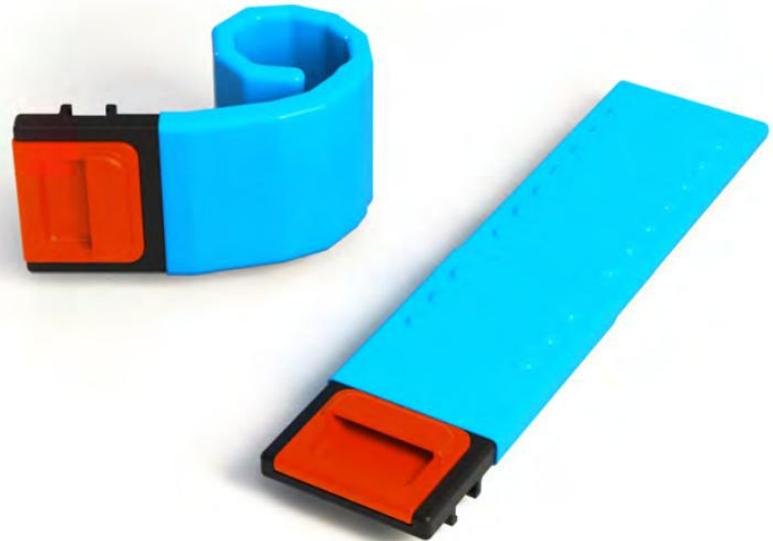
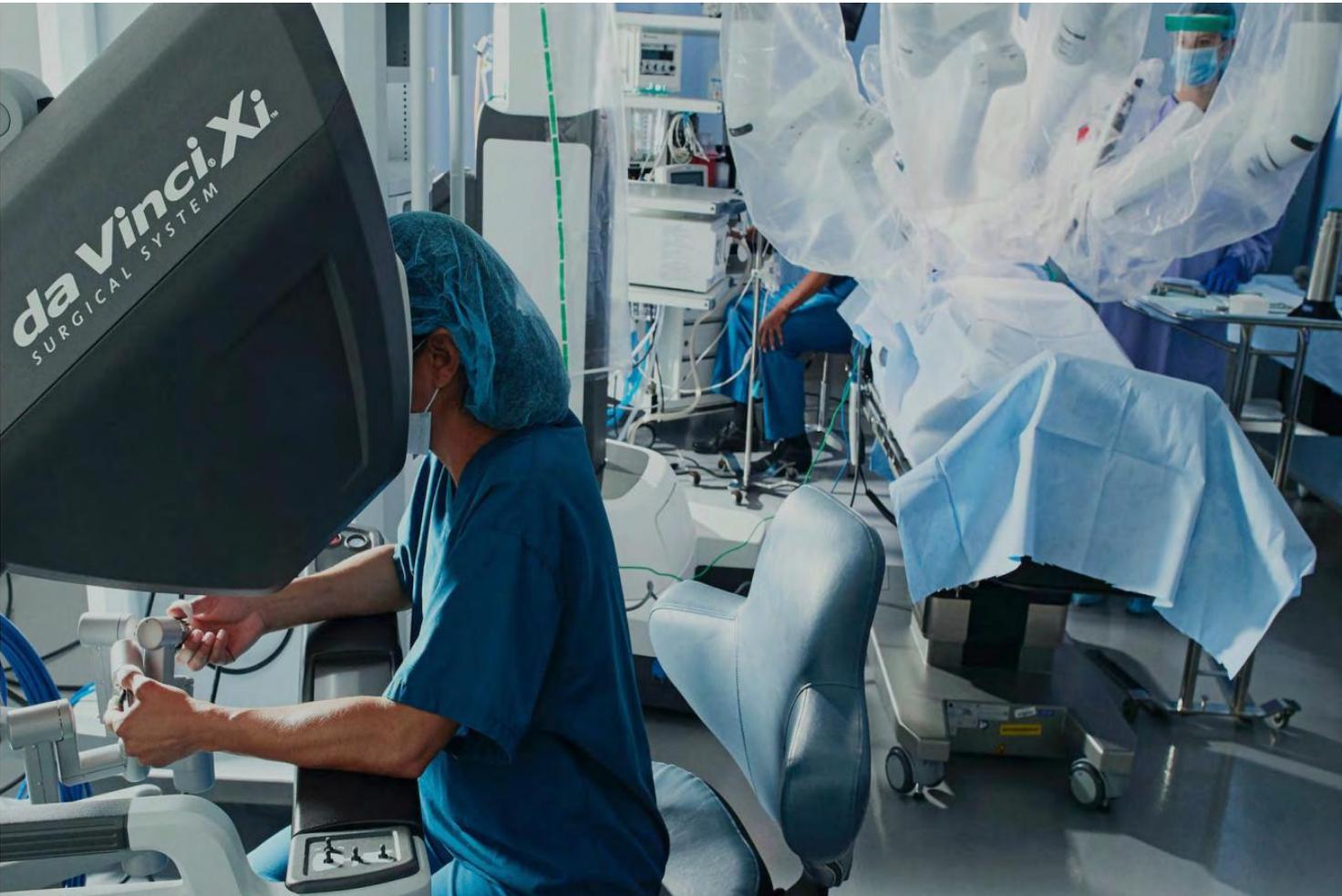


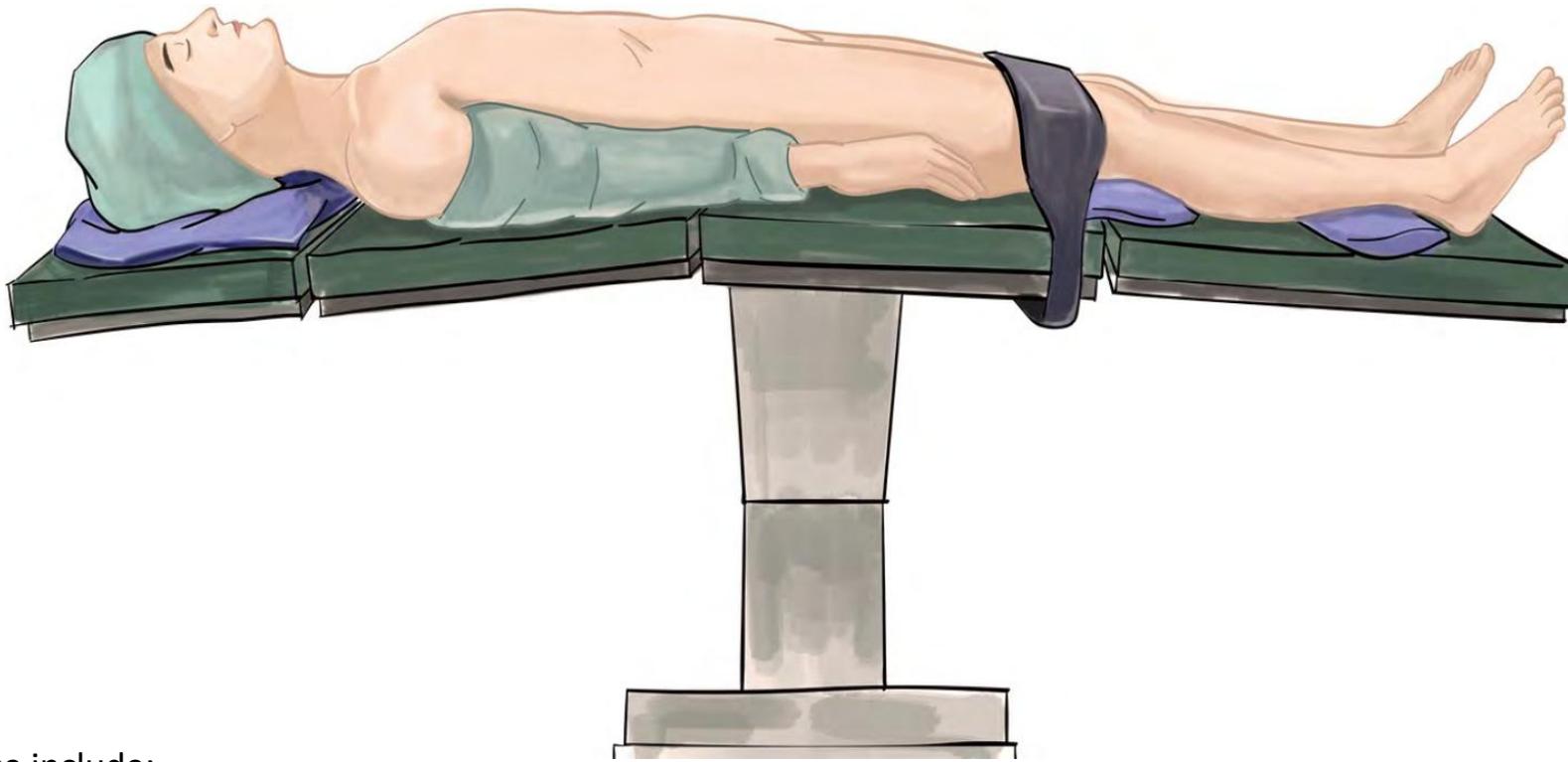
**Welcome to a New
Standard of Care
in the OR**



SafeTuck



About 4 years ago Dr Lawrence Volz was preparing to perform a robotic colectomy on a 60 year old woman. As they were positioning the patient they began to tuck her arms at her side to facilitate the procedure. It took 2 staff members rolling her on her side and 2 others to position the pads and tuck her arms tightly to her side so they were secured safely in a position to not interfere with the procedure. After numerous attempts it took over 15 minutes to finally get her arms positioned safely and finally able to start the procedure. After the frustration of this case there were numerous issues experience on a daily basis related to the current techniques and devices to secure limbs during surgery.



These include:

Arms coming loose on a sedated patient while placing a portacath and the patient reaching into and contaminating the sterile field. Removing the drapes after a long case and finding that an arm or leg had come loose and had been hanging, possibly for hours and hoping there wasn't a joint, nerve or vascular injury to the limb. Watching anesthesia climb under the drapes, struggle to untuck an arm to fix an IV, adjust blood pressure cuff or start an A-line and not being able to safely retuck the arm again. Wasting precious minutes as numerous staff members work to get arms safely stowed for the procedure. All in addition to the wasted disposable pads and sheets used to secure the limbs.



The Problems:

1. In all but the thinnest patients this process requires 2-4 OR personnel to secure the arm well
2. This can be very time consuming
3. Limbs can be easily dislodged when poorly tucked
4. Difficult to access intraoperatively and very difficult to resecure if accessed.



Option 1 – The arms are secured using a sheet or a towel that is placed under the patient. The arm is typically padded with multiple disposable cushions and the sheets are wrapped around the arms and secured under the patient creating a sling for the arm.



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Competitor Patient Positioning Device



Process 2 – The arms are secured with a rigid ‘sled’ device that slides under the patient and secures the arms.

Problems:

1.This is difficult to place and requires the patients to be rolled high on their side to place

2.Once arms are secured they cannot be accessed during the procedure

3.Limbs can be dislodged in sedated patients

4. Device is bulky and can interfere with the surgeon, the robot and the procedure

Lower extremities are not typically secured below a strap around the pelvis but are not uncommonly found hanging off the table placing them at significant risk for injury.

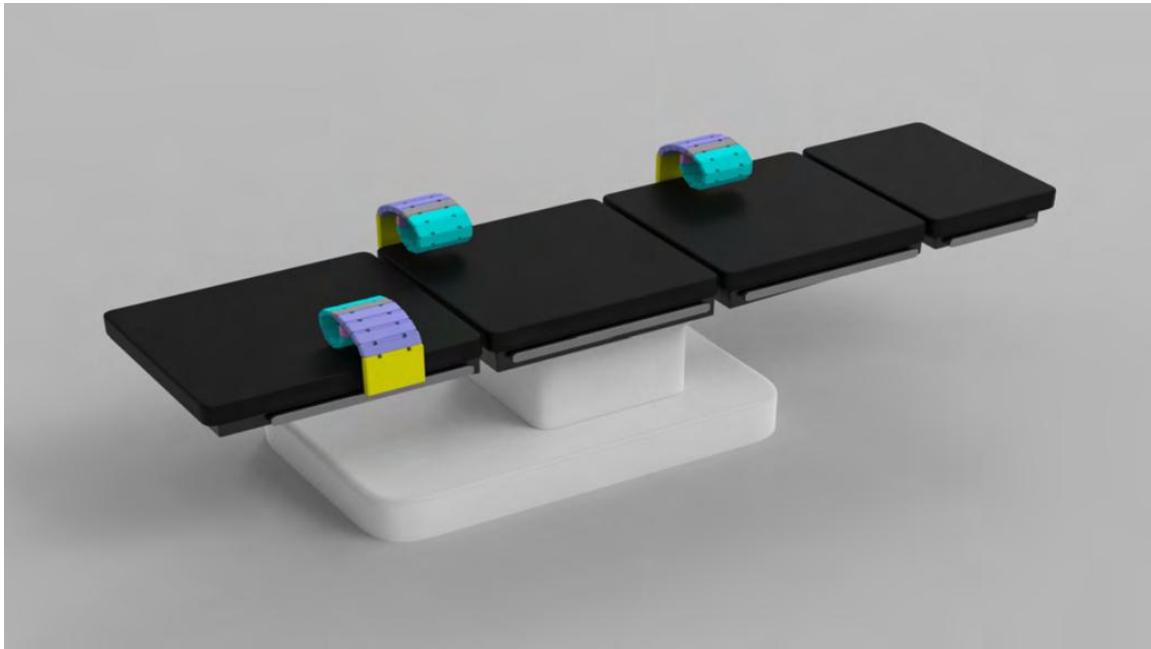


SafeTuck

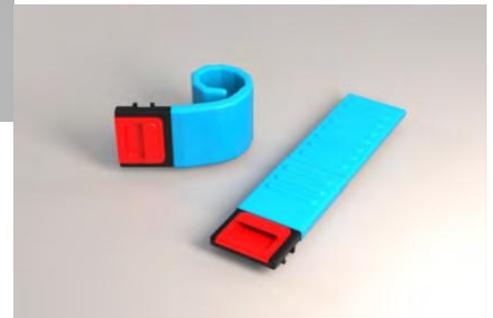
After fighting this problem for 20 years, Dr. Lawrence Volz designed the solution.

SAFETUCK

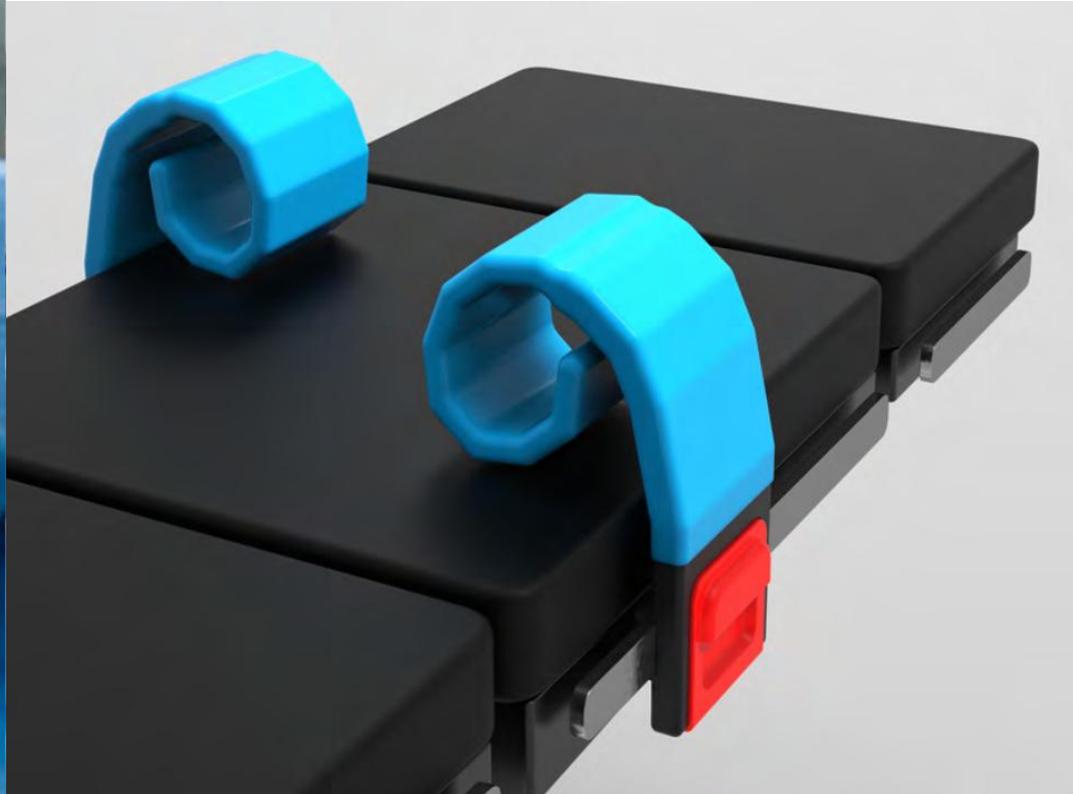
Secure. Efficient. Safe.



1. SafeTuck is a moldable restraint device that becomes rigid when easily locked in position. It firmly attaches to the rail on all operating room tables and wraps each limb circumferentially.
2. It is easily unlocked and adjusted to allow anesthesia to access the arm and securely retuck the arms.
3. The device has integrated padding eliminating disposables such as foam pads and sheets.



Strong and Flexible



4. It accommodates every size limb from pediatric to extremely obese.

5. The device does not require a storage rack as it can be kept attached to the foot of the bed in each OR.

6. It is very strong and with two points of fixation will prevent the sedated patient from getting their arm free to reach into the sterile field.

Lever Locking Prototype

- Flush, single motion design



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Vita Group

7. It is reusable and quickly wiped down between cases.

8. It is radiolucent and low profile so it won't interfere with procedure or other equipment like a C-arm

9. It is extremely easy and quick to apply and can be applied in seconds by one person saving critical staff and OR time with every case.

SafeTuck



Design Highlights

Secure

- Strong enough to support obese arms and keep patients from getting free when sedated and confused

Efficient

- Requires only one staff member to apply
- Allows for easy access and safe repositioning
- Can be stored on OR bed, eliminating unnecessary storage

Safe

- Integrated padding
- Rigid enough to protect limbs from injury

Cost-effective

- Reduced turnover and operating room times
- Reduced use of disposables

Design Based on Real World Experience



Lawrence Volz, M.D. FACS

- General/Trauma/Robotic Surgeon for 20 years
- Former Hospital Chief Medical Officer
- Co-Founder Ventis Pharma – Pharmaceutical Company
- Co-Founder Baypoint Technology – Healthcare Technology
- Air Force Veteran
- Owner of multiple patents and TEDx Speake

