

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

Hypothermia Initiation Phase Two - Admission	
Diagnosis	
Allergies	
Admission/ Transfer – if Applicable	
<input type="checkbox"/> Admit to Inpatient Intensive Care Unit	
<input type="checkbox"/> Transfer to	ICU.
For hypothermia tracking purposes only. Please do not uncheck.- Required	
<input type="checkbox"/> Cardiac tracking consult	For hypothermia tracking purposes only.
Consults	
<input type="checkbox"/> Consult to Intensivist – If Not Already Completed	Indicate the physician group: [_____]. Staff to call consultant(s), add to the treatment team, and update the order with date and time of the call placed.
<input type="checkbox"/> Consult to Cardiology – If Not Already Completed	Indicate the physician group: [_____]. Staff to call consultant(s), add to the treatment team, and update the order with date and time of the call placed.
<input type="checkbox"/> Consult to Neurology – Day 2 of Admission	Indicate the physician group: [_____]. Staff to call consultant(s), add to the treatment team, and update the order with date and time of the call placed.
<input type="checkbox"/> Consult to Electrophysiology – Day 2 of Admission	Indicate the physician group: [_____]. Staff to call consultant(s), add to the treatment team, and update the order with date and time of the call placed.
Code Status	
<input type="checkbox"/> Full Code	
Healthcare Directive - if New Admission	
<input type="checkbox"/> Healthcare Directive	Obtain and scan into medical record if available.
Vital Signs	
<input type="checkbox"/> Vital Signs Hypothermia Maintenance	CONTINUOUS. <ol style="list-style-type: none"> 1. Continuous vital sign monitoring during cooling/maintenance phase. 2. Continuous temperature monitoring. 3. Document temperature every hour. 4. More frequent vital signs as needed per patient condition or per unit routine.



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

<input type="checkbox"/> Vital Signs Hypothermia Rewarming	<ol style="list-style-type: none"> 1. Document vital signs every 30 minutes during rewarming phase until 37 degrees Celsius is reached. 2. More frequent vital signs as needed per patient condition or per unit routine. 3. May leave cooling device on to maintain temperature 37 degrees Celsius / 98.6 degrees Fahrenheit for up to 8 hours.
<input type="checkbox"/> Continuous Temperature Monitoring	Continuous.
<input type="checkbox"/> Call Physician	<ol style="list-style-type: none"> 1. Systolic Blood Pressure less than 90 mmHg. 2. Mean Arterial Pressure less than 60 mmHg. 3. Core temperature less than 32 degrees Celsius / 89 degrees Fahrenheit during cooling and maintenance phase and if greater than 38.5 degrees Celsius during rewarming phase. 4. Inability to reach target temperature within 4 hours. 5. If urine output is less than 0.5 mL/kg/hour. 6. If ST elevation or depression noted. 7. If shivering present.
Activity	
<input type="checkbox"/> Bedrest	Head of bed elevated 30 degrees as tolerated.
Nursing	
<input type="checkbox"/> Cardiac Monitor	Continuous. Per unit policy. Notify physician of rhythm changes and EKG changes including lengthening of the QT interval, and ST elevation or depression. Document QTc interval every 8 hours.
<input type="checkbox"/> Intake & Output	Per unit policy.
<input type="checkbox"/> Cardiac Output	If Pulmonary Artery Catheter placed, check cardiac output every 4 hours using Thermodilution method. Increase to every 2 hours if patient unstable.
<input type="checkbox"/> Cardiac Output Continuous – Station 20 only	Continuous.
<input type="checkbox"/> Skin assessment at sites covered by gel pads	Every 2 hours to avoid cold related injuries. Notify physician if extremities are mottled or do not blanch.
<input type="checkbox"/> No Intramuscular or Subcutaneous injections or finger stick glucoses until rewarming completed and temperature stable.	
<input type="checkbox"/> Pneumatic Compression Circulation	Remove 20 minutes every 24 hours for hygiene. Sleeve, Knee high.
<input type="checkbox"/> Pneumatic Compression Unit / Equipment	

Page 2 of 8



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

PHYSICIAN'S ORDERS

06/02/2009

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

Procedures	
<input type="checkbox"/> Central Venous Catheter	Care and maintenance per site specific policy.
<input type="checkbox"/> CVP Monitoring	Transduce central venous catheter per site specific policy.
<input type="checkbox"/> Pulmonary Artery Catheter	Care and maintenance per site specific policy.
<input type="checkbox"/> Arterial Line	Care and maintenance per site specific policy.
<input type="checkbox"/> Oral gastric tube	To low intermittent suction. Care and maintenance per site specific policy.
<input type="checkbox"/> Indwelling Urinary Catheter with Bladder Temp Probe	Continuous temperature monitoring with catheter to drainage bag. If patient arrives with an Indwelling Urinary Catheter without a temperature probe, do not remove catheter. Instead, place esophageal temperature probe for continuous temperature monitoring.
<input type="checkbox"/> Esophageal Temperature Probe	Insert if patient has Indwelling Urinary catheter without temperature probe and confirm placement with CXR.
Respiratory – Mechanical Ventilator Settings – A Separate Order Set is Optional	
<input type="checkbox"/> CMV / AC Mechanical Ventilator Settings - Invasive	CMV/AC (Controlled Mandatory Ventilation) Rate: [_____] , Vt: [_____] mL, FIO2: <input type="checkbox"/> [_____] %. <input type="checkbox"/> Titrate O2 sats to > [_____] %. <input type="checkbox"/> Other [_____] . PEEP +: [_____] cmH2O, Flow: <input type="checkbox"/> Auto Flow <input type="checkbox"/> Rate [_____] Lpm.
<input type="checkbox"/> PCV Mechanical Ventilator Settings - Invasive	PCV (Pressure Control Ventilation) Rate: [_____] , FIO2: <input type="checkbox"/> [_____] %. <input type="checkbox"/> Titrate O2 sats to > [_____] %. <input type="checkbox"/> Other [_____] . Inspiratory Pressure [_____] cmH2O, PEEP +: [_____] cmH2O, I:E ratio: [_____] : [_____] .
Diet	
<input type="checkbox"/> NPO	Strict.



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

Cooling Process	
<input type="checkbox"/> Hypothermia Maintenance Phase	Goal is target temperature of 33 degrees Celsius. Maintain target temperature for 24 hours. Cooling device will maintain a given temperature based on patient temperature feedback. Monitor the water temperature of the cooling device and document every hour.
Rewarming process	
<input type="checkbox"/> Hypothermia Rewarming Phase	<ol style="list-style-type: none"> 1. Initiate re-warming 24 hours after reaching desired temperature of 32 – 33 degrees Celsius. 2. If desired temperature is not reached, initiate rewarming 24 hours after initiation of cooling. 3. Start IV fluids for rewarming phase per protocol. 4. Ensure potassium protocol has been discontinued 8 hours prior to re-warming. 5. If using Cooling device, set warming rate to 0.5 degrees Celsius per hour. Warm to core body temperature of 37 degrees Celsius. 6. If using cooling blankets/ice packs, remove them. Remove/adjust cooling blankets to allow for warming no faster than 1° C/hour. Closely monitor core temperature. Use cooling blankets and ice packs to slow the re-warming if necessary. 7. Continue sedation and analgesic, until discontinued by physician.
Medications – IV Fluids	
<input type="checkbox"/> select an IV fluid	CONTINUOUS, Intravenous, IV Fluid: [_____]. With added potassium chloride [_____] mEq per liter, With added [_____][_____] mEq per liter, Rate: [_____] mL/hr.
<input type="checkbox"/> NaCl 0.9% IV infusion 1000 mL – for use prior to rewarming	CONTINUOUS, Intravenous, Rate: 100 mL/hr. <ol style="list-style-type: none"> 1. To begin 6-8 hours prior to rewarming. Infuse fluid to target CVP 8-12 or PCWP 16-18. 2. If CVP or PCWP are not in range at onset of re-warming, call MD. 3. When goal CVP or PCWP obtained decrease rate to 25ml/hr.



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

If patient was on propofol in the ED, change to LORazepam (ATIVAN) upon admission to ICU	
Medications – Sedation (Select ALL)	
<input type="checkbox"/> LORazepam (ATIVAN) IV – bolus	ONE TIME, Intravenous, Dose: 2 mg. Give prior to starting sedation infusion therapy.
<input type="checkbox"/> LORazepam (ATIVAN) IV – PRN	Q30MIN PRN, Intravenous, Dose: 1 - 2 mg. PRN for sedation AND *Give LORazepam (ATIVAN) IV bolus dose PRIOR TO EACH LORazepam infusion rate increase.*
<input type="checkbox"/> LORazepam (ATIVAN) IV - infusion	CONTINUOUS, Intravenous, Dose: 1 -5 mg/hr. Begin infusion at 1 mg/hr (usual infusion range: 0.5-7 mg/hr). Titrate by 1 mg every 30 minutes as needed for sedation. Notify physician if dose exceeds 5 mg/hr. **Give LORazepam IV bolus dose PRIOR TO EACH infusion rate increase**. <i>Comment: Usual infusion range: 0.5-7 mg/hr.</i>
Medications – Analgesia (Select ALL, if not already ordered)	
<input type="checkbox"/> fentanyl (SUBLIMAZE) IV - bolus	ONE TIME, Intravenous, Dose: 50 mcg. Give prior to starting fentanyl infusion.
<input type="checkbox"/> fentanyl (SUBLIMAZE) IV – PRN	Q30MIN PRN, Intravenous, Dose: 50 mcg. Give for pain or shivering.
<input type="checkbox"/> fentanyl (SUBLIMAZE) IV - Infusion	CONTINUOUS, Intravenous, Dose: 50 mcg/hr. Begin infusion at 50 mcg/hr (usual dose range: 50-200 mcg/hr). Titrate by 25 mcg every 30 minutes as needed for pain or shivering. Notify physician if rate exceeds 300 mcg/hr. <i>Comment: usual dose range: 50-200 mcg/hr</i>
Medications – Paralytic Bolus	
<input type="checkbox"/> atracurium (TRACRIUM) IV – bolus	EACH TIME PRN, Intravenous, Dose: 0.4 mg/kg bolus. *GIVE A BOLUS DOSE prior to starting paralytic infusion.* May repeat bolus dose once, 30 minutes after initial bolus to abolish shivering. Patient MUST be intubated, sedated and mechanically ventilated prior to AND during paralytic treatment. **NEUROMUSCULAR BLOCKER



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

PHYSICIAN'S ORDERS

06/02/2009

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

Medications – Paralytic Infusion	
<input type="checkbox"/> atracurium (TRACRIUM) IV – infusion	CONTINUOUS, Intravenous, Dose: 4 mcg/kg/min. (usual dosage is 4-12 mcg/kg/min) Begin after paralytic bolus dose. Patient MUST be intubated, sedated and mechanically ventilated prior to AND during paralytic treatment. Train of Four Monitoring (TOF) Via Peripheral Nerve Stimulation: 1. Obtain TOF baseline prior to bolus and start of paralytic infusion. Document level of current and response. 2. Titrate infusion by 1mcg/kg/min to obtain 2 out of 4 TOF. 3. Measure TOF every 2 hours. Notify physician if no response. 4. Call physician if shivering is observed and MD to consider a re-bolus of paralytic agent. 5. Discontinue infusion when core temperature of 37 degrees Celsius is achieved. <i>Comment: usual dosage is 4-12 mcg/kg/min</i>
Medications – Electrolyte Replacement	
<input type="checkbox"/> Potassium replacement protocol	Discontinue potassium replacement 8 hours prior to rewarming. Call physician if potassium level is less than 3. Refer to facility specific protocol for dosing and may return to protocol when the re-warmed goal temp of 37 degrees Celsius is achieved.
<input type="checkbox"/> Magnesium replacement protocol	Refer to facility specific protocol for dosing.
Medications – Heparin – Pharmacy Managed Protocol (Select only ONE protocol)	
<input type="checkbox"/> heparin *PHARMACY MANAGED IV PROPHYLACTIC PROTOCOL*	Pharmacy to dose per *HYPOTHERMIA* IV prophylactic heparin protocol.
<input type="checkbox"/> heparin *PHARMACY MANAGED IV THERAPEUTIC PROTOCOL* - Use with caution in patients that received thrombolytics or antiplatelet therapy.	Pharmacy to dose per *HYPOTHERMIA* IV therapeutic heparin protocol. Use with caution in patients that received thrombolytics or antiplatelet therapy.
<input type="checkbox"/> NOTE TO NURSING – Pharmacy to Manage IV Heparin Protocol.	See MAR for order details.
Medications - Insulin	
<input type="checkbox"/> insulin intensive continuous infusion protocol- for ICU use only	See facility specific protocol for dosing. For ICU use only.



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

Medications - GI	
<input type="checkbox"/> famotidine (PEPCID) IV	Q12H, Intravenous, Dose: 20 mg.
Medications - Other	
<input type="checkbox"/> artificial tear ointment (REFRESH, LACRILUBE), ophthalmic	Q6H, Ophthalmic, both eyes. Dose: Apply thin strip to both eyes while on paralytic agent.
Laboratory - Now	
<input type="checkbox"/> Urinalysis With Reflex Microscopic if Positive	PRN, STAT. If not already completed. Nurse to release order.
Laboratory - Timed or PRN	
<input type="checkbox"/> Protime, INR	Q6H, ASAP, during cooling and re-warming process. 8 Occurrences.
<input type="checkbox"/> Basic Metabolic Panel	Q6H, ASAP, during cooling and re-warming process. 8 Occurrences.
<input type="checkbox"/> Calcium	Q6H, ASAP, during cooling and re-warming process. 8 Occurrences.
<input type="checkbox"/> Metered Glucose POC	Q6H, ASAP, if patient not on ICU insulin protocol.
<input type="checkbox"/> Arterial Blood Gas	Q6H, STAT, during cooling and re-warming process. 8 occurrences.
<input type="checkbox"/> Arterial Blood Gas	PRN STAT, for change in respiratory status. Nurse to release order at appropriate time.
<input type="checkbox"/> Lactate	PRN, STAT, 12 Hours after initiation of cooling. Nurse to release order at appropriate time.
<input type="checkbox"/> CBC with Platelets no Differential	PRN, STAT, 12 Hours after initiation of cooling. Nurse to release order at appropriate time.
<input type="checkbox"/> Magnesium	PRN, STAT, 12 Hours after initiation of cooling. Nurse to release order at appropriate time.
<input type="checkbox"/> Amylase	PRN, STAT, 12 Hours after initiation of cooling. Nurse to release order at appropriate time.
<input type="checkbox"/> Lipase	PRN, STAT, 12 Hours after initiation of cooling. Nurse to release order at appropriate time.
<input type="checkbox"/> Hepatic Function Panel	EARLY AM, TOMORROW AM. For 2 occurrences.
<input type="checkbox"/> Brain Natriuretic Peptide	EARLY AM, TOMORROW AM. For 2 occurrences.
<input type="checkbox"/> Phosphorus	EARLY AM, TOMORROW AM. For 2 occurrences.
<input type="checkbox"/> CK-MB Panel	EARLY AM, TOMORROW AM. For 2 occurrences.
<input type="checkbox"/> Troponin	EARLY AM, TOMORROW AM. For 2 occurrences.



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

PHYSICIAN'S ORDERS

06/02/2009

(31190) Hypothermia Initiation Phase Two - Admission

Please note bolded orders are pre-selected in EXCELLIAN.

<input type="checkbox"/> Blood Cultures	EVERY 30 MINUTES, STAT x 2.
<input type="checkbox"/> Serum HCG	For all females less than 50 years of age.
<i>EKG</i>	
<input type="checkbox"/> 12 Lead EKG – PRN	PRN, STAT, For ST elevation. Nurse to release order.
<i>Medical Imaging</i>	
<input type="checkbox"/> XR Chest Portable 1 View Daily	RAD DAILY, Routine
<input type="checkbox"/> XR Abdominal Portable 1 View	RAD ONE TIME, ASAP. Reason for Exam: Confirm OG tube placement.
<input type="checkbox"/> CT Head without Contrast	RAD ONE TIME, Routine. Reason for Exam: [_____].
<i>Echo – Single Select Section</i>	
<input type="checkbox"/> Echocardiogram Complete	RAD ONE TIME, Routine. Reason for Exam: [_____].
<i>Interdisciplinary Consults</i>	
<input type="checkbox"/> Consult to Social Work Services	Post therapeutic hypothermia/cardiac arrest.
<input type="checkbox"/> Physical Therapy Eval and Treat	Treat and eval post therapeutic hypothermia/cardiac arrest.
<input type="checkbox"/> Consult to Occupational Therapy Eval and Treat	Treat and eval post therapeutic hypothermia/cardiac arrest.
<input type="checkbox"/> Cardiac Rehab Eval and Treat	Teach family CPR prior to discharge.
Additional Orders	

Physician Signature

Date

Time

Page 8 of 8



Patient Name _____

Medical Record # _____ Date of Birth _____

Date of Surgery/Admission _____

PHYSICIAN'S ORDERS

06/02/2009