

Induction, Oxytocin & Tachysystole

"What finding is most dangerous for mother or fetus — and what should the nurse do first?" Today: the most-tested OB infusion in nursing school, the silent killer named uterine tachysystole, and the cervical ripening agents that quietly turn a routine induction into a Category III emergency.

DIFFICULTY · NGN APPLICATION+

FRAMEWORK · NCSBN CLINICAL JUDGMENT MODEL

FOCUS · MATERNAL-FETAL SAFETY

2026 NCLEX-RN TEST PLAN ALIGNED

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§ 01 High-Yield Overview

Labor induction means starting labor before it begins on its own. **Labor augmentation** means strengthening contractions that have already started but are inadequate. Both are routine — and both are tested on NCLEX because they create predictable, dangerous complications when the nurse is not paying attention.

The chain of events you must memorize: **Bishop score determines readiness** → **cervical ripening softens the cervix** → **amniotomy or oxytocin drives contractions** → **fetal monitoring detects intolerance**. The single biggest threat on NCLEX is **uterine tachysystole** — more than 5 contractions in 10 minutes averaged over 30 minutes — because contractions compress the placenta, cut off uteroplacental perfusion, and starve the fetus of oxygen. Add a non-reassuring tracing and you have a Category II/III emergency that **begins with stopping the oxytocin**.

The Bishop Score (cervical readiness for induction)

Scored 0–13. The higher the score, the more "favorable" (ripe) the cervix and the higher the chance of successful vaginal birth. Five components: **dilation, effacement, station, consistency, position**. A score ≥ 8 is favorable in a nullipara; ≤ 6 = unfavorable → needs cervical ripening before oxytocin. This is a classic NCLEX matrix item.

Two-Family Drug Map (must commit to memory)

FAMILY	DRUG	ACTION	WHERE IT LIVES
Cervical ripening	Dinoprostone (Cervidil insert, Prepidil gel)	Prostaglandin E ₂ — softens/effaces cervix	Posterior vaginal fornix
Cervical ripening	Misoprostol (Cytotec)	Prostaglandin E ₁ — ripens cervix & can induce contractions	PO or intravaginal (off-label OB use)
Mechanical ripening	Foley balloon / Cook catheter	Pressure on internal os → releases endogenous prostaglandins	Inserted by provider through cervix
Augmentation / Induction	Oxytocin (Pitocin)	Stimulates uterine smooth muscle contractions	IV piggyback into mainline, infusion pump
Tocolytic / Rescue	Terbutaline	Relaxes uterus — used to stop tachysystole	SubQ 0.25 mg, after stopping oxytocin

— ANCHOR CONCEPT

Oxytocin causes contractions. Contractions compress the placenta. A compressed placenta cannot oxygenate the fetus. Every NCLEX oxytocin question is testing whether you can recognize that the contractions are now hurting the fetus — and whether you will stop the drug before waiting for an order.

10 Must-Know Rules

- 01 **Tachysystole = > 5 contractions in 10 minutes** averaged over a 30-minute window. Do NOT need fetal changes to call it tachysystole — but tachysystole + non-reassuring FHR = emergency.
- 02 **Stop the oxytocin first** in any oxytocin-related emergency. This is a *standing nursing intervention* — you do not need a new order to discontinue. Then reposition, IV bolus, O₂ per policy, notify.
- 03 **Misoprostol and oxytocin must be separated.** Wait at least **4 hours** after the last misoprostol dose before starting oxytocin (risk of tachysystole & uterine rupture).
- 04 **Dinoprostone insert (Cervidil) is removed** when active labor starts, tachysystole develops, the tracing becomes non-reassuring, or 12 hours have passed. *Pull the string* — it's designed for retrieval.
- 05 **Oxytocin is a HIGH-ALERT medication.** Always on a pump, always piggybacked into a primary line at the closest port, always increased by small mU/min increments per protocol (typically every 30–60 min).
- 06 **No prostaglandins** (misoprostol, dinoprostone) for clients with **previous cesarean or uterine scar** — risk of uterine rupture is unacceptable.
- 07 **Bishop score ≤ 6 = unfavorable** → ripen first. ≥ 8 = favorable → may proceed to oxytocin or amniotomy. This question pattern shows up as a matrix on NGN.
- 08 **Adequate contraction pattern** for active labor: every 2–3 minutes, 60–90 seconds long, moderate-to-strong intensity, with resting tone between (uterus soft to palpation). No resting tone = danger.
- 09 **Terbutaline 0.25 mg SubQ** is the typical rescue tocolytic for tachysystole that does not resolve after stopping oxytocin and intrauterine resuscitation. Hold for maternal HR > 120.
- 10 **Always check the FHR baseline and variability BEFORE** starting or increasing oxytocin, and BEFORE inserting any cervical ripening agent. If the baseline tracing is already non-reassuring, do not start.

§ 03 Maternal-Fetal Safety Table

FINDING	WHAT IT MEANS	MOTHER RISK	FETAL/NEWBORN RISK	PRIORITY NURSING ACTION	WHEN TO NOTIFY / ESCALATE
Tachysystole >5 ctx/10 min × 30 min	Uterus over-stimulated by oxytocin or prostaglandins	Uterine rupture, abruption, exhaustion	Hypoxia, acidosis, late decels, fetal demise	Stop oxytocin → reposition L-side → 500–1000 mL LR IV bolus → assess FHR → consider O ₂ 10 L NRB per policy	Notify provider if tracing remains Category II/III after 10 min, OR consider terbutaline 0.25 mg SubQ
Late decelerations	Uteroplacental insufficiency — fetus not getting O ₂ during contractions	Underlying hypotension, abruption, hyperstimulation	Fetal acidosis, hypoxia	Stop oxytocin → reposition → IV bolus → O ₂ per policy → re-evaluate tracing	Notify provider — Category II tracing; prepare for possible C-section if persistent
Prolonged deceleration FHR drop >2 min and <10 min below baseline	Acute compromise — could be cord, abruption, rupture	Underlying catastrophe (rupture, abruption, prolapse)	Severe hypoxia	Stop oxytocin → vaginal exam to rule out cord prolapse → reposition → IV fluid → O ₂ → call provider/RRT	Immediate provider notification; prepare for emergency birth
Loss of resting tone (boggy / continuously hard uterus)	Sustained contraction — hyperstimulation	Uterine rupture, abruption	Total loss of placental perfusion	Stop oxytocin → notify provider → terbutaline 0.25 mg SubQ per order	Emergency — call provider immediately
Sudden severe abdominal pain + loss of FHR / change in fetal station	Uterine rupture (esp. with prior cesarean + induction)	Hemorrhagic shock, hysterectomy, death	Fetal demise within minutes	Stop oxytocin → call rapid response/OB emergency → IV fluids wide open → 2 large-bore IVs → type & cross → consent for emergency C-section	Activate OB emergency / surgical team immediately
Maternal hypotension after oxytocin bolus or with rapid titration	Oxytocin smooth-muscle effect on vasculature; volume shift	Decreased perfusion, syncope	Reduced placental blood flow → late decels	Stop/decrease oxytocin → IV bolus → L-side → reassess FHR	Notify if BP not improving with bolus

FINDING	WHAT IT MEANS	MOTHER RISK	FETAL/NEWBORN RISK	PRIORITY NURSING ACTION	WHEN TO NOTIFY / ESCALATE
Water intoxication (hyponatremia: headache, confusion, N/V, oliguria, seizures) — with prolonged high-dose oxytocin in D5W	Oxytocin's antidiuretic effect causes water retention	Seizures, pulmonary edema	Limited (late, prolonged inductions)	Stop/reduce oxytocin → switch to isotonic IV → assess neuro & I/O → notify provider	Notify for confusion, seizures, hyponatremia <125
Maternal fever / foul amniotic fluid during long induction	Chorioamnionitis	Sepsis, postpartum endometritis	Neonatal sepsis, pneumonia	Notify provider → blood & urine cultures → antibiotics per order → fetal HR closely (tachycardia)	Notify immediately for T ≥ 38°C / 100.4°F

S 04 Red-Flag Cues

— IMMEDIATE ASSESSMENT

Sudden FHR drop · Loss of variability · New late or prolonged deceleration · Sudden severe abdominal pain · Vaginal bleeding (more than bloody show) · Sudden change in contraction pattern · Maternal complaint of "something is wrong" or "I feel pressure" (concealed bleeding, rupture, advanced labor).

— REPOSITION (LEFT LATERAL FIRST)

Variable decelerations · Maternal hypotension · After epidural placement · Tachysystole · Persistent supine position with non-reassuring tracing. *Left lateral takes weight off the inferior vena cava and aorta and is the first non-medication intervention.*

— IV FLUID BOLUS (PER PROTOCOL)

500–1000 mL of **warmed isotonic fluid (LR)** for: maternal hypotension, tachysystole, suspected uteroplacental insufficiency, before/after epidural. *Avoid D5W boluses for resuscitation* — uses isotonic crystalloid.

— STOP OXYTOCIN IMMEDIATELY

Tachysystole · Category II tracing not resolving · Category III tracing · Loss of variability · Recurrent late decels · Recurrent prolonged variables · Suspected uterine rupture or abruption · Maternal seizure · Loss of resting tone.

— OXYGEN (10 L VIA NON-REBREATHER, PER FACILITY POLICY)

Apply only when clinically indicated by the fetal status and per facility policy — typically during intrauterine resuscitation for Category II/III tracings when the tracing does not improve with repositioning and fluids. *Routine oxygen for low-risk labor is no longer standard.*

— NOTIFY PROVIDER

Tachysystole that does not resolve in 10 minutes · Category II tracing · Persistent late decelerations · Suspected uterine rupture · Cord prolapse · Maternal fever $\geq 38^{\circ}\text{C}/100.4^{\circ}\text{F}$ · Heavy vaginal bleeding · Severe headache/visual changes (preeclampsia developing).

— RAPID RESPONSE / EMERGENCY BIRTH PREP

Cord prolapse · Suspected uterine rupture · Eclamptic seizure · Massive hemorrhage · Category III tracing not improving with full intrauterine resuscitation · Fetal bradycardia $< 110 \text{ bpm} > 10 \text{ min}$ · Maternal cardiac arrest.

§ 05 Medication Safety

Oxytocin (PITOCIN) — HIGH-ALERT

WHY GIVEN	Induction or augmentation of labor; control of postpartum hemorrhage
ASSESS BEFORE	Baseline FHR & variability, contraction pattern, resting tone, BP, cervical exam, hydration status, allergies, prior uterine surgery
MOST DANGEROUS AE	Uterine tachysystole → fetal hypoxia, uterine rupture, abruption; also water intoxication (hyponatremia) with prolonged high doses in hypotonic fluid
HOLD/NOTIFY	STOP infusion for: >5 ctx/10 min, ctx >90 sec, resting tone elevated, Category II/III tracing, suspected rupture, maternal hypotension
REVERSAL	None — half-life is short (~3–5 min). Stopping the infusion is "the antidote." Terbutaline 0.25 mg SubQ relaxes uterus if needed.
MONITORING	Continuous EFM; q15 min FHR & ctx in active first stage, q5 min in second stage; I/O strictly; BP q15–30 min; titrate per protocol
TEACHING	Report sudden severe pain, dizziness, decreased fetal movement; explain why contractions feel stronger; remain monitored continuously
NCLEX TRAP	<i>Increasing oxytocin "as ordered" without first verifying the FHR is reassuring. Always reassess the tracing BEFORE titrating up.</i>

Misoprostol (CYTOTEC) — PROSTAGLANDIN E₁

WHY GIVEN	Cervical ripening; can also induce labor; used postpartum for hemorrhage from atony (off-label)
ASSESS BEFORE	FHR baseline & variability, contraction pattern, Bishop score, history of uterine surgery, allergies, asthma history
MOST DANGEROUS AE	Tachysystole, uterine rupture (especially with prior cesarean — contraindicated), GI side effects
HOLD/NOTIFY	Do not give if prior cesarean or uterine surgery; do not start oxytocin until ≥ 4 hours after last dose
REVERSAL	None — terbutaline 0.25 mg SubQ as rescue for tachysystole
MONITORING	Continuous EFM for at least 30 min after dose; ctx pattern, resting tone, maternal vitals
TEACHING	Report cramping/contractions, pelvic pressure, leakage of fluid; remain in bed × 30 min after vaginal placement
NCLEX TRAP	<i>Giving to a client with prior cesarean. Also: starting oxytocin too soon (< 4 hours after last dose) and producing tachysystole.</i>

Dinoprostone (CERVIDIL INSERT, PREPIDIL GEL) — PROSTAGLANDIN E₂

WHY GIVEN	Cervical ripening before induction
ASSESS BEFORE	FHR & variability baseline (≥20 min reassuring strip), no active labor, no prior C-section, no asthma (relative)
MOST DANGEROUS AE	Tachysystole, fetal compromise, GI upset
HOLD/NOTIFY	Remove insert (pull string) if: active labor, tachysystole, non-reassuring FHR, ROM, or 12 hrs elapsed. Wait ≥ 30 min after removal before oxytocin.
REVERSAL	Removal of insert is the primary "antidote"; terbutaline if tachysystole persists
MONITORING	Continuous EFM × 2 hrs after insertion minimum, then per protocol; stay recumbent × 2 hrs
TEACHING	Stay in bed × 2 hours; do not pull string yourself; report contractions, rupture of membranes, severe pain
NCLEX TRAP	<i>Forgetting to remove the insert as the first action when tachysystole or a Category II/III tracing develops.</i>

Terbutaline (BRETHINE) — B₂ AGONIST TOCOLYTIC

WHY GIVEN	Rescue tocolytic for tachysystole that doesn't resolve; uterine relaxation for procedures (e.g., external cephalic version)
ASSESS BEFORE	Maternal HR (must be < 120), BP, glucose, cardiac history
MOST DANGEROUS AE	Maternal tachycardia, palpitations, pulmonary edema, hyperglycemia, tremors
HOLD/NOTIFY	Hold for HR ≥ 120, chest pain, dyspnea; not for chronic preterm labor management (FDA warning)
REVERSAL	None specific; supportive — short half-life
MONITORING	Maternal HR, BP, lung sounds, glucose if diabetic; FHR (may transiently rise)
TEACHING	Expect a racing heart and shakiness; report chest pain, shortness of breath
NCLEX TRAP	<i>Giving terbutaline before stopping the oxytocin. Stop the oxytocin first; terbutaline is rescue, not first-line.</i>

§ 06 Fetal Monitoring During Induction

Tracing Components — what to scan in order

COMPONENT	NORMAL	CONCERNING (CAT II)	OMINOUS (CAT III)	PRIORITY ACTION
Baseline FHR	110–160 bpm × 10 min	Tachycardia ≥ 160 (maternal fever, oxytocin, terbutaline); bradycardia 100–109	Bradycardia < 100 for > 10 min	Treat cause — maternal fever, infection, hypoxia, oxytocin titration
Variability	Moderate (6–25 bpm)	Minimal (≤5 bpm) for ≥ 40 min	Absent + decelerations or absent + bradycardia	Reassess: fetal sleep cycle? meds? hypoxia? Stimulate fetal scalp; if persistent absent — escalate
Accelerations	≥15 bpm × ≥15 sec (term)	Absent after stimulation	—	Reassuring sign — document; continue monitoring
Early decels	Mirror contractions; benign head compression	—	—	No intervention — document
Late decels	Should NOT occur	Recurrent (with ≥50% of ctx); uteroplacental insufficiency	Recurrent + minimal/absent variability	STOP OXYTOCIN , L-side, IV bolus, O ₂ per policy, notify
Variable decels	Occasional V-shape; cord compression	Recurrent, deep (<70 for >60 sec), or with loss of variability	Recurrent + minimal/absent variability	Reposition, vaginal exam (rule out cord prolapse), amnioinfusion if ordered, stop oxytocin if recurrent
Prolonged decel	—	2–10 min below baseline	>10 min = baseline change (bradycardia)	Stop oxytocin, vaginal exam, reposition, IV bolus, O ₂ , call provider, prep for delivery
Contraction pattern	≤5/10 min, resting tone soft	Tachysystole (>5/10 min) with normal tracing	Tachysystole + Category II/III	Decrease/stop oxytocin; intrauterine resuscitation; terbutaline if persistent

Category interpretation — at a glance

Category I

Normal. Baseline 110–160, moderate variability, no late or variable decels. Accelerations present or absent (both OK). *Continue routine monitoring.*

Category II

Indeterminate. Anything that's not Cat I or III — minimal variability, tachycardia, recurrent variables, prolonged decels. *Intrauterine resuscitation + continuous monitoring + provider notification.*

Category III

Abnormal — predictive of fetal acidemia. Absent variability with recurrent lates, recurrent variables, bradycardia, OR sinusoidal pattern. *Prepare for emergency birth; intrauterine resuscitation now.*

— INTRAUTERINE RESUSCITATION — THE BUNDLE

Memorize this 5-step set as a unit: **(1)** Stop oxytocin → **(2)** Reposition (L-side first, then R-side, then knee-chest if needed) → **(3)** IV fluid bolus (LR 500–1000 mL) → **(4)** Oxygen 10 L NRB per policy if tracing remains non-reassuring → **(5)** Notify provider & prepare for delivery. Vaginal exam to rule out cord prolapse fits between (1) and (2) for prolonged or sudden severe decelerations.

§ 07 NGN Practice Questions

QUESTION 01

MULTIPLE CHOICE — RECOGNIZE CUES

A nurse is caring for a primigravida being induced with oxytocin at 38 weeks' gestation. The nurse notes 7 contractions in 10 minutes with a resting tone that remains slightly elevated. The FHR baseline is 145 bpm with moderate variability and no decelerations. Which action should the nurse take **first**?

- A Notify the obstetric provider
- B Stop the oxytocin infusion ✓
- C Administer terbutaline 0.25 mg SubQ
- D Apply oxygen at 10 L/min via non-rebreather

QUESTION 02

SELECT ALL THAT APPLY — TAKE ACTION

A client at 40 weeks' gestation is receiving oxytocin for labor augmentation. The FHR strip now shows recurrent late decelerations with minimal variability. Select **all** the actions the nurse should take.

- A Discontinue the oxytocin infusion ✓
- B Reposition the client to the left lateral side ✓
- C Administer a 500-mL lactated Ringer's IV bolus ✓
- D Apply oxygen 10 L/min via non-rebreather per policy ✓
- E Increase the oxytocin to overcome the decelerations
- F Notify the obstetric provider ✓
- G Document the tracing as Category I

QUESTION 03
MATRIX / GRID – ANALYZE CUES

A client is being assessed for cervical readiness prior to induction. For each finding, indicate whether it is FAVORABLE or UNFAVORABLE on the Bishop score.

FINDING	FAVORABLE	UNFAVORABLE
Cervix 4 cm dilated	✓	
Cervix 0% effaced (thick)		✓
Fetal station –3		✓
Cervix soft consistency	✓	
Cervix posterior position		✓
Cervix 80% effaced	✓	

QUESTION 04

BOW-TIE — GENERATE SOLUTIONS

A 32-year-old G3P2 at 41 weeks is being induced. She has had one prior low-transverse cesarean. The provider orders misoprostol 25 mcg intravaginal for cervical ripening.

Condition the nurse is most concerned about:

A Hyperemesis

B Uterine rupture ✓

C Hyperthermia

D Hyponatremia

Actions to take (select 2):

A Hold the medication and clarify the order with the provider ✓

B Administer the dose as ordered and monitor for tachysystole

C Discuss mechanical ripening (Foley balloon) as a safer alternative ✓

D Begin oxytocin simultaneously to enhance ripening

Parameters to monitor (select 2):

A Continuous fetal heart rate tracing ✓

B Uterine contraction pattern and resting tone ✓

C Maternal blood glucose every hour

D Daily fundal height measurements

QUESTION 05

ORDERED RESPONSE — TAKE ACTION

A client receiving oxytocin develops a prolonged deceleration to 70 bpm lasting more than 3 minutes. Place the nursing actions in the correct order.

- 1 **Step 1** → Stop the oxytocin infusion
- 2 **Step 2** → Perform a vaginal exam to rule out cord prolapse
- 3 **Step 3** → Reposition the client to the left lateral side
- 4 **Step 4** → Administer a 500-mL lactated Ringer's IV bolus
- 5 **Step 5** → Apply oxygen 10 L/min via non-rebreather per policy
- 6 **Step 6** → Notify the obstetric provider

QUESTION 06

DROP-DOWN / CLOZE — ANALYZE CUES

Complete the sentence using the most appropriate option for each blank.

The nurse recognizes uterine tachysystole as **[more than 5]** contractions in **[10]** minutes averaged over a **[30-minute]** window. The **first** nursing action is to **[stop the oxytocin infusion]**. If the tachysystole does not resolve with intrauterine resuscitation, the medication most likely to be administered next is **[terbutaline 0.25 mg subcutaneously]**.

QUESTION 07

PRIORITIZATION — MULTIPLE CHOICE

A labor and delivery nurse has four clients. Which client should the nurse assess **first**?

- A A multipara at 4 cm receiving an oxytocin infusion at 8 mU/min with contractions every 3 minutes and a Category I tracing
- B A nullipara who had a misoprostol dose 2 hours ago and is now reporting "constant pain" with a FHR baseline that has dropped from 140 to 105 bpm
- C A multipara who received an epidural 30 minutes ago with a BP of 102/64 and a reassuring tracing
- D A nullipara with a Cervidil insert in place for 4 hours, contracting every 6 minutes, Category I tracing

QUESTION 08

MEDICATION SAFETY — MULTIPLE CHOICE

A client received the last dose of misoprostol 2 hours ago. The provider writes an order to start oxytocin now. Which is the nurse's **best** action?

- A Begin the oxytocin infusion as ordered at 2 mU/min
- B Begin the oxytocin but at half the ordered rate
- C Contact the provider to clarify timing; oxytocin should not start until at least 4 hours after the last misoprostol dose ✓
- D Wait 30 minutes and then begin the infusion

QUESTION 09

FETAL MONITORING STRIP INTERPRETATION

The nurse is reviewing a 20-minute strip on a client receiving oxytocin at 12 mU/min. Findings: Baseline 165 bpm, minimal variability (3–5 bpm), recurrent late decelerations after 4 of the last 5 contractions, contractions every 1.5 minutes.

This tracing is best categorized as:

- A Category I — normal
- B Category II — indeterminate, intrauterine resuscitation indicated ✓
- C Category III — abnormal, prepare for emergency birth
- D Reactive nonstress test

QUESTION 10

EMERGENCY ACTION — MULTIPLE CHOICE

A multipara with a history of one prior cesarean is being induced with oxytocin (TOLAC). She suddenly reports a "tearing" abdominal pain, the FHR drops to 80 bpm, and the previously palpable fetal head feels higher in the pelvis. The nurse should **first**:

- A Administer terbutaline 0.25 mg SubQ
- B Stop the oxytocin and call the obstetric/surgical team for emergency delivery ✓
- C Increase the IV fluids and reposition to the right lateral side
- D Document the findings and continue to monitor

QUESTION 11

CASE-STUDY STYLE — EVALUATE OUTCOMES

After tachysystole was recognized, the nurse stopped the oxytocin, repositioned the client, gave a 500-mL LR bolus, and applied oxygen. Fifteen minutes later, contraction frequency is now every 3 minutes, resting tone is soft, FHR baseline is 138 with moderate variability, and no decelerations are noted.

Which finding indicates that the interventions were **effective**?

- A Maternal HR rose from 78 to 96
- B Return of moderate variability with normal baseline and resolution of tachysystole ✓
- C Contractions remain frequent but FHR variability is now absent
- D FHR baseline rose from 138 to 170

Detailed Rationales

Q1 · RECOGNIZE CUES + TAKE ACTION

Correct: B — Stop the oxytocin infusion. The contraction count (7 in 10 min) and the elevated resting tone meet the definition of tachysystole. Tachysystole compresses placental vessels and risks fetal hypoxia even with a currently reassuring tracing — and the cause is the oxytocin. Stopping the infusion is a *standing nursing intervention* that does not require a new order.

A (notify provider) — Wrong order. The nurse *acts first* to remove the cause (stop the drug), then notifies. NCLEX often baits you into "notify the provider" when there is a direct nursing action the nurse owns.

C (terbutaline) — Premature. Terbutaline is rescue therapy *after* stopping the oxytocin and after intrauterine resuscitation has failed to resolve the tachysystole.

D (oxygen) — Not first. Oxygen is part of intrauterine resuscitation but it is applied *after* removing the cause (stopping oxytocin) and only when the tracing is non-reassuring per current policy. *Trap tested:* applying O₂ routinely instead of stopping the offending drug.

Q2 · TAKE ACTION (SATA)

Correct: A, B, C, D, F. This is the classic intrauterine resuscitation bundle for a Category II tracing with late decelerations: *discontinue oxytocin, left lateral, IV bolus, oxygen per policy, and notify provider.*

E (increase oxytocin) — Dangerous. More contractions = less placental perfusion. This is the most-tested NCLEX trap.

G (document as Category I) — Wrong. Recurrent late decels with minimal variability is Category II at minimum.

Q3 · ANALYZE CUES (MATRIX)

Bishop scoring (each component scored 0–3): higher numbers = more favorable.

Favorable: dilation 3–4 cm (2 pts), effacement 60–70% or higher, station 0/+1/+2, soft consistency, anterior position.

Unfavorable: closed/1 cm, 0–30% effaced, station –3, firm consistency, posterior position.

Trap tested: students often forget that posterior cervical position and high station (–3) are **unfavorable**. A Bishop ≤ 6 means ripen before oxytocin.

Q4 · GENERATE SOLUTIONS (BOW-TIE)

Concern: uterine rupture. Misoprostol (PGE₁) and dinoprostone (PGE₂) are **contraindicated** in clients with a prior cesarean or any uterine scar because they cause stronger, sustained contractions that risk catastrophic rupture along the scar line.

Best actions: hold the medication, clarify the order, and discuss safer mechanical ripening (Foley balloon) which produces less aggressive contractions and is acceptable for TOLAC clients.

Monitor: continuous fetal heart rate and contraction pattern. Glucose and fundal height are unrelated.

Trap tested: following the order without recognizing the contraindication. The nurse is the last safety check.

Q5 · TAKE ACTION (ORDER)

For any prolonged deceleration, the order is: **stop oxytocin → rule out cord prolapse with a vaginal exam → reposition → IV bolus → oxygen → notify**. The vaginal exam fits early because a prolapsed cord requires immediate elevation of the presenting part. The remaining bundle restores uteroplacental perfusion.

Trap tested: putting "notify provider" first. Always act first when the nurse has a standing intervention available.

Q6 · ANALYZE CUES (CLOZE)

The current ACOG/NICHD definition: **more than 5 contractions in 10 minutes averaged over 30 minutes**. The first nursing action when tachysystole is caused by oxytocin is always **to discontinue the infusion**. Persistent tachysystole after the IUR bundle is

treated with **terbutaline 0.25 mg SubQ**.

Q7 · PRIORITIZE HYPOTHESES

Correct: B. "Constant pain" + dropping baseline + recent misoprostol = highest suspicion for uterine rupture/abruption + fetal compromise. Bradycardia in this context is ominous.

A: Stable Cat I — routine. **C:** Post-epidural BP is borderline but reassuring tracing — monitor. **D:** Contracting q6 min and Cat I — Cervidil is doing its job and is still under safe parameters.

Trap tested: picking the freshly admitted client by default. The sickest client is the one with the bradycardia.

Q8 · GENERATE SOLUTIONS

Correct: C. Oxytocin should not be started until at least **4 hours** after the last dose of misoprostol because of the high risk of tachysystole and uterine rupture when prostaglandins and oxytocin overlap.

A & B: Both expose the client to overlapping uterotonics. **D:** 30 minutes is the wait for dinoprostone insert removal — not misoprostol.

Trap tested: assuming all cervical ripening agents have the same waiting period. They do not.

Q9 · RECOGNIZE + ANALYZE CUES

Correct: B — Category II. The strip has tachycardia (165), minimal variability, recurrent lates, and tachysystole — but variability is not absent and the strip does not meet Category III criteria yet. Treat aggressively now to prevent progression.

C (Category III): Requires *absent* variability with recurrent lates, recurrent variables, or bradycardia — OR sinusoidal. Not yet, but headed there.

Trap tested: over-calling Category III without absent variability — or under-calling Category I when the strip is clearly indeterminate.

Q10 · TAKE ACTION (EMERGENCY)

Correct: B. The triad of sudden tearing pain + fetal bradycardia + loss of station (fetus retreats into abdomen) is the textbook presentation of **uterine rupture**. Stop the oxytocin and mobilize the surgical team — minutes matter.

A (terbutaline): Will not save a ruptured uterus; surgery does. **C:** Right lateral does not address rupture. **D (document):** Catastrophic delay.

Trap tested: not recognizing the prior-cesarean + induction + sudden pain triad.

Q11 · EVALUATE OUTCOMES

Correct: B. The goal of intrauterine resuscitation is: contractions return to a normal pattern, resting tone is restored, baseline normalizes, and variability returns. All four are present.

A: Maternal tachycardia by itself doesn't measure fetal recovery. **C:** Absent variability = worsening. **D:** Rising FHR baseline above 160 = fetal tachycardia, often a sign of ongoing stress/infection — not improvement.

Trap tested: mistaking maternal vitals for fetal recovery. The fetal tracing tells the story.

§ 09 **Unfolding NGN Case Study**

CLIENT: J. MORALES • G2P1 • 39 4/7 WKS

L&D BED 4

NURSE'S NOTES

VITALS

FHR TRACING

ORDERS

MAR

LABS

NURSE'S NOTES - 1400

34 y/o G2P1 at 39 4/7 weeks admitted for induction of labor (post-dates pending). PMH significant for gestational diabetes (diet controlled). No prior cesarean. GBS positive – penicillin started on admission. Bishop score on admission 5 (dilation 1 cm, 30% effaced, station -2, soft, anterior). Cervidil insert placed at 0800 today; removed at 1000 due to onset of regular contractions. Oxytocin started at 1200 at 2 mU/min, currently titrated to 8 mU/min. Membranes ruptured spontaneously at 1330 – clear fluid noted. Client reports pain 6/10 and asks about an epidural.

VITALS - 1400

BP 118/74 HR 88 RR 18 Temp 37.0°C (98.6°F) SpO2 98% RA
Pain 6/10 Glucose 102 mg/dL

FHR TRACING DESCRIPTION - 1400

Baseline: 145 bpm
Variability: Moderate (10-15 bpm)
Accelerations: 2 in last 20 min, ≥15 bpm × ≥15 sec
Decelerations: None
Contractions: Every 3 min, 60-70 sec, moderate, soft resting tone
Category: I

PROVIDER ORDERS

- Continuous EFM
- Oxytocin per facility induction protocol; titrate by 2 mU/min q30 min to active labor pattern; max 30 mU/min
- Epidural anesthesia per anesthesia evaluation when patient ready
- LR @ 125 mL/hr; 500-mL bolus before epidural
- NPO except ice chips
- Penicillin G 5 million units IV load, then 2.5 million units IV q4h until delivery
- Notify provider for: tachysystole, Category II/III tracing, T ≥ 38°C, BP ≥ 140/90, abnormal bleeding

MAR - ACTIVE MEDICATIONS (1400)

Oxytocin IV 8 mU/min continuous
Penicillin G IV 2.5 million units q4h (last dose 1200, next 1600)
LR IV 125 mL/hr continuous

LABS

Hgb 11.6	Hct 34.2	Plt 218K	WBC 11.2
Na 138	K 4.0	Glucose 102	GBS POSITIVE

CASE Q1 • 1430

RECOGNIZE CUES

At 1430, the nurse reassesses. The contraction monitor now shows 7 contractions in the last 10 minutes, each lasting 80–90 seconds, with a uterine resting tone that does not return to soft between contractions. The FHR baseline is 150 with moderate variability, and one isolated late deceleration is noted after the most recent contraction. Maternal BP 122/78, HR 92.

Which findings require immediate follow-up? Select all that apply.

- A 7 contractions in 10 minutes ✓
- B Elevated/sustained resting tone ✓
- C Late deceleration after a contraction ✓
- D Maternal BP 122/78
- E Contraction duration of 80–90 seconds ✓
- F FHR baseline of 150 with moderate variability

CASE Q2 • 1430

ANALYZE CUES

What is the nurse's most likely hypothesis for these findings?

- A Maternal infection (chorioamnionitis)
- B Oxytocin-induced uterine tachysystole with early uteroplacental insufficiency ✓
- C Normal active labor progression
- D Cord prolapse

CASE Q3 • 1431

PRIORITIZE HYPOTHESES + GENERATE SOLUTIONS

Drag the priority interventions into the correct order.

- 1 1. Discontinue the oxytocin infusion
- 2 2. Reposition the client to the left lateral side
- 3 3. Administer a 500-mL lactated Ringer's IV bolus
- 4 4. Apply oxygen 10 L/min via non-rebreather per policy
- 5 5. Notify the obstetric provider
- 6 6. Reassess the FHR tracing and contraction pattern

CASE Q4 • 1445

TAKE ACTION — MEDICATION

Fifteen minutes after stopping the oxytocin, repositioning, bolusing, and applying oxygen, the contraction pattern is still 6 per 10 minutes with elevated resting tone. The provider is en route. Anticipating an order, the nurse prepares which medication?

- A Methylergonovine 0.2 mg IM
- B Magnesium sulfate 4-g IV bolus
- C Terbutaline 0.25 mg SubQ ✓
- D Hydralazine 5 mg IV push

CASE Q5 • 1500

EVALUATE OUTCOMES

At 1500, after terbutaline administration and continued IUR measures, the contraction pattern is every 3 minutes lasting 60 seconds with soft resting tone. FHR baseline is 142, moderate variability, no decelerations. Maternal HR is now 108, BP 116/72, glucose 138 (post-terbutaline).

Which findings indicate the interventions were effective? Select all that apply.

- A Resolution of tachysystole ✓
- B Return to soft resting tone between contractions ✓
- C Reassuring FHR tracing ✓
- D Maternal HR 108 (expected side effect of terbutaline)
- E Glucose 138 (expected side effect of terbutaline)

Note: D and E are anticipated side effects and therefore not "improvements" — they document that terbutaline was given and tolerated.

CASE Q6 • 1530

GENERATE SOLUTIONS — RESTART OXYTOCIN?

The provider orders the nurse to resume oxytocin. Which is the nurse's **best** action?

- A Resume oxytocin at the previous rate of 8 mU/min
- B Resume oxytocin at half the previous rate (or per protocol) once the tracing has been reassuring for at least 30 minutes and tachysystole has resolved ✓
- C Refuse the order; oxytocin cannot be restarted after tachysystole
- D Resume oxytocin at a higher rate to make up for lost time

What Should the Nurse Do First?

SCENARIO 1

A client receiving oxytocin develops contractions every 90 seconds lasting 70 seconds, with a Category I FHR tracing.

First action → Decrease or stop the oxytocin infusion. Tachysystole is defined by frequency alone; a currently reassuring FHR does not justify continuing to overstimulate the uterus. Then reposition, bolus, reassess.

SCENARIO 2

A client with a Cervidil insert in place for 6 hours develops a Category II tracing with recurrent variable decelerations.

First action → Remove the Cervidil insert by pulling the string. The insert is the source of the prostaglandin; removal is the equivalent of "stopping the oxytocin." Then continue intrauterine resuscitation.

SCENARIO 3

A TOLAC client receiving oxytocin reports sudden severe abdominal pain, the FHR drops to 70 bpm, and the previously engaged head is no longer palpable in the pelvis.

First action → Stop the oxytocin and call the OB/surgical team for emergency cesarean. This is the textbook presentation of uterine rupture; minutes matter.

SCENARIO 4

A client received misoprostol 3 hours ago. The provider writes an order to start oxytocin now.

First action → Hold the oxytocin and clarify with the provider — wait at least **4 hours** after the last misoprostol dose before initiating oxytocin.

SCENARIO 5

A client receiving oxytocin develops persistent tachysystole that does *not* resolve after stopping the infusion, repositioning, fluid bolus, and oxygen.

First action → Notify the provider and prepare to administer **terbutaline 0.25 mg SubQ**. Check maternal HR (hold if ≥ 120) and prepare for possible operative birth if tracing worsens.

§ 11 Stop, Hold, or Escalate

STOP OXYTOCIN — SCENARIO A

Contraction frequency >5 per 10 minutes averaged over 30 min, with or without fetal distress.

Action → Discontinue immediately. Tachysystole alone — even with a normal FHR — is reason to stop the infusion before fetal compromise develops.

STOP OXYTOCIN — SCENARIO B

Category II tracing with recurrent late or prolonged variable decelerations and minimal variability.

Action → Stop the oxytocin, begin intrauterine resuscitation, notify the provider. Do not titrate up to "push through" non-reassuring findings.

HOLD MEDICATION — SCENARIO C

Order to give misoprostol to a client with one prior low-transverse cesarean for cervical ripening.

Action → Hold the medication, contact the provider — prostaglandins are contraindicated in TOLAC due to risk of uterine rupture. Suggest mechanical ripening (Foley) as an alternative.

ESCALATE — SCENARIO D

Cervidil insert in place; client develops Category II tracing that does not resolve with insert removal and IUR.

Action → Notify provider immediately; prepare for possible operative birth. Document removal time, tracing trends, and interventions performed.

EMERGENCY BIRTH PREP — SCENARIO E

Sudden severe abdominal pain, fetal bradycardia < 80 bpm, vaginal bleeding, and elevated maternal HR in a TOLAC client.

Action → Stop the oxytocin, activate the obstetric/surgical emergency team, call rapid response, large-bore IVs, type & cross, NPO, OR ready. Anticipate stat cesarean for suspected uterine rupture.

§ 12 Common NCLEX Traps

— TRAP 1 — "NOTIFY THE PROVIDER" AS THE FIRST ACTION

NCLEX loves to bait you into picking "notify the provider" when the nurse has a direct, standing intervention. For oxytocin tachysystole, **stop the infusion first**, then notify. Notification follows action.

— TRAP 2 — CONFUSING LATE AND VARIABLE DECELERATIONS

Late = uteroplacental insufficiency (decel begins at the peak or after — uniform shape). Treatment: stop oxytocin, IUR. **Variable = cord compression** (abrupt V-shape, varies in timing). First action: reposition. Both can be Category II/III if recurrent + minimal variability.

— TRAP 3 — GIVING PROSTAGLANDINS TO A TOLAC CLIENT

Misoprostol and dinoprostone are **contraindicated** in clients with prior cesarean. Foley balloon is the safer mechanical option. The order being written does not make it safe — the nurse is the last safety check.

— TRAP 4 — INCREASING OXYTOCIN TO "PUSH THROUGH" A STALLED LABOR

If the tracing is not reassuring or contractions are already at tachysystolic frequency, *do not increase the rate*. Reassess the cause (poor positioning, dehydration, malposition, inadequate analgesia, true cephalopelvic disproportion). Increasing the rate accelerates fetal harm.

— TRAP 5 — APPLYING OXYGEN AS THE FIRST ACTION

Oxygen is part of intrauterine resuscitation but it is not the first step. **Stop the offending cause first** (oxytocin, Cervidil), then reposition, fluid, and oxygen *per facility policy and when fetal status indicates*. Routine O₂ for all labor clients is no longer standard.

— TRAP 6 — BONUS: STARTING OXYTOCIN TOO SOON AFTER CERVICAL RIPENING

Different agents have different wait times: **misoprostol → wait 4 hours; dinoprostone insert (Cervidil) → wait 30 minutes** after removal; **dinoprostone gel (Prepidil) → wait 6 hours**. NCLEX uses this to test medication-specific safety knowledge.

End-of-Day Quick Review

10 One-Line Must-Remembers

- Tachysystole = >5 ctx/10 min $\times$ 30 min
- Stop oxytocin FIRST — it's a standing nursing intervention
- Bishop ≤ 6 = ripen before oxytocin
- Misoprostol & dinoprostone are contraindicated with prior C-section
- Wait ≥ 4 hrs after misoprostol to start oxytocin
- Wait ≥ 30 min after Cervidil removal to start oxytocin
- Oxytocin = high-alert; always on a pump; piggybacked at the closest port
- Terbutaline 0.25 mg SubQ rescues persistent tachysystole; hold for HR ≥ 120
- Loss of resting tone = emergency; uterine rupture possible
- Category III = absent variability + lates/variables/bradycardia $\rightarrow$ prepare to deliver

5 Red-Flag Findings

- Sudden tearing pain in a TOLAC client (rupture)
- Prolonged deceleration >3 min
- Loss of resting tone / tetanic contraction
- Maternal seizure during induction (eclampsia / hyponatremia)
- Frank vaginal bleeding during induction (abruption)

5 "Never Do This" Rules

- Never increase oxytocin during a Category II/III tracing
- Never give misoprostol/dinoprostone to TOLAC
- Never start oxytocin within 4 hrs of misoprostol
- Never apply routine O₂ for all labor — only when indicated by tracing
- Never give terbutaline if maternal HR ≥ 120 without contacting provider

5 Fetal Monitoring Clues

- Late decels + min variability = Cat II $\rightarrow$ IUR & escalate
- Variable decels first response = reposition
- Tachycardia (≥ 160) — think infection, oxytocin, terbutaline
- Bradycardia <110 >10 min = baseline change $\rightarrow$ escalate
- Sinusoidal pattern = severe fetal anemia $\rightarrow$ emergency

5 Medication Safety Clues

- Oxytocin half-life is short — stopping IS the reversal
- Terbutaline = rescue tocolytic, not first-line
- Cervidil insert has a string — pull to remove
- Foley balloon is the TOLAC-safe ripening choice
- Penicillin for GBS continues throughout labor q4h

§ 14 **Infographic Summary • Day 7**

DAY 07 / 16 • SAVE THIS. SCREENSHOT THIS. SLEEP ON THIS.

Induction, Oxytocin & Tachysystole

If contractions hurt the fetus, the drug stops. Then reposition, bolus, oxygen, notify — in that order.



BISHOP SCORE (CERVICAL READINESS)

- **≥ 8** = favorable → go to oxytocin/AROM
- **≤ 6** = unfavorable → ripen first
- Components: dilation, effacement, station, consistency, position

TACHYSYSTOLE DEFINITION

- **> 5** contractions in 10 min × 30 min
- Can occur with or without FHR changes
- Add Category II/III tracing = emergency

INTRAUTERINE RESUSCITATION BUNDLE

1. Stop oxytocin
2. Reposition (L-side first)
3. IV bolus LR 500–1000 mL
4. O₂ 10 L NRB per policy
5. Notify provider; reassess

CERVICAL RIPENING WAIT TIMES

- Misoprostol → wait **4 hrs** before oxytocin
- Cervidil (insert) → remove, then **30 min**
- Prepidil (gel) → wait **6 hrs**
- Foley balloon → safe for TOLAC

CONTRAINDICATIONS TO PROSTAGLANDINS

- Prior cesarean / uterine surgery
- Active maternal bleeding
- Non-reassuring baseline FHR
- Already in active labor

TERBUTALINE RESCUE

- 0.25 mg SubQ for persistent tachysystole
- Given AFTER stopping oxytocin, not before
- Hold for maternal HR ≥ 120
- Watch glucose & pulmonary edema

CATEGORY CHEAT SHEET

- **Cat I** — Baseline 110–160 · moderate variability · no late/variable decels · accelerations ± · *continue routine monitoring*
- **Cat II** — Indeterminate (everything that's not I or III) — minimal variability, tachycardia, recurrent variables, prolonged decels · *IUR + notify*
- **Cat III** — Absent variability + recurrent lates/variables/bradycardia, OR sinusoidal · *Emergency birth prep*

THE "STOP OXYTOCIN" TRIGGERS — MEMORIZE

- Tachysystole (>5 ctx/10 min) · Recurrent lates · Recurrent variables · Prolonged decel · Loss of variability · Sudden severe pain · Vaginal bleeding · Loss of resting tone · Maternal seizure · Cord prolapse · Suspected rupture

Screenshot the poster above for quick review. Tomorrow: **Day 8 — Hypertensive Disorders in Labor: Preeclampsia, Eclampsia, HELLP, Magnesium Sulfate.**