Q. Why can’t I eat or drink before my surgery/procedure?
Answer: The purpose of fasting guidelines is to minimize the volume of stomach contents. Depression of our protective reflexes occurs during anesthesia. One of the most basic protective reflexes is to keep stomach contents from entering the airway. When stomach contents enter the airway, aspiration occurs. Aspiration is less likely to happen when the stomach is empty.

Q. How much can I eat?
Answer: Both the amount and type of food ingested must be considered when determining an appropriate fasting period.

Q. Why is aspiration so bad?
Answer: Solid or semi-solid stomach contents may make exchange of gases in the lungs impossible. Liquid stomach contents that are acidic may burn the lungs and make gas exchange impossible. Both types of aspiration may cause brain damage or death. It is possible to treat aspiration once it occurs and most people survive aspiration, but treatment in an intensive care unit is often necessary. Aspiration may prolong your hospital stay by days to weeks.

Q. Who came up with these guidelines?
Answer: The durations for fasting are based on analysis of the current medical literature and expert opinion. The American Society of Anesthesiologists and the European Society of Anesthesiologists appointed separate task forces to develop guidelines. Faculty in the Department of Anesthesia at the University of Iowa adapted these guidelines for the University of Iowa Hospitals and Clinics.

Q. When the MRI for my 6 month old was scheduled I was told not to allow clear fluids for 3 hours instead of 2 hours prior to the scheduled procedure start time. Why is the timing different from the guidelines?
Answer: It may be possible to start your child’s MRI sooner than the scheduled time, so the fasting period is adjusted for both safety and efficiency.

Q. Should I wake my child up two hours before the scheduled time for the procedure or surgery to give him or her clear liquids?
Answer: Yes, avoiding dehydration is very important. For example, if your 5 year old child’s procedure or surgery is schedule to start at 10:00 o’clock in the morning, you could give up to 4 ounces of a clear fluid up to 6:00 o’clock in the morning. For any particular procedure calculated differences between the actual and scheduled start time may suggest that the start time may be earlier so you may have been told to wake your child and give the fluid at 5:00 am.
Q. I was in an automobile accident and need emergency surgery. I ate just before the accident and it has only been four hours. My doctor says I need the operation now. Why don’t I have to wait 8 hours before I can have my surgery?

Answer: Guidelines assist doctors and patients in making decisions about health care. Fasting guidelines are not intended as standards or absolute requirements. The risk of aspiration must be weighed against the risk of not having surgery in a timely manner. Your anesthesiologist may modify the type of anesthesia to mitigate your risk.

Q. Can I chew gum or suck on hard candy while waiting for my procedure or surgery?

Answer:

For Adults: Adults (18 years and older) can chew gum or suck hard candy until their procedure. Patients should not have their operations cancelled or delayed just because they are chewing gum or sucking hard candy. Swallowing gum or hard candy is considered a meal and will require an 8 hour fasting period for elective procedures.

For Children: Children (17 years or younger) cannot chew gum or suck on hard candy 8 hours before a procedure. Just a tiny speck of gum in a small child’s airway may obstruct the airway. Their operations may be cancelled or delayed.

Q. When should I stop chewing tobacco or putting snuff in my mouth before my procedure/surgery?

Answer: Oral use of chewing tobacco or snuff should be stopped a minimum duration of 6 hours before a procedure.

Q. If I take food in through a nasogastric tube (e.g., stomach tube) or a tube directly into my stomach-a “feeding tube” or enteral tube feeding—should I observe the same fasting intervals?

Answer: Feeding should be stopped at the first sign of increasing stomach residual volumes. Four hours fasting following the last feeding is safe if residual volumes are not increasing. Continuous duodenal feedings poses a lesser risk of aspiration than stomach feeding. The urgency of the procedure and the need for continuous nutritional support versus the increased risk of aspiration need to be considered by patients and all the medical specialists involved in patient care.
Q. What about Jell-O?

**Answer:** Jell-O® is a trade name for one company which produces many forms of gelatins. Gelatins are created when a powder is mixed with water and forms a semisolid when cooled. Some forms of gelatins may also contain milk products and fat, such as puddings. Scientific studies have found that the gelatin can be found in patients’ stomachs several hours following ingestion. This residual stomach contents poses as an aspiration risk. Anesthesia and sedation following ingestion of gelatin increases the risk of aspiration. Therefore, all gelatins are treated as “food” and the fasting period following ingestion must be 8 hours. Risk and benefit for patient safety regarding the urgency of the procedure following gelatin consumption verses the risk of aspiration must be discussed among the patient and medical specialists involved in the patient’s care.

Q. Fasting guidelines are specifically designed for elective procedures; what is an “elective procedure”?

**Answer:** The University of Iowa Hospitals and Clinics operate using a Triage Schema. Triage priority is based upon patient’s condition. The triage priorities are defined as follows:

* **Class A** – Life, limb, and/or sight threatening condition requiring immediate surgery, and takes precedence over any other case.
* **Class B** – Life, limb, and/or sight threatening requiring immediate surgery within four hours.
* **Class C** – A non-life threatening condition that may lead to severe complications if surgery is not performed within 8 hours of classification.
* **Class D** – A non-life threatening condition but requiring surgery within 24 hours or severe complications will occur.
* **Class U** – Urgent – inpatient referrals or patients admitted who require surgical intervention within 48 to 72 hours; these cases may be worked into the existing schedule.
* **Elective add-on** – a patient/case that does not meet the urgency/emergency criteria of the triage emergency prioritization system.

Preoperative should be considered synonymous with periprocedural, as the latter term is often used to describe procedures that are not considered operations, like MRI scans.

Q. What about oral contrast?

**Answer:** Oral contrast is a mixture of Gastrografin® 50 cc, Black Cherry Drink Mix, and water to form a solution which looks and tastes like Kool-Aid®, containing a Ph of about 6.0 to 7.6. When patients are not going to have anesthesia, an adult is required to drink between 800 cc and a liter of oral contrast. Children are asked to drink a certain volume of oral contrast based on age and the type of anesthesia for the procedure (general anesthesia or sedation). Risk and benefit for patient safety regarding the urgency of the procedure following oral contrast consumption verses the risk of aspiration must be discussed among the patient and medical specialists involved in the patient’s care.
Q. What about CT scans requiring oral contrast administration?

**Answer:** Any CT that is ordered as chest/abdomen/pelvis or abdomen/pelvis almost always requires oral contrast (in addition to IV contrast). If you are not sure, please contact 46147/8 (CT control center) to confirm whether this patient will need oral contrast. In order that the imaging quality is adequate and in keeping with what would be considered "safe" we have come up with the following protocol. This protocol has been the standard and has been successfully used since we have instituted it.

**SEDATION CASES:**
NPO as per anesthesia guidelines.
The patient is given one hour to drink this volume, but we encourage the parent to have the child drink the concoction as fast and as much as possible. Even if the child does not drink the required amount, sedation will commence ONE HOUR after the completion of oral contrast ingestion.

Quantity of oral contrast by age is as follows:
Premature: 30 cc
0-1 year: 60 cc
1-2 years: 80 cc
2-5 years: 120 cc
5-10 years: 200 cc
10 years and older: 250 cc

**GENERAL ANESTHESIA CASES** requiring additional contrast:
The additional contrast must be administered four hours prior to the scheduled imaging procedure. In addition, this will always be scheduled under GA so we can secure the airway. The usual contrast will be given one hour before the procedure similar to the above protocol. NPO as per anesthesia guidelines.

Q. What about carbohydrate-rich drinks?

**Answer:** It is safe for patients to drink carbohydrate-rich drinks up to 2 hours before surgery. BUT, not all drinks are free of dairy products and pulp containing fruit juices; so the specific drink must be considered by the health care team. If the exact ingredients of the drink are unknown a 6 to 8 hour fasting period is considered to be a conservative duration.

Q. What about perioperative enteral feeding in burned patients?

**Answer:** Burned patients have special metabolic requirements because of increased caloric needs and nutritional support. Intubated patients with cuffed endotracheal tubes or with gastric feeding tubes documented to be post pyloric may have enteral feedings continue up to and throughout surgery. Non-intubated patients or with enteral feeding tubes in the stomach can have enteral feeding up to 4 hours before surgery unless the gastric residual volume (GRV) is greater than 200% above the hourly volume of feed. For example, if the hourly volume of feed is 30/hr and the GRV residual is 60cc, enteral feeding should be stopped and residual volume suctioned 4 hours before induction of anesthesia. Tube feeds may need to be discontinued earlier based on co-morbidities of the patient that might make airway management more difficult.