

Goldilocks and the 3 BeAwares Guideline 2024

(Craig Haverstock and Julie-Clare Becher)



Aim

There is evidence that both hypothermia and hyperthermia are associated with adverse outcome including death¹ in preterm infants.

The Goldilocks project aims to ensure all babies less than 34 weeks gestation have a temperature recorded in the first hour after birth of between 36.5-37.5 degrees.

The aim of the '3 Be Awares' is to ensure that normothermia is maintained in the hours and days after birth during procedures

Management at delivery

Preparation prior to delivery

- Allocate a Goldilocks champion, who will be responsible for observing temperature and making changes to the thermal environment as required.
- Set radiant heater to 80%.
- Have a temperature probe set up on resuscitaire.
- Consider need for plastic bag if not delivered into one (all babies <32w)

Immediately at delivery

- <32 weeks: use a plastic bag- put baby in feet first and draw it up over the body and tuck in around the neck. Do not dry baby first. Do not pull down the plastic bag unless absolutely necessary. Auscultation can take place through the bag.
- ≥ 32 weeks: dry baby with towels and apply a hat. Take away any wet towels.
- Place temperature probe under baby between scapulae.

Temperature management

- The temp probe will provide a reliable temperature after 3 minutes.

¹ Lyu Y, Shah PS, Ye XY, et al. JAMA Pediatr. 2015 Apr;169(4):e150277.

- Target a temperature of 37C
 - If less than 37 degrees then increase heater by 20% every 2 minutes (consider other reasons for low temperature for example shut any open windows, remove wet towels, put on a hat, move the baby further under the main focus of the radiant heat
 - If temperature is above 37 degrees, decrease the heater by 20% every 2 minutes.
- Record a temperature prior to transfer of baby.
- Plug in resuscitaire as soon as reaching the Neonatal unit and ensure baby is again exposed and radiant heat is again provided until transfer to the incubator

Documentation – Remember to document all action taken, include:

- Admission temperature (please ensure this is taken and recorded within the first hour of life)
- Action taken during delivery and stabilisation to achieve normothermia
- Radiant heater percentage and any changes
- Plastic bag use

Procedures

Any procedures on a baby less than <32 weeks can be a disruption to the thermal environment particularly on the first day of life.

Remember the 3 Be Averages!



1. Be Aware of the Procedural Hypothermia guideline on Badger Skin and Thermoregulation > Procedures
2. Be Aware of methods to reduce disruption to environment
 - Avoid starting procedure unless baby's temp is 36.7-37.5 degrees.
 - Apply hat and blanket or plastic bag (keep baby in delivery plastic bag until Golden Hour procedures are completed)
 - Increase incubator temperature and/or airboost. Airboost can be used repeatedly during the procedure.
 - Consider increasing incubator humidity for procedures taking place in the first day of life.
 - Minimise cot-door opening to a maximum of 2 cot-doors or 1 cot side.
 - Place screens around cot side and have nursery door closed.
3. Be Aware of changes in temperature and respond accordingly
 - Record temperature pre and post procedure.
 - Nominate a Goldilocks champion to monitor temperature during the procedure and respond if temperature falling or is low.