh, rude, or threatening language, and rough handling from a nurse or maternity care provider when they were in the hospital to have their baby. While differences across racial and ethnic groups were not statistically significant, Asian/Pacific Islander and Black women reported the highest rates of harsh handling.
Treatment During Hospital Stay

Women who experienced pressure from a health professional to have labor induction were more than twice as likely as those not experiencing pressure to have this intervention. Among women with no previous cesarean, those who were pressured were four times as likely to have a cesarean than those who were not. Differences were modest and all rates were high in the case of women in labor having epidurals and women with past cesarean(s) having another cesarean birth.

* indicates p < .01 for differences between “did not experience pressure” and “experienced pressure.”

Notes: Not all eligible respondents answered each item. Base for induction is all women, for epidural is women who experienced labor, for primary cesarean is women without a previous cesarean, for repeat cesarean is women with a previous cesarean.

Autonomy, Support, and Communication
During Labor and Birth, California, 2016

BASE: ALL WOMEN WHO EXPERIENCED LABOR AND ANSWERED THESE QUESTIONS

How much do you agree with the following statements about your recent experience of labor and birth?

Delivery room staff encouraged me to make decisions about how I wanted my birth to progress \( (n = 2,067) \)

<table>
<thead>
<tr>
<th>Strongly</th>
<th>Somewhat</th>
<th>Neither agree nor disagree</th>
<th>Somewhat</th>
<th>Strongly</th>
</tr>
</thead>
<tbody>
<tr>
<td>5%</td>
<td>5%</td>
<td>15%</td>
<td>25%</td>
<td>51%</td>
</tr>
</tbody>
</table>

I felt well supported by staff during my labor and birth \( (n = 2,093) \)

<table>
<thead>
<tr>
<th>Strongly</th>
<th>Somewhat</th>
<th>Neither agree nor disagree</th>
<th>Somewhat</th>
<th>Strongly</th>
</tr>
</thead>
<tbody>
<tr>
<td>3%</td>
<td>3%</td>
<td>16%</td>
<td>75%</td>
<td></td>
</tr>
</tbody>
</table>

Staff communicated well with me during labor \( (n = 2,098) \)

<table>
<thead>
<tr>
<th>Strongly</th>
<th>Somewhat</th>
<th>Neither agree nor disagree</th>
<th>Somewhat</th>
<th>Strongly</th>
</tr>
</thead>
<tbody>
<tr>
<td>4%</td>
<td>3%</td>
<td>18%</td>
<td>74%</td>
<td></td>
</tr>
</tbody>
</table>

Notes: Not all eligible respondents answered each item. Segments don’t add to 100% due to rounding.


Treatment During Hospital Stay

The majority of women reported receiving respectful care from hospital staff as they were giving birth. Three in four women strongly agreed that they felt well supported during their labor and the birth of their baby, and that staff communicated well. Half of women strongly agreed that staff encouraged them to make their own decisions about their baby’s birth. In comparison with women with private insurance, Medi-Cal beneficiaries gave poorer ratings on decision autonomy and communication (not shown).
## Number of Maternal Postpartum Office Visits
by Payer and Race/Ethnicity, California, 2016

**BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,444)**

<table>
<thead>
<tr>
<th></th>
<th>None</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Overall</strong></td>
<td>9%</td>
<td>50%</td>
<td>24%</td>
<td>9%</td>
<td>7%</td>
</tr>
<tr>
<td><strong>Payer</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medi-Cal</td>
<td>12%</td>
<td>43%</td>
<td>25%</td>
<td>11%</td>
<td>9%</td>
</tr>
<tr>
<td>Private</td>
<td>6%</td>
<td>58%</td>
<td>23%</td>
<td>7%</td>
<td>6%</td>
</tr>
<tr>
<td><strong>Race/Ethnicity</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Black</td>
<td>7%</td>
<td>41%</td>
<td>22%</td>
<td>14%</td>
<td>15%</td>
</tr>
<tr>
<td>Latina</td>
<td>10%</td>
<td>45%</td>
<td>26%</td>
<td>11%</td>
<td>8%</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>9%</td>
<td>57%</td>
<td>22%</td>
<td>7%</td>
<td>5%</td>
</tr>
<tr>
<td>White</td>
<td>7%</td>
<td>57%</td>
<td>24%</td>
<td>7%</td>
<td>5%</td>
</tr>
</tbody>
</table>

**Postpartum Experiences**

Postpartum visits are critical opportunities to support women on breastfeeding, wound care, and mental health, among other issues. About 1 woman in 10 had no postpartum visit; however, women with Medi-Cal coverage were twice as likely as women with private insurance to have no postpartum visit. About 3 in 10 Black women had three or more postpartum visits, perhaps indicating more extensive postpartum health challenges.

Notes: Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. *p* < .01 for differences by race/ethnicity and by payer.

Sources: *Listening to Mothers in California* (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Postpartum Emotional and Practical Support
by Payer, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION

Since the birth of your baby, how often do you have someone you can turn to for…

…emotional support, such as listening to your concerns and giving good advice? (n = 2,494)

<table>
<thead>
<tr>
<th>Payer</th>
<th>Never</th>
<th>Sometimes</th>
<th>Usually</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medi-Cal</td>
<td>18%</td>
<td>20%</td>
<td>12%</td>
<td>51%</td>
</tr>
<tr>
<td>Private</td>
<td>8%</td>
<td>14%</td>
<td>15%</td>
<td>63%</td>
</tr>
</tbody>
</table>

..practical support, such as helping you get things done or get information you need? (n = 2,498)

<table>
<thead>
<tr>
<th>Payer</th>
<th>Never</th>
<th>Sometimes</th>
<th>Usually</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medi-Cal</td>
<td>17%</td>
<td>23%</td>
<td>15%</td>
<td>48%</td>
</tr>
<tr>
<td>Private</td>
<td>8%</td>
<td>17%</td>
<td>19%</td>
<td>56%</td>
</tr>
</tbody>
</table>

Notes: Not all eligible respondents answered each item. Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Segments may not add to 100% due to rounding. p < .01 for difference in emotional and in practical support by payer.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.
Exclusive Breast Milk Feeding at One Week by Race/Ethnicity and Mode of Birth, California, 2016

BASE: ALL WOMEN WHO ANSWERED THIS QUESTION (n = 2,525)

Experts recommend exclusive breast milk feeding for the first six months of life.* White women were far more likely to be exclusively breastfeeding at one week than women of other races/ethnicities. Exclusive breastfeeding at one week varied widely by mode of birth, ranging from 54% of women who had a primary cesarean to 77% of women who had a vaginal birth after cesarean (VBAC).

Notes: Not all eligible respondents answered each item. p < .01 for differences by race/ethnicity and by mode of birth.

Exclusive Breast Milk Feeding for Six Months by Race/Ethnicity and Payer, California, 2016

BASE: WOMEN WHO GAVE BIRTH AT LEAST 6 MONTHS PRIOR TO TAKING THE SURVEY (n = 713)

Exclusive breastfeeding varied by racial/ethnic groups: Thirty-seven percent of White women reported exclusively breastfeeding to six months, while 21% of Black women did. Women with Medi-Cal coverage were much less likely (24%) than women with private insurance (34%) to exclusively breastfeed to six months.

Notes: Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. p < .01 for differences by race/ethnicity and by payer.

Sources: Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018; California Department of Health Care Services MIS/DSS Data Warehouse.

Postpartum Experiences
While leading health organizations recommend exclusive breast milk feeding through six months postpartum, only 28% of respondents met this standard.* Exclusive breastfeeding varied by racial/ethnic groups: Thirty-seven percent of White women reported exclusively breastfeeding to six months, while 21% of Black women did. Women with Medi-Cal coverage were much less likely (24%) than women with private insurance (34%) to exclusively breastfeed to six months.

Breastfed as Long as Wanted
by Race/Ethnicity and Time Home with Baby, California, 2016

BASE: WOMEN WHO BREASTFED, BUT WERE NO LONGER BREASTFEEDING AT THE TIME OF THE SURVEY (n = 854)

Only about 4 in 10 women who had breastfed and were not breastfeeding at the time of the survey had done so for as long as they wanted. Asian/Pacific Islander women were about twice as likely as White women to say they had breastfed as long as desired. Those who had stayed home as long as they wanted with their babies before working at paid jobs were about twice as likely as those who did not to have breastfed as long as desired.

*Limited to women who had breastfed, were no longer doing so, and were working at a paid job.

Notes: Not all eligible respondents answered each item. p < .01 for differences by race/ethnicity and by whether home with baby as long as wanted.

Maternal Mental Health

A large number of women in California suffer from mental health conditions while pregnant or after giving birth, negatively impacting the woman and the child. One woman in 5 reported symptoms of anxiety during pregnancy, and one woman in 10 reported symptoms of depression during pregnancy. Thirty percent of Black women reported symptoms of anxiety and 20% reported symptoms of depression during pregnancy.

Notes: Women were asked to answer two questions each about the frequency of anxiety symptoms and depression symptoms, both “during your recent pregnancy” and “during the last two weeks.” * Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item. Differences by race/ethnicity and by payer were not significant for prenatal anxiety. $p < .01$ for differences by race/ethnicity and by payer for prenatal depression.

Sources:
- Listening to Mothers in California (statewide survey of 2,539 women who gave birth in California hospitals in 2016), National Partnership for Women & Families, 2018;
Postpartum Symptoms of Anxiety and Depression by Race/Ethnicity and Payer, California, 2017

BASE: ALL WOMEN WHO ANSWERED THESE QUESTIONS (n = 2,519)

Maternal Mental Health

Similar to the prenatal period (shown on page 41), a greater percentage of women reported symptoms of anxiety than symptoms of depression “over the last two weeks” (postpartum). However, fewer women reported symptoms of either condition during the postpartum period than during pregnancy.

Notes: Women were asked two questions each about the frequency of anxiety symptoms and depression symptoms, both “during your recent pregnancy” and “during the last two weeks.” Medi-Cal respondents were identified based upon a Medi-Cal record of a paid 2016 childbirth claim. Privately insured respondents self-identified in the survey. Not all eligible respondents answered each item.

Prenatal and Postpartum Counseling and Treatment
Among Women Reporting Symptoms of Anxiety or Depression
California, 2016

BASE: ALL WOMEN SCREENING POSITIVE FOR PRENATAL/POSTPARTUM ANXIETY OR DEPRESSION

Did you receive counseling or treatment?

<table>
<thead>
<tr>
<th></th>
<th>No</th>
<th>Yes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anxiety (n = 520)</td>
<td>81%</td>
<td>19%</td>
</tr>
<tr>
<td>Depression (n = 294)</td>
<td>78%</td>
<td>21%</td>
</tr>
</tbody>
</table>

Notes: Women were asked two questions each about the frequency of anxiety symptoms and depression symptoms both “during your recent pregnancy” and “during the last two weeks.” Not all eligible respondents answered each item.


Maternal Mental Health

Maternal mental health conditions are treatable. Most women who reported symptoms of anxiety or depression did not receive counseling or treatment, especially during pregnancy. Only one in five women who reported symptoms of prenatal anxiety or depression had received counseling or treatment. Slightly more than one in three women who reported symptoms of anxiety or depression in the two weeks prior to the survey had received counseling or treatment.

Methodology

Listening to Mothers in California is a population-based, statewide survey of the experiences and views of child-bearing women in California.

California birth certificates of women who gave birth from September 1, 2016, through December 15, 2016, were sampled. The following women were excluded: less than 18 years old, non-California residents, and women with out-of-hospital births, multiple births, and birth certificates indicating a deceased newborn. Researchers oversampled Black women, women with midwife-attended births, and women with vaginal birth after cesarean (VBAC). Further exclusions during the field period were women who were not living with their baby at the time of contact and women who could not participate in English or Spanish. The final data were weighted with the 2016 Birth Statistical Master File to reflect 2016 California births meeting inclusion criteria available in birth certificates. Despite selected exclusions, survey results closely resembled statewide 2016 results for many variables.

Women were reached by mail, telephone, email, and text message. Respondents could complete the survey in English or Spanish, on their own web-enabled device or by phone with an interviewer. They could work through the questionnaire in one or more sessions and switch between modes and devices. Participants received thank-you gift cards for completing the survey, which required at least a half hour on average.

A total of 2,539 women completed the survey, for a response rate of 55%. The women participated in 2017 from 2 to 11 months after giving birth. Medi-Cal beneficiary was defined as a woman with a 2016 childbirth claim covered by Medi-Cal, as identified through the Department of Health Care Services claims database. The research was approved by the Committee for the Protection of Human Subjects of the Office of Statewide Health Planning and Development.

### Weighted Survey Respondent Demographics

<table>
<thead>
<tr>
<th>Age group</th>
<th>18–19</th>
<th>20–24</th>
<th>25–29</th>
<th>30–34</th>
<th>35+</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td>4%</td>
<td>18%</td>
<td>27%</td>
<td>30%</td>
<td>22%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Birth payer</th>
<th>Self-pay</th>
<th>Medi-Cal</th>
<th>Private</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td>&lt;1%</td>
<td>47%</td>
<td>44%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Parity</th>
<th>First birth</th>
<th>2nd or 3rd birth</th>
<th>4th or more birth</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td>40%</td>
<td>48%</td>
<td>11%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Birth place</th>
<th>United States</th>
<th>Another country</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td>65%</td>
<td>35%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Language spoken at home</th>
<th>English</th>
<th>Spanish</th>
<th>English and Spanish equally</th>
<th>Asian language</th>
<th>Something else</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td>57%</td>
<td>18%</td>
<td>15%</td>
<td>7%</td>
<td>3%</td>
</tr>
</tbody>
</table>

*There were too few participants to separately report on women who identified as American Indian or Alaskan Native.

Notes: Some survey questions were preceded by brief explanatory material not shown here — for example, to define induction of labor. Some response choices have been abbreviated or edited for clarity of presentation. Survey questionnaire, full survey report, and other resources available at www.chcf.org/listening-to-mothers-ca and www.nationalpartnership.org/ltmca. Demographic segments may not add to 100% due to rounding.
Anxiety is a common mood disorder that may involve symptoms such as excessive worry, difficulty concentrating, irritability, fatigue, and sleep concerns.

Assisted vaginal birth is a vaginal birth using vacuum extraction or forceps applied to the baby’s head to help move the baby out during birth.

Birth center is a facility for both prenatal and postpartum office visits, and for giving birth, that is separate from a hospital. Birth centers typically offer midwife-led care and physiologic childbirth, and do not offer interventions such as epidural analgesia and cesarean birth.

Birth weight is the weight of a baby at birth. Low birth weight babies weigh less than 2,500 grams (or less than 5 pounds, 8 ounces) at birth. Babies with normal birth weight weigh 2,500 to 3,999 grams (or from 5 pounds, 8 ounces to 8 pounds, 13 ounces) at birth. Large babies weigh 4,000 or more grams (or more than 8 pounds, 13 ounces) at birth.

Bladder catheter is a tube inserted into the urethra to collect urine in a bag. This is typically used when a birthing woman loses lower body sensation and/or the ability to get to the toilet due to the effects of pain medications or continuous electronic fetal monitoring.

Cervical dilation is a measure of progress during labor. The cervix, or point of passage out of the womb, typically opens or dilates to ten centimeters to enable the baby to move out.

Cesarean birth is when a baby is born through an opening in the lower abdomen made by surgical cuts through several layers of tissue from the skin to the womb.

Depression is a common mood disorder that may involve symptoms such as feeling sad, hopeless, or tired, and experiencing sleep and appetite concerns.

Epidural and spinal analgesia are techniques for delivering pain medicine through a tiny tube near the spinal cord for regional pain relief in the abdominal and pelvic areas.

Exclusive breast milk feeding is feeding babies breast milk only, with no supplements of formula, water, or other foods. The breast milk may be fed directly, pumped and fed through a bottle, or fed using donor breast milk.

Family physician is a medical doctor educated and licensed in family medicine to care for people regardless of age, sex, or condition. A relatively small proportion of family physicians in the United States are maternity care providers.

General anesthesia uses pain relief medications to affect the whole body. It involves being “put to sleep” and in general a period of having no consciousness.

Home birth is giving birth at home. Typically, the maternity care provider is a midwife, the woman experiences physiologic childbirth, and hospital-based interventions such as epidural analgesia and cesarean birth are not available.

Intravenous (IV) fluids involve a needle inserted into a vein to deliver fluids or medications into the bloodstream.

Labor doula is a non-clinical support person experienced with labor and birth who offers comfort measures, encouragement, and information to birthing women. Some labor doulas also meet with a woman during pregnancy to learn about her and her birth preferences, and support her by phone or in person at home after the birth.

Labor induction uses medications and/or mechanical methods (e.g., membrane sweeping, Foley catheter) to try to cause labor to begin artificially before it begins on its own. In most attempts, medical induction starts labor and shortens pregnancy.

Maternity care provider refers to autonomous practitioners who play a lead role in providing maternity care. Most are obstetricians, midwives, or family physicians.

Medi-Cal is California’s federal-state Medicaid medical assistance program for low-income individuals. Medi-Cal is a major payer of maternal and newborn care through either managed care health plans or fee-for-service coverage.

Membranes breaking is the opening of the sac that contains the developing fetus and amniotic fluid. This can happen spontaneously before or during labor. Care providers often deliberately break the sac to try to start labor (labor induction) or in the belief that this hastens labor that is underway.
Glossary, continued

**Midwife** is a *maternity care provider* who can lead the prenatal, childbirth, and postpartum care of lower-risk women or collaborate with physicians in caring for women with specialized needs. Many midwives prioritize individualized preventive high-touch care and use interventions judiciously. Three midwifery credentials are nationally recognized: certified nurse midwives (CNMs), certified midwives (CMs), and certified professional midwives (CPMs).

**Narcotics** is a class of opioid-based pain relief medications that can be given systemically into the entire body (for example, by intravenous line) or regionally in combination with other pain medicines through epidural or spinal methods.

**Nitrous oxide** is an anesthetic gas than provides pain relief for many laboring women. Women self-administer this rapid-acting method by bringing a mask to their face as needed.

**Nurse practitioner** is an advanced practice nurse who may be educated and licensed to lead prenatal, postpartum, and newborn care.

**Nulliparous, term, singleton, vertex (NTSV) cesarean** is a cesarean birth in a low-risk first-birth woman. Specifically, NTSV indicates a nulliparous woman (first-time mother) giving birth at term (37 or more weeks of gestation) to a single baby in the vertex, or head-first, position.

**Obstetrician** is a medical doctor who is educated and licensed as a *maternity care provider* to lead prenatal, childbirth, and postpartum care. Obstetricians generally also provide care to prevent and treat other women’s health conditions.

**Physician assistant** may be educated and licensed to lead the prenatal, childbirth, and postpartum care of lower-risk women. In practice, few physician assistants attend births.

**Physiologic childbirth** is giving birth without major interventions. A professional consensus statement defines physiologic childbirth as being birth where labor starts on its own, progresses without pain medicine, use of synthetic oxytocin (Pitocin), or artificial rupture of membranes, and ends in a vaginal birth without episiotomy, vacuum, or forceps.

**Pitocin** is a medication that is used for labor induction, labor augmentation (strengthening or hastening labor that is underway), and to reduce the likelihood of excessive bleeding after birth. It is a synthetic form of oxytocin, which differs in action in important respects from the endogenous oxytocin produced by a woman’s body.

**Primary cesarean** is an initial cesarean birth in a woman who has not had a cesarean birth in the past. Primary cesareans can occur in women who are having their first birth or who have had one or more vaginal births in the past.

**Repeat cesarean** is a cesarean birth in a woman who has had one or more cesarean births in the past.

**Skin-to-skin contact** between a woman and her newborn baby is an early postpartum practice that fosters healthy maternal-newborn transitions, the establishment of breastfeeding, and maternal-newborn attachment.

**Vaginal birth** is a birth that occurs when the baby passes through the opened, or dilated, cervix and down and out through the birth canal (vagina).

**Vaginal birth after cesarean (VBAC)** is a vaginal birth in a woman who has had one or more cesarean births in the past.

**Vaginal exam** is used to assess labor progress, especially the degree of **cervical dilation**, and the position of the baby.
Cesarean Rate Definitions

<table>
<thead>
<tr>
<th>Type of Cesarean</th>
<th>Proportion of Cesareans Among:</th>
<th>Survey Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>TOTAL (n = 2,529)</td>
<td>All births</td>
<td>31%</td>
</tr>
<tr>
<td>Primary (n = 2,082)</td>
<td>All births to women who have never had a cesarean</td>
<td>19%</td>
</tr>
<tr>
<td>Repeat (n = 447)</td>
<td>All births to women who have had one or more past cesareans</td>
<td>85%</td>
</tr>
<tr>
<td>NTSV (n = 873)</td>
<td>All births to “low-risk,” first-birth women</td>
<td>26%</td>
</tr>
</tbody>
</table>

Cesarean Rates Among Survey Respondents

Percentage of All Births

- Primary: 16%
- Repeat: 15%
- NTSV: 9%
- Total: 31%

Notes: NTSV indicates a “nulliparous” woman (first-time mother), giving birth at term (37 or more weeks gestation) to a single baby in the “vertex,” or head-first, position. Calculated from survey responses and respondent birth certificate data on position of baby’s head at birth. Covered California and other California entities use the nationally endorsed NTSV cesarean measure, calculated from hospital discharge records, and incorporating specific exclusions, which resulted in 2016 NTSV rate of 25%. Not all eligible respondents answered each item.

About the Authors

The National Partnership for Women & Families led *Listening to Mothers in California*, in collaboration with investigators from the University of California, San Francisco, Center on Social Disparities in Health and the Boston University School of Public Health. Quantum Market Research administered the survey.

Carol Sakala, principal investigator, is the director of Childbirth Connection programs at the National Partnership for Women & Families. Eugene R. Declercq, investigator and lead data analyst, is a professor at the Boston University School of Public Health. Jen Joynt, project manager and author, is an independent consultant. Jessica M. Turon, research assistant, is an independent consultant.

About the Funders

The *California Health Care Foundation* is dedicated to advancing meaningful, measurable improvements in the way the health care delivery system provides care to the people of California, particularly those with low incomes and those whose needs are not well served by the status quo. We work to ensure that people have access to the care they need, when they need it, at a price they can afford.

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*YELLOW CHAIR FOUNDATION*