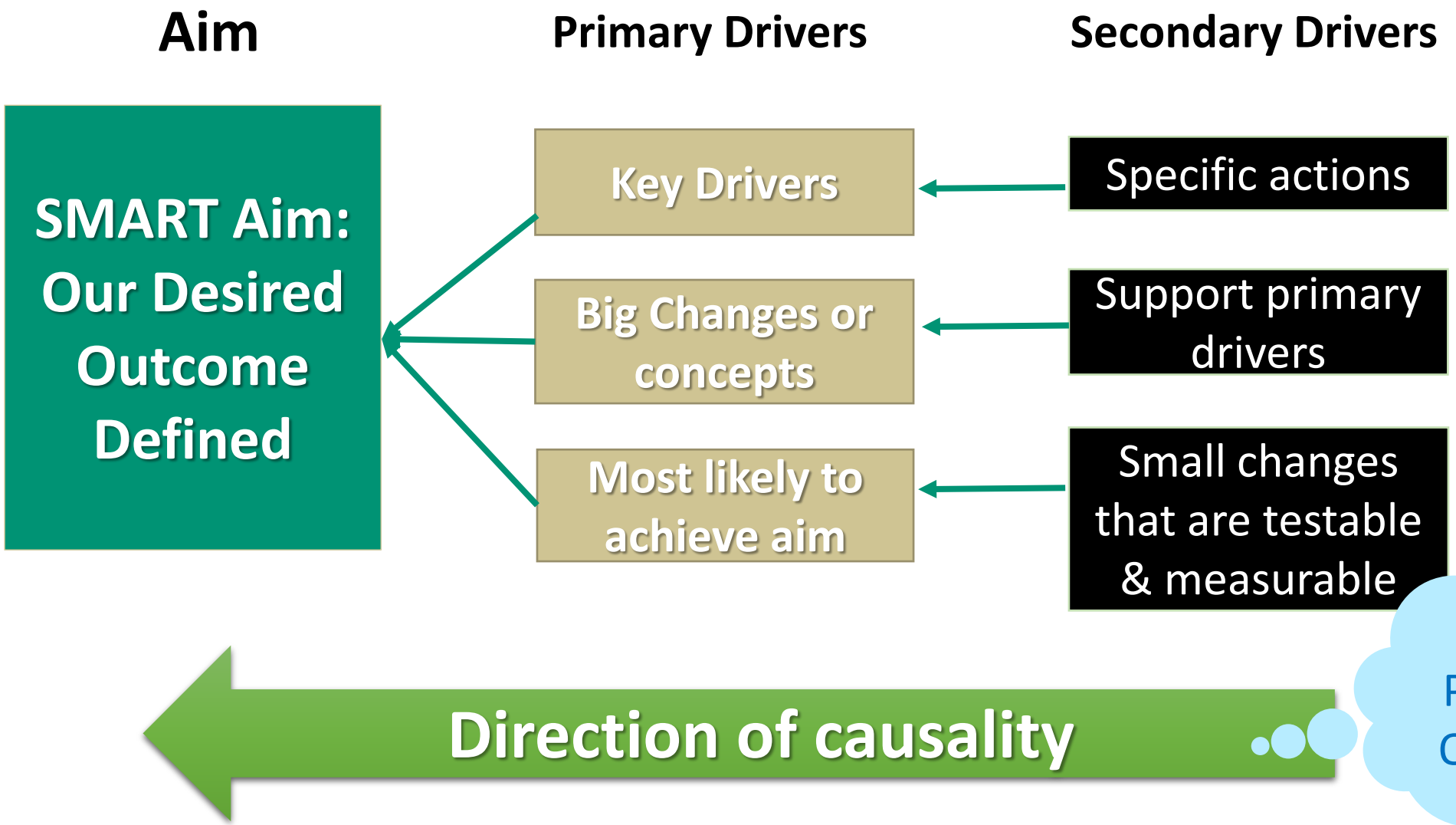
From Data to Action: Measuring What Matters

Estefania Rubio



Key Driver Basic Concepts



Safe Reduction of Primary Cesarean Birth - Key Driver Diagram

***Global aim**: Support hospitals and care teams in implementing evidence-based, patient-centered labor and birth practices that promote vaginal birth and safely reduce unindicated cesarean births.*

Aim	Primary Drivers	Secondary Drivers
By June 2028, participating hospitals will: *- Reduce the % of NTSV cesarean births by 10%.* *- Increase the % of NTSV cesarean births that meet established clinical criteria by 20%.*	Promote team culture and clinical practice alignment that supports vaginal birth and shared decision-making	Mobilize a QI Team of administrators, nurses, physicians, nurse midwives to lead efforts to promote vaginal birth
		Promote patient and family engagement through accessible, evidence-based birth education with an emphasis on informed consent & shared decision-making
		Provide interdisciplinary perinatal team education on strategies that maximize the likelihood of a safe vaginal birth
	Implement standardized processes for induction and labor support	Implement policies, protocols, and support tools for women who present in latent (early) labor to safely encourage early labor at home or in hospital
		Implement standardized policies and protocols to support physiologic labor
		Implement policies and protocols for induction of labor
	Standardize protocols for identification and response to labor challenges	Implement standards and checklists for prevention, diagnosis, and management of failed induction, arrest of labor, and malposition
		Implement standardized assessment and response to indeterminate and abnormal fetal heart rate patterns
		Implement a workflow process for shared decision-making during labor

Respectful care is a universal component of every driver and activity

Aim

By June 2028, participating hospitals will:

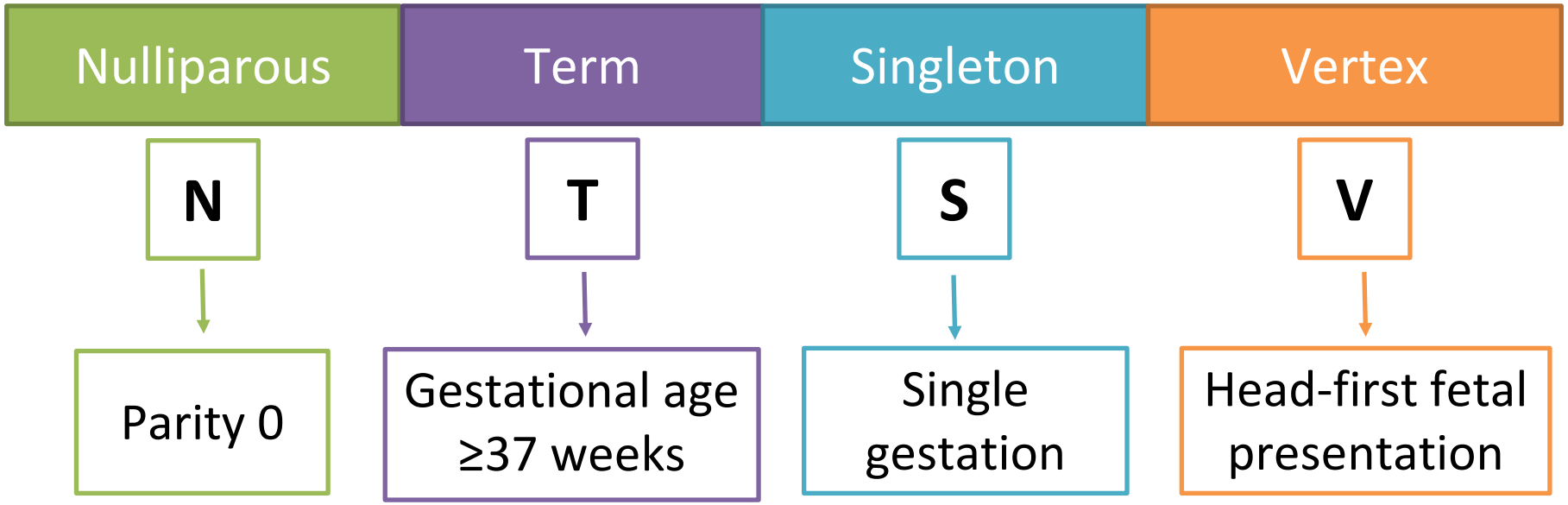
Reduce the percentage of NTSV cesarean births by 10%

Increase the percentage of NTSV cesarean births that meet established clinical criteria by 20%

* Baseline: Data from July-September 2026

FPQC

Our Population: Why Focus on NTSV Cesarean Births?



- **Major driver of cesarean rates:** increase the likelihood of repeat cesareans
- **Wide variation without better outcomes**: hospitals with lower rates have comparable infant outcomes and better maternal outcomes
- **Clear opportunities for improvement**

FPQC

Primary Driver

Promote team culture and clinical practice alignment that supports vaginal birth and shared decision-making

Secondary Drivers

Mobilize a QI Team of administrators, nurses, physicians, nurse midwives to lead efforts to promote vaginal birth

Quarterly Status Update
→ Not started to Fully Implemented

Provide interdisciplinary perinatal team education on strategies that maximize the likelihood of a safe vaginal birth

Cumulative percent of physicians, midwives and nurses that completed training

Hospital-level Data Collection Form: Structural Measures

Impleme within th

Implemer than 3 mo routine pr

Implementing for more than 3 months and **routine practice** (80%+)

To what extent has/does your hospital:	Not Started	Planning/ Developing	Started Implementing	Implemented	Fully Implemented
Implemented guidelines, policies, or procedures, reviewed and updated within the last 2 years as applicable, that address the following areas:					
Evidence-based labor admission criteria?	☐	☐	☐	☐	☐
Safe outpatient induction initiation?	☐	☐	☐	☐	☐
Evidence-based induction of labor processes?	☐	☐	☐	☐	☐
Labor pain management and support practices?	☐	☐	☐	☐	☐

FPQC

Primary Key Driver

Secondary Drivers

Standardize protocols for identification and response to labor challenges

- Implement standards and checklists for prevention, diagnosis, and management of failed induction, arrest of labor, and malposition
- Implement standardized assessment and response to indeterminate and abnormal fetal heart rate patterns
- Implement a workflow process for shared decision-making during labor

% Patients in the monthly sample!

Patient-Level Data Collection Form: Process Measures

Cesarean after Induction	
Reason for induction: □ Elective □ Other maternal indication □ Hypertensive disorder □ Fetal indication □ Post term/post dates □ Other_____	**Time from start of induction to delivery:** HH:MM If Bishop score ≤8 (traditional) or ≤5 (simplified) at start of induction, was cervical ripening used? □ Yes, mechanical method □ Yes, dual agents □Yes, pharmacologic method □ No
Cervix Dilation At the time of cesarean decision:	
If <6 cm, was oxytocin administered for at least 12–18 hours after membrane rupture before failed induction was diagnosed?	□ Yes □ No
If ≥6 cm, was there at least 4h with adequate uterine activity OR at least 6h with inadequate uterine activity and with oxytocin?	□ Yes □ No
If fully dilated at the time of cesarean decision, were there 3 hours or more of pushing?	□ Yes □ No

Data Collection: Types & Tools

Data Submitted to FPQC

Patient-Level Data

- Abstracted patient data
- Submitted ***monthly***
- Due by the 15th of the following month

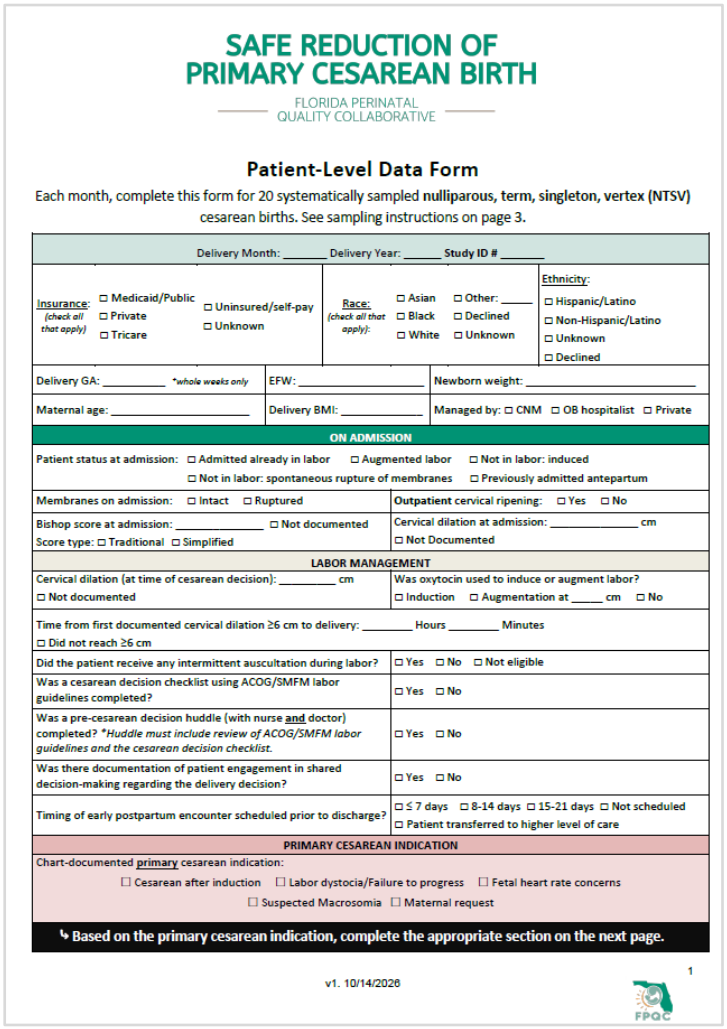
Hospital-Level Data

- Includes:
  - Staff training
  - Update on structural measures
- Submitted ***quarterly***
- Due by the 25th of the month following the quarter

All data is submitted through REDCap surveys *only*!

FPQC

Patient-Level Data Collection Form



SAFE REDUCTION OF PRIMARY CESAREAN BIRTH

FLORIDA PERINATAL QUALITY COLLABORATIVE

Patient-Level Data Form

Each month, complete this form for 20 systematically sampled **nulliparous, term, singleton, vertex (NTSV)** cesarean births. See sampling instructions on page 3.

Delivery Month: _____ Delivery Year: _____ Study ID # _____

Insurance: (check all that apply) ☐ Medicaid/Public ☐ Private ☐ Tricare ☐ Uninsured/self-pay ☐ Unknown

Race: (check all that apply): ☐ Asian ☐ Black ☐ White ☐ Other: ____ ☐ Declined ☐ Unknown

Ethnicity: ☐ Hispanic/Latino ☐ Non-Hispanic/Latino ☐ Unknown ☐ Declined

Delivery GA: _____ *whole weeks only | EFW: _____ | Newborn weight: _____

Maternal age: _____ | Delivery BMI: _____ | Managed by: ☐ CNM ☐ OB hospitalist ☐ Private

ON ADMISSION

Patient status at admission: ☐ Admitted already in labor ☐ Augmented labor ☐ Not in labor: induced ☐ Not in labor: spontaneous rupture of membranes ☐ Previously admitted antepartum

Membranes on admission: ☐ Intact ☐ Ruptured | **Outpatient** cervical ripening: ☐ Yes ☐ No

Bishop score at admission: _____ ☐ Not documented
Score type: ☐ Traditional ☐ Simplified | Cervical dilation at admission: _____ cm ☐ Not Documented

LABOR MANAGEMENT

Cervical dilation (at time of cesarean decision): _____ cm ☐ Not documented | Was oxytocin used to induce or augment labor? ☐ Induction ☐ Augmentation at _____ cm ☐ No

Time from first documented cervical dilation ≥6 cm to delivery: _____ Hours _____ Minutes ☐ Did not reach ≥6 cm

Did the patient receive any intermittent auscultation during labor? ☐ Yes ☐ No ☐ Not eligible

Was a cesarean decision checklist using ACOG/SMFM labor guidelines completed? ☐ Yes ☐ No

Was a pre-cesarean decision huddle (with nurse **and** doctor) completed? **Huddle must include review of ACOG/SMFM labor guidelines and the cesarean decision checklist.* ☐ Yes ☐ No

Was there documentation of patient engagement in shared decision-making regarding the delivery decision? ☐ Yes ☐ No

Timing of early postpartum encounter scheduled prior to discharge? ☐ ≤ 7 days ☐ 8-14 days ☐ 15-21 days ☐ Not scheduled ☐ Patient transferred to higher level of care

PRIMARY CESAREAN INDICATION

Chart-documented **primary** cesarean indication:
☐ Cesarean after induction ☐ Labor dystocia/Failure to progress ☐ Fetal heart rate concerns ☐ Suspected Macrosomia ☐ Maternal request

↳ **Based on the primary cesarean indication, complete the appropriate section on the next page.**

v1. 10/14/2026 1

Cesarean After Induction

Reason for induction:
☐ Elective ☐ Hypertensive disorder ☐ Post term/post dates ☐ Other maternal indication ☐ Fetal indication ☐ Other: _____

Time from start of induction to delivery: _____ Hours _____ Mins

Bishop score at the start of induction _____ ☐ Not documented
Score type: ☐ Traditional ☐ Simplified

If Bishop score ≤8 (traditional) or ≤5 (simplified) at start of induction, was cervical ripening used? ☐ Yes, mechanical method ☐ Yes, dual agents ☐ Yes, pharmacologic methods ☐ No

Cervix Dilation at the Time of Cesarean Decision:

If <6 cm: Was oxytocin administered for at least 12–18 hours after membrane rupture before failed induction was diagnosed? ☐ Yes ☐ No

If ≥6 cm: Was there at least 4 hours with adequate uterine activity OR at least 6 hours with inadequate uterine activity and with oxytocin? ☐ Yes ☐ No

If fully dilated at the time of cesarean decision: Were there 3 hours or more of pushing? ☐ Yes ☐ No

Cesarean After Labor Dystocia or Failure to Progress

Cervix Dilation at the Time of Cesarean Decision:

If ≥6 cm: Check the *one* reason for cesarean that applies:
☐ Membranes ruptured and no cervical change x 4 hours with Adequate Uterine activity (e.g., > 200 MVU)
☐ Membranes ruptured, oxytocin administered, and no cervical change for 6 hours with Inadequate Uterine activity (e.g., < 200 MVU)
☐ None of the above

If fully dilated at the time of cesarean decision: Were there 3 hours or more of pushing? ☐ Yes ☐ No

Cesarean After Fetal Heart Rate Concerns

What was the FHR concern/indication?
☐ Antepartum testing results which precluded trial of labor
☐ Category III FHR tracing
☐ Category II FHR tracing:
  ☐ Recurrent variable decelerations
  ☐ Minimal/absent FHR variability without significant decelerations
☐ Other concern: _____

Corrective and evaluative measures used (select all that apply)
☐ Basic resuscitation: maternal position change or maternal fluid bolus
☐ Reduced/stopped oxytocin or uterine stimulants
☐ Amnioinfusion with recurrent variable decelerations after other measures failed
☐ Elicited stimulation (scalp, vibroacoustic, abdominal wall) with minimal/absent FHR variability
☐ None

Uterine tachysystole? ☐ No ☐ Yes → If yes: Corrected uterine tachysystole (decrease/discontinue uterine stimulants, fluid bolus, terbutaline or nitroglycerin and/or other)? ☐ Yes ☐ No

Maternal Request

When was maternal request first documented?
☐ Prior to admission (scheduled) ☐ During latent labor ☐ During active labor

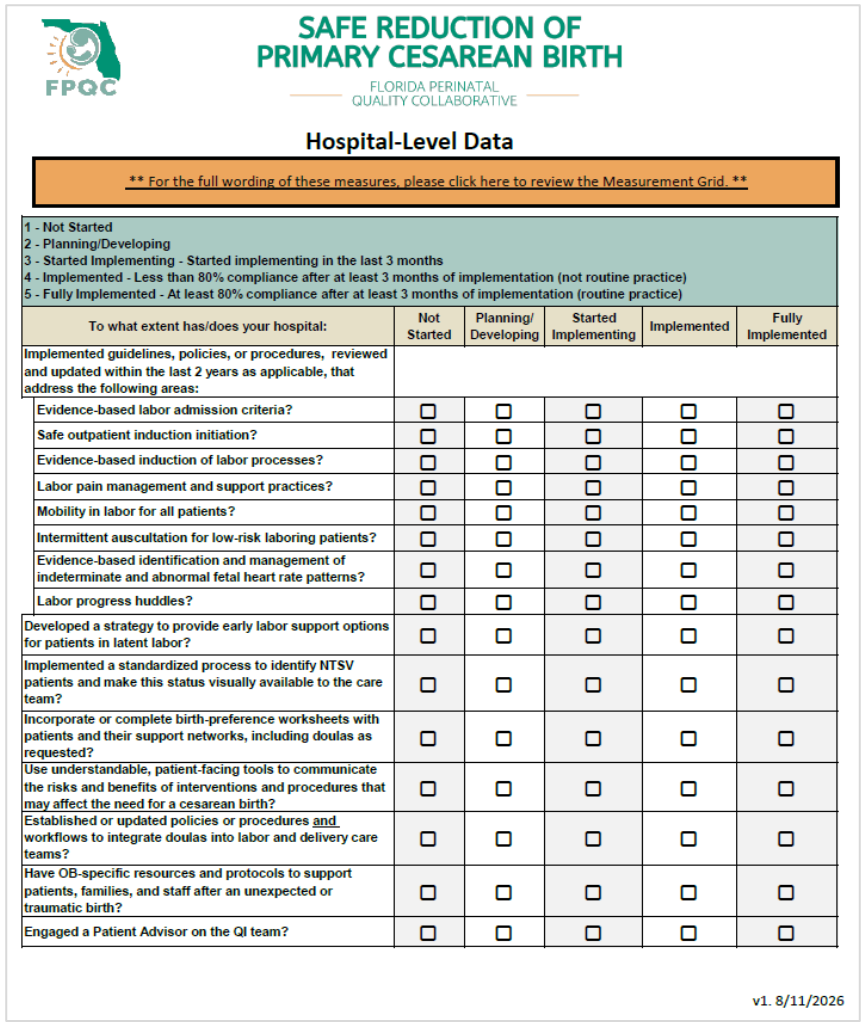
Documented reason for the request *(check all that apply)*
☐ Fear/anxiety related to labor or birth ☐ Previous trauma or adverse birth experience ☐ Concern about maternal or infant safety ☐ Desire for predictability/control ☐ No reason documented ☐ Maternal exhaustion ☐ Concern about labor pain ☐ Pelvic floor concerns ☐ Other: _____

Counseling/shared decision-making documented *(check all that apply)*
☐ Benefits and risks of vaginal and cesarean birth discussed ☐ Vaginal birth recommended as safe and appropriate ☐ Labor analgesia options discussed ☐ Patient reaffirmed request after counseling ☐ None documented

v1. 10/14/2026 2

Baseline July-September due on December 15th!

Hospital-Level Data Collection Form



FPQC

SAFE REDUCTION OF PRIMARY CESAREAN BIRTH

FLORIDA PERINATAL QUALITY COLLABORATIVE

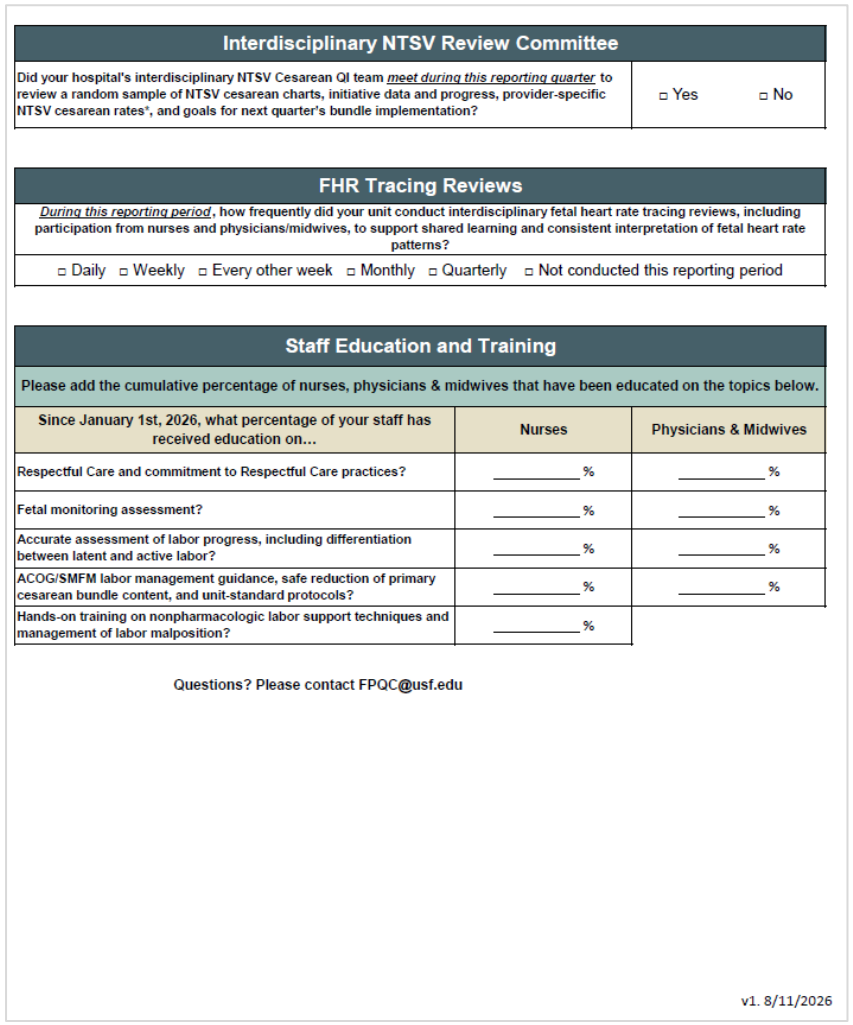
Hospital-Level Data

** For the full wording of these measures, please click here to review the Measurement Grid. **

1 - Not Started
2 - Planning/Developing
3 - Started Implementing - Started implementing in the last 3 months
4 - Implemented - Less than 80% compliance after at least 3 months of implementation (not routine practice)
5 - Fully Implemented - At least 80% compliance after at least 3 months of implementation (routine practice)

To what extent has/does your hospital:	Not Started	Planning/ Developing	Started Implementing	Implemented	Fully Implemented
Implemented guidelines, policies, or procedures, reviewed and updated within the last 2 years as applicable, that address the following areas:					
Evidence-based labor admission criteria?	☐	☐	☐	☐	☐
Safe outpatient induction initiation?	☐	☐	☐	☐	☐
Evidence-based induction of labor processes?	☐	☐	☐	☐	☐
Labor pain management and support practices?	☐	☐	☐	☐	☐
Mobility in labor for all patients?	☐	☐	☐	☐	☐
Intermittent auscultation for low-risk laboring patients?	☐	☐	☐	☐	☐
Evidence-based identification and management of indeterminate and abnormal fetal heart rate patterns?	☐	☐	☐	☐	☐
Labor progress huddles?	☐	☐	☐	☐	☐
Developed a strategy to provide early labor support options for patients in latent labor?	☐	☐	☐	☐	☐
Implemented a standardized process to identify NTSV patients and make this status visually available to the care team?	☐	☐	☐	☐	☐
Incorporate or complete birth-preference worksheets with patients and their support networks, including doulas as requested?	☐	☐	☐	☐	☐
Use understandable, patient-facing tools to communicate the risks and benefits of interventions and procedures that may affect the need for a cesarean birth?	☐	☐	☐	☐	☐
Established or updated policies or procedures and workflows to integrate doulas into labor and delivery care teams?	☐	☐	☐	☐	☐
Have OB-specific resources and protocols to support patients, families, and staff after an unexpected or traumatic birth?	☐	☐	☐	☐	☐
Engaged a Patient Advisor on the QI team?	☐	☐	☐	☐	☐

v1. 8/11/2026



Interdisciplinary NTSV Review Committee		
Did your hospital's interdisciplinary NTSV Cesarean QI team *meet during this reporting quarter* to review a random sample of NTSV cesarean charts, initiative data and progress, provider-specific NTSV cesarean rates*, and goals for next quarter's bundle implementation?	☐ Yes	☐ No

FHR Tracing Reviews
During this reporting period, how frequently did your unit conduct interdisciplinary fetal heart rate tracing reviews, including participation from nurses and physicians/midwives, to support shared learning and consistent interpretation of fetal heart rate patterns?
☐ Daily ☐ Weekly ☐ Every other week ☐ Monthly ☐ Quarterly ☐ Not conducted this reporting period

Staff Education and Training

Please add the cumulative percentage of nurses, physicians & midwives that have been educated on the topics below.

Since January 1st, 2026, what percentage of your staff has received education on…	Nurses	Physicians & Midwives
Respectful Care and commitment to Respectful Care practices?	_____ %	_____ %
Fetal monitoring assessment?	_____ %	_____ %
Accurate assessment of labor progress, including differentiation between latent and active labor?	_____ %	_____ %
ACOG/SMFM labor management guidance, safe reduction of primary cesarean bundle content, and unit-standard protocols?	_____ %	_____ %
Hands-on training on nonpharmacologic labor support techniques and management of labor malposition?	_____ %	

Questions? Please contact FPQC@usf.edu

v1. 8/11/2026

Baseline due November 15th! – No DUA required!

FPQC

“What gets measured, gets managed.”

Only when measurement leads to learning - and learning leads to action.

Connect the Aim to the action: The improvement loop

Aim

What are we trying to accomplish?

→

Measure

How will we know we are improving?

→

Change

What can we test to improve care?

A lower rate is the goal. More reliable, evidence-based care is the work.

The Model for Improvement: PDSAs

From your abstracted data choose one process to examine and one change to test.

Change idea	First test	What to learn
NTSV identification cue	Next 5 labor admissions on one shift	Were eligible patients identified correctly? Any missed or incorrect flags?
Labor-support prompt	Next 3 labor handoffs with one nurse pair	Was a support option discussed? What did patients and staff find useful?
Documentation prompt	Next 3 nonurgent fetal heart rate reviews	Did the prompt capture the approved pathway without adding unnecessary work?

Choose one test. Make a prediction. Review what happened and decide the next test.

FPQC

PDSA testing belongs in the regular QI cycle

At the team meeting	Review the report and recent cases. Choose a gap and a small test.
Between meetings	Run short PDSA cycles. Keep a local tally and adapt as you learn.
At the next review	Bring what you tried, what happened and what you will test next.
On coaching calls	Share barriers, failures, and/or useful changes. Add PDSA notes to your report.

A test can take one shift. Learning does not need to wait for the next report.

FPQC

IMPORTANT REQUESTS

- ❑ Track completion of your hospital's Data Use Agreement (DUA)
- ❑ Let us know of any changes in your team: data lead resources
- ❑ Attend the data webinar on **Thursday, October 27 @ 12:00pm**

Register here:

Questions?

erubio1@usf.edu

fpqc@usf.edu

www.fpqc.org



"To improve the health and health care of all Florida mothers & babies"

FPQC