



ALLIANCE FOR INNOVATION  
ON MATERNAL HEALTH

---









**Safe Reduction of Primary  
Cesarean Births Bundle**



*Implementation Resources*






# Safe Reduction of Primary Cesarean Births Bundle Implementation Resources

Section	Resource	Description	Link
<b>Readiness</b>			
<b>Readiness</b>	<p>Tools for Optimizing the Outcomes of Labor Safely</p> <p><i>ACNM, 2015</i></p>	<p>A toolkit to promote care practices that support physiologic birth has been developed for use by maternity care professionals. With leadership from American College of Nurse-Midwives (ACNM) and consultation from Childbirth Connection a multi-stakeholder committee comprised of representatives from the Association of Women's Health, Obstetric and Neonatal Nurses, National Association of Certified Professional Midwives and Lamaze International along launched BirthTOOLS (Tools to Optimize Outcomes of Labor Safely) found at <a href="http://www.BirthTOOLS.org">www.BirthTOOLS.org</a>. The toolkit contains a synopsis of the evidence base and offers targeted resources, protocols and other materials to assist clinicians and health care systems in implementing best practices that promote physiologic birth.</p> <p>The site is framed around the value that physiologic approaches bring to childbirth for women, providers, and maternity care systems. Its content is organized in 4 major categories: background information; the role of quality improvement in promoting normal physiologic birth; resources to initiate change; and promoting a unit culture that embraces physiologic birth as an approach to improve quality and safety.</p>	
<b>Readiness</b>	<p>Childbirth Connection, Hormonal Physiology of Childbearing: Fact Sheets on Core Topics.</p> <p><i>Childbirth Connection, 2015</i></p>	<p>Contemporary childbirth has benefited greatly from medical advances and from highly skilled and committed maternity care providers. However, the current technology-intensive approach may be disadvantageous for healthy mothers and babies. Current understanding of physiologic processes around the time of birth suggests that these processes and practices that help foster them confer important benefits to women and their fetuses/newborns. Common interventions can interfere with these benefits and are best reserved for well-established indications.</p>	



Section	Resource	Description	Link
<b>Readiness</b>	Maternal Preference for Cesarean Delivery: Do Women Get What They Want?  <i>ACOG, 2012*</i>	Women’s preferences have an effect on the probability of an acute cesarean delivery as well as an elective cesarean delivery.	
<b>Readiness</b>	NAMD/AMCHP Support State-to-State Learning on the Overuse of C-Sections among Low-Risk, First-Time Mothers  <i>NAMD/AMCHP, 2015</i>	This brief explores how states can capitalize on the opportunities presented by health reform to improve birth outcomes, particularly through preconception health. The issue brief provides a brief overview of provisions in the ACA that can influence access to care for women and men in the preconception period	
<b>Readiness</b>	Consequences of a Primary Elective Cesarean Delivery Across the Reproductive Life  <i>ACOG, 2013*</i>	Women undergoing primary elective cesarean delivery incur greater morbidity over their reproductive life; the marginal benefit in neonatal outcome is attenuated with additional pregnancies.	
<b>Readiness</b>	SIVB: Supporting Intended Vaginal Birth, or “Support for Birth”  <i>PQCNC, 2013</i>	The 2010-2011 maternal health initiative seeks to improve the rate of vaginal birth among first-time mothers, women who come to labor and delivery intending to give birth vaginally but who may end up with a c-section, sometimes as a result of the failure to apply evidence-based, best practice care. PQCNC’s goal is to increase the rate of vaginal birth in this population by 25% by January 2012. Each participating hospital will set its own site-specific goal.	



Section	Resource	Description	Link
<p><b>Readiness</b></p>	<p>Obstetric Care Consensus No. 1: Safe Prevention of the Primary Cesarean Delivery</p> <p><i>ACOG, 2014</i></p>	<p>In 2011, one in three women who gave birth in the United States did so by cesarean delivery. Cesarean birth can be life-saving for the fetus, the mother, or both in certain cases. However, the rapid increase in cesarean birth rates from 1996 to 2011 without clear evidence of concomitant decreases in maternal or neonatal morbidity or mortality raises significant concern that cesarean delivery is overused. Variation in the rates of nulliparous, term, singleton, vertex cesarean births also indicates that clinical practice patterns affect the number of cesarean births performed. The most common indications for primary cesarean delivery include, in order of frequency, labor dystocia, abnormal or indeterminate (formerly, nonreassuring) fetal heart rate tracing, fetal malpresentation, multiple gestation, and suspected fetal macrosomia. Safe reduction of the rate of primary cesarean deliveries will require different approaches for each of these, as well as other, indications. For example, it may be necessary to revisit the definition of labor dystocia because recent data show that contemporary labor progresses at a rate substantially slower than what was historically taught. Additionally, improved and standardized fetal heart rate interpretation and management may have an effect. Increasing women’s access to nonmedical interventions during labor, such as continuous labor and delivery support, also has been shown to reduce cesarean birth rates. External cephalic version for breech presentation and a trial of labor for women with twin gestations when the first twin is in cephalic presentation are other of several examples of interventions that can contribute to the safe lowering of the primary cesarean delivery rate.</p>	
<p><b>Recognition</b></p>			
<p><b>Recognition</b></p>	<p>Women’s Health and Perinatal Nursing Care Quality Refined Draft Measures Specifications</p> <p><i>AWHONN, 2014</i></p>	<p>The Women’s Health and Perinatal Nursing Care Quality (WHP-NCQ) draft measures were developed by the Association of Women’s Health, Obstetric and Neonatal Nurses (AWHONN) 2012 Women’s Health and Perinatal Nursing Care Quality Measures Advisory Panel and were distributed for public review and comment. The advisory panel was charged with making recommendations to the Board of Directors concerning the priorities for measuring women’s health and perinatal nursing care quality (NCQ) and with developing a set of NCQ measures. AWHONN gratefully acknowledges the time and expertise of the advisory panel members in the development of this document and introductory set of specified measures.</p>	


Section	Resource	Description	Link
Recognition	Primary Cesarean Delivery in the United States <i>ACOG, 2013*</i>	Conservative management of the latent stage and second stage of labor is an important strategy to lower the primary cesarean delivery rate.	
Recognition	OB Guideline 15: Assessment and Monitoring in Labor and Delivery <i>CRICO, 2017</i>	<p>During prenatal care, the clinician and patient will discuss common events and procedures in labor, including methods of assessing fetal well-being.</p> <p>The responsible clinician or designee shall evaluate the patient, enter a note, and provide orders within two hours of his or her patient arriving at the Labor and Delivery unit.</p> <p>The clinician or designee shall examine the patient before prescribing initial therapy with tocolytic agents in the second or third trimester. Documentation should include presumptive diagnosis, possible causes, and that informed consent has been obtained.</p>	
Recognition	Toolkit to Support Vaginal Birth and Reduce Primary Cesareans <i>CMQCC, 2011**</i>	The Toolkit is a comprehensive, evidence-based “how-to” guide designed to educate and motivate maternity clinicians to apply best practices for supporting vaginal birth. Cesarean births among low-risk, first-time mothers have been the largest contributor to the recent rise in cesarean rates, and accounts for the greatest variation in cesarean rates between hospitals.	

\*Resource Behind Paywall

\*\*Must register or login for access




Section	Resource	Description	Link
Recognition	<p>Preventing the First Cesarean Delivery: Summary of a Joint Eunice Kennedy Shriver National Institute of Child Health and Human Development, Society for Maternal-Fetal Medicine, and American College of Obstetricians and Gynecologists Workshop</p> <p>ACOG, 2012</p>	<p>With more than one third of pregnancies in the United States being delivered by cesarean and the growing knowledge of morbidities associated with repeat cesarean deliveries, the Eunice Kennedy Shriver National Institute of Child Health and Human Development, the Society for Maternal-Fetal Medicine, and the American College of Obstetricians and Gynecologists convened a workshop to address the concept of preventing the first cesarean delivery. The available information on maternal and fetal factors, labor management and induction, and nonmedical factors leading to the first cesarean delivery was reviewed as well as the implications of the first cesarean delivery on future reproductive health. Key points were identified to assist with reduction in cesarean delivery rates including that labor induction should be performed primarily for medical indication; if done for nonmedical indications, the gestational age should be at least 39 weeks or more and the cervix should be favorable, especially in the nulliparous patient. Review of the current literature demonstrates the importance of adhering to appropriate definitions for failed induction and arrest of labor progress. The diagnosis of “failed induction” should only be made after an adequate attempt. Adequate time for normal latent and active phases of the first stage, and for the second stage, should be allowed as long as the maternal and fetal conditions permit. The adequate time for each of these stages appears to be longer than traditionally estimated. Operative vaginal delivery is an acceptable birth method when indicated and can safely prevent cesarean delivery. Given the progressively declining use, it is critical that training and experience in operative vaginal delivery are facilitated and encouraged. When discussing the first cesarean delivery with a patient, counseling should include its effect on future reproductive health.</p>	
Recognition	<p>Primary Cesarean Delivery in the United States</p> <p>ACOG, 2013*</p>	<p>Conservative management of the latent stage and second stage of labor is an important strategy to lower the primary cesarean delivery rate.</p>	


Section	Resource	Description	Link
<p><b>Recognition</b></p>	<p>OB Guideline 15: Assessment and Monitoring in Labor and Delivery</p> <p><i>CRICO, 2017</i></p>	<p>During prenatal care, the clinician and patient will discuss common events and procedures in labor, including methods of assessing fetal well-being.</p> <p>The responsible clinician or designee shall evaluate the patient, enter a note, and provide orders within two hours of his or her patient arriving at the Labor and Delivery unit.</p> <p>The clinician or designee shall examine the patient before prescribing initial therapy with tocolytic agents in the second or third trimester. Documentation should include presumptive diagnosis, possible causes, and that informed consent has been obtained.</p>	<p></p>
<p><b>Recognition</b></p>	<p>Toolkit to Support Vaginal Birth and Reduce Primary Cesareans</p> <p><i>CMQCC, 2011**</i></p>	<p>The Toolkit is a comprehensive, evidence-based “how-to” guide designed to educate and motivate maternity clinicians to apply best practices for supporting vaginal birth. Cesarean births among low-risk, first-time mothers have been the largest contributor to the recent rise in cesarean rates, and accounts for the greatest variation in cesarean rates between hospitals.</p>	<p></p>


Section	Resource	Description	Link
<p><b>Recognition</b></p>	<p>Preventing the First Cesarean Delivery: Summary of a Joint Eunice Kennedy Shriver National Institute of Child Health and Human Development, Society for Maternal-Fetal Medicine, and American College of Obstetricians and Gynecologists Workshop</p> <p><i>ACOG, 2012</i></p>	<p>With more than one third of pregnancies in the United States being delivered by cesarean and the growing knowledge of morbidities associated with repeat cesarean deliveries, the Eunice Kennedy Shriver National Institute of Child Health and Human Development, the Society for Maternal-Fetal Medicine, and the American College of Obstetricians and Gynecologists convened a workshop to address the concept of preventing the first cesarean delivery. The available information on maternal and fetal factors, labor management and induction, and nonmedical factors leading to the first cesarean delivery was reviewed as well as the implications of the first cesarean delivery on future reproductive health. Key points were identified to assist with reduction in cesarean delivery rates including that labor induction should be performed primarily for medical indication; if done for nonmedical indications, the gestational age should be at least 39 weeks or more and the cervix should be favorable, especially in the nulliparous patient. Review of the current literature demonstrates the importance of adhering to appropriate definitions for failed induction and arrest of labor progress. The diagnosis of “failed induction” should only be made after an adequate attempt. Adequate time for normal latent and active phases of the first stage, and for the second stage, should be allowed as long as the maternal and fetal conditions permit. The adequate time for each of these stages appears to be longer than traditionally estimated. Operative vaginal delivery is an acceptable birth method when indicated and can safely prevent cesarean delivery. Given the progressively declining use, it is critical that training and experience in operative vaginal delivery are facilitated and encouraged. When discussing the first cesarean delivery with a patient, counseling should include its effect on future reproductive health.</p>	





Section	Resource	Description	Link
<b>Response</b>			
Response	<p>Tools for Optimizing the Outcomes of Labor Safely</p> <p><i>ACNM, 2015</i></p>	<p>A toolkit to promote care practices that support physiologic birth has been developed for use by maternity care professionals. With leadership from American College of Nurse-Midwives (ACNM) and consultation from Childbirth Connection a multi-stakeholder committee comprised of representatives from the Association of Women’s Health, Obstetric and Neonatal Nurses, National Association of Certified Professional Midwives and Lamaze International along launched BirthTOOLS (Tools to Optimize Outcomes of Labor Safely) found at www.BirthTOOLS.org. The toolkit contains a synopsis of the evidence base and offers targeted resources, protocols and other materials to assist clinicians and health care systems in implementing best practices that promote physiologic birth.</p> <p>The site is framed around the value that physiologic approaches bring to childbirth for women, providers, and maternity care systems. Its content is organized in 4 major categories: background information; the role of quality improvement in promoting normal physiologic birth; resources to initiate change; and promoting a unit culture that embraces physiologic birth as an approach to improve quality and safety.</p>	
Response	<p>Women’s Health and Perinatal Nursing Care Quality Refined Draft Measures Specifications</p> <p><i>AWHONN, 2014</i></p>	<p>The Women’s Health and Perinatal Nursing Care Quality (WHP-NCQ) draft measures were developed by the Association of Women’s Health, Obstetric and Neonatal Nurses (AWHONN) 2012 Women’s Health and Perinatal Nursing Care Quality Measures Advisory Panel and were distributed for public review and comment. The advisory panel was charged with making recommendations to the Board of Directors concerning the priorities for measuring women’s health and perinatal nursing care quality (NCQ) and with developing a set of NCQ measures. AWHONN gratefully acknowledges the time and expertise of the advisory panel members in the development of this document and introductory set of specified measures.</p>	
Response	<p>Primary Cesarean Delivery in the United States</p> <p><i>ACOG, 2013*</i></p>	<p>Conservative management of the latent stage and second stage of labor is an important strategy to lower the primary cesarean delivery rate.</p>	

Section	Resource	Description	Link
Response	<p>OB Guideline 15: Assessment and Monitoring in Labor and Delivery</p> <p><i>CRICO, 2017</i></p>	<p>During prenatal care, the clinician and patient will discuss common events and procedures in labor, including methods of assessing fetal well-being.</p> <p>The responsible clinician or designee shall evaluate the patient, enter a note, and provide orders within two hours of his or her patient arriving at the Labor and Delivery unit.</p> <p>The clinician or designee shall examine the patient before prescribing initial therapy with tocolytic agents in the second or third trimester. Documentation should include presumptive diagnosis, possible causes, and that informed consent has been obtained.</p>	
Response	<p>Labor and Delivery Teamwork Leads to Fewer Cesareans</p> <p><i>Medscape/SMFM, 2015**</i></p>	<p>When midwives and laborists work in conjunction with an obstetrician, there can be a substantial decrease in the rate of cesarean delivery, according to a study from one large community hospital.</p>	
Response	<p>Toolkit to Support Vaginal Birth and Reduce Primary Cesareans</p> <p><i>CMQCC, 2011</i></p>	<p>The Toolkit is a comprehensive, evidence-based “how-to” guide designed to educate and motivate maternity clinicians to apply best practices for supporting vaginal birth. Cesarean births among low-risk, first-time mothers have been the largest contributor to the recent rise in cesarean rates, and accounts for the greatest variation in cesarean rates between hospitals.</p>	

Section	Resource	Description	Link
<p><b>Response</b></p>	<p>Obstetric Care Consensus No. 1: Safe Prevention of the Primary Cesarean Delivery  ACOG, 2014</p>	<p>In 2011, one in three women who gave birth in the United States did so by cesarean delivery. Cesarean birth can be life-saving for the fetus, the mother, or both in certain cases. However, the rapid increase in cesarean birth rates from 1996 to 2011 without clear evidence of concomitant decreases in maternal or neonatal morbidity or mortality raises significant concern that cesarean delivery is overused. Variation in the rates of nulliparous, term, singleton, vertex cesarean births also indicates that clinical practice patterns affect the number of cesarean births performed. The most common indications for primary cesarean delivery include, in order of frequency, labor dystocia, abnormal or indeterminate (formerly, nonreassuring) fetal heart rate tracing, fetal malpresentation, multiple gestation, and suspected fetal macrosomia. Safe reduction of the rate of primary cesarean deliveries will require different approaches for each of these, as well as other, indications. For example, it may be necessary to revisit the definition of labor dystocia because recent data show that contemporary labor progresses at a rate substantially slower than what was historically taught. Additionally, improved and standardized fetal heart rate interpretation and management may have an effect. Increasing women's access to nonmedical interventions during labor, such as continuous labor and delivery support, also has been shown to reduce cesarean birth rates. External cephalic version for breech presentation and a trial of labor for women with twin gestations when the first twin is in cephalic presentation are other of several examples of interventions that can contribute to the safe lowering of the primary cesarean delivery rate.</p>	

Section	Resource	Description	Link
<p><b>Response</b></p>	<p>Preventing the First Cesarean Delivery: Summary of a Joint Eunice Kennedy Shriver National Institute of Child Health and Human Development, Society for Maternal-Fetal Medicine, and American College of Obstetricians and Gynecologists Workshop</p> <p><i>ACOG, 2012</i></p>	<p>With more than one third of pregnancies in the United States being delivered by cesarean and the growing knowledge of morbidities associated with repeat cesarean deliveries, the Eunice Kennedy Shriver National Institute of Child Health and Human Development, the Society for Maternal-Fetal Medicine, and the American College of Obstetricians and Gynecologists convened a workshop to address the concept of preventing the first cesarean delivery. The available information on maternal and fetal factors, labor management and induction, and nonmedical factors leading to the first cesarean delivery was reviewed as well as the implications of the first cesarean delivery on future reproductive health. Key points were identified to assist with reduction in cesarean delivery rates including that labor induction should be performed primarily for medical indication; if done for nonmedical indications, the gestational age should be at least 39 weeks or more and the cervix should be favorable, especially in the nulliparous patient. Review of the current literature demonstrates the importance of adhering to appropriate definitions for failed induction and arrest of labor progress. The diagnosis of “failed induction” should only be made after an adequate attempt. Adequate time for normal latent and active phases of the first stage, and for the second stage, should be allowed as long as the maternal and fetal conditions permit. The adequate time for each of these stages appears to be longer than traditionally estimated. Operative vaginal delivery is an acceptable birth method when indicated and can safely prevent cesarean delivery. Given the progressively declining use, it is critical that training and experience in operative vaginal delivery are facilitated and encouraged. When discussing the first cesarean delivery with a patient, counseling should include its effect on future reproductive health.</p>	

Section	Resource	Description	Link
<b>Reporting &amp; Systems Learning</b>			
<b>Reporting &amp; Systems Learning</b>	Labor and Delivery Teamwork Leads to Fewer Cesareans <i>Medscape/SMFM, 2015†</i>	When midwives and laborists work in conjunction with an obstetrician, there can be a substantial decrease in the rate of cesarean delivery, according to a study from one large community hospital.	
<b>Reporting &amp; Systems Learning</b>	Consequences of a Primary Elective Cesarean Delivery Across the Reproductive Life <i>ACOG, 2013*</i>	Women undergoing primary elective cesarean delivery incur greater morbidity over their reproductive life; the marginal benefit in neonatal outcome is attenuated with additional pregnancies.	

*These materials were developed with support from the Health Resources and Services Administration (HRSA) of the U.S. Department of Health and Human Services (HHS) as part of a cooperative agreement with the American College of Obstetricians and Gynecologists under grant number UC4MC28042, Alliance for Innovation on Maternal Health. The contents do not necessarily represent the official views of, nor an endorsement, by HRSA, HHS, or the U.S. Government. For more information, please visit HRSA.gov.*

© 2022 American College of Obstetricians and Gynecologists. Permission is hereby granted for duplication and distribution of this document, in its entirety and without modification, for solely non-commercial activities that are for educational, quality improvement, and patient safety purposes. All other uses require written permission from ACOG.

†Must register or login to Medscape for full access to the article

\*Resource Behind Paywall