

Nevada OR Nurses gain big efficiencies using PREFcards Surgical Software

By modernizing the preference card process with a digital solution, a surgical facility in Nevada enabled real-time card edits instead of semi-annually. Over six months, the preference cards tied to the most popular surgical procedures saw a \$16,046 improvement in cost accuracy.

The Problem

A twelve OR Nevada surgical facility was experiencing delays during surgical cases, shortages of needed supplies, and low nurse confidence when picking cases due to incorrect preference cards. The inventory manager explained that prior to using PREFcards digital solution, “Preference cards were mostly incorrect ... and nurses would usually pick cases from their memory.” When key nurses were unavailable to pick for a case that only they knew, non-standardized and often illegible paper cards were relied upon by other staff.

Nurses and surgical technicians at the facility are tasked with a variety of duties perioperatively including picking for cases, returning unused supplies to inventory, and intraoperative charting. Making requested edits to preference cards was a low priority compared to these tasks and would often be forgotten.

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Consequently, there was low compliance with real-time editing and updating of paper preference cards. The problems identified at this particular facility are common in OR's across the USA. One recent study by the American Nurse Journal² polled nurses about their current preference card protocols:

95% of those nurses stated preference card inaccuracy decreased their efficiency, with 24% of those nurses stating preference cards were only sometimes or rarely accurate.

SURGEON: <i>J. Cantale</i>		PROCEDURE: <i>Vasectomy</i>	
GLOVE SIZE: <i>7.5 Biogel</i>		POSITION OF PATIENT: <i>Supine</i>	
SKIN PREP: <i>Betadine</i>		DRAPE: <i>Minor Procedure Drape</i>	
SUTURES AND NEEDLES		INSTRUMENTS AND EQUIPMENT	
TIES: <i>3-0 silk</i>		BASIC: <i>Vasectomy Set</i>	
PERITONEUM:		SPECIAL: <i>Table cover, Mayo Cover, Light Handles, Needle May, #15 Blade x1, Syringe, 25g Needle, Towels, Bovie, Raylex</i>	
FASCIA: <i>Usually does not suture skin</i>		Needle Tip Probe	
SUB-CU:		HEMOSTASIS:	
SKIN: <i>Medium (White)</i>		ELECTROSURGERY:	
RETENTION: <i>Liga clips</i>		WOUND DRAINAGE: <i>Bovie 30/30</i>	
OTHER: <i>5% Mercaine Plain</i>			
DRESSINGS: <i>ointment & Bandaid</i>			

IMPORTANT NOTES
Glove: 7.5 Biogel
***Lig. usually does not suture skin

GLOVES

Name	Ref #	Open	Hold	Item Note	Unit
7.5 Biogel	41.05	8			box

SUPPLIES AND CUSTOM PACKS

Name	Open	Hold	Item Note	Cost	Ref #
1000 Syringe	1	0		94.3	54929
15 Blade	1	0		5.23	70413
Betadine Prep	1	0		20.22	10952-9
BAND-AID	1	0		5.42	104258
Band-Aid Adhesive					
Bandage 1" x 3"	1	0		11.24	10373
Ligature Clip					
Applier Medium					
Disposable					
Mayo Stand	1	0		5.44	70511
Cover					
Minor Drape	1	0		12.1	101590
Rectile Counter	1	0		5.19	101713
Magnate					
Needle Sterilize	1	0		11.23	70413
Bovie					
Needle	1	0		94.3	100755
Hydroderm					
Needle 25g x 1.5"					
Syringe 10ml	1	0		5.34	104
Surgical Towels	1	0		9.43	10111
White					
Table Cover	1	0		14.73	10407

SUTURES

Name	Ref #	Cost	Open	Hold	Item Note
SUTURES SILK 3-0 TIES 30/10	20311	11.09	1	0	

MEDICATIONS

Name	Open	Hold	Item Note
Mercaine 0.5% Plain PF Steril	1	0	
Tricaine Antibiotic Ointment	1	0	

INSTRUMENTS AND TRAYS

Name	Item Note
Light Handles	
Vasectomy Tray	

EQUIPMENT

Name	Item Note	Ref #	Open	Hold
Valley Lab Scribe Machine		20205		0

VASECTOMY


Open: 2023-07-10 10:00:00

PREP/POSITIONING
Prep: 1023, Shave
Position: Supine
Drapes: Minor Procedure Drape

MEDICATION
0.5% Mercaine Plain

VASECTOMY MAYO STAND & BACK

TABLE SET-UP



Comparison between paper card and PREFcards digital version of Vasectomy preference card

The Proposal

The proposal to simplify the preference card process including a specific focus on timely editing was the goal. After evaluating various solutions, PREFcards software was chosen due to its ability to efficiently edit cards at any time from any device or workstation, maintain a history of completed edits, and a robust reports engine that gave managers business intelligence analytics to improve decision-making about site performance goals.

In addition, because PREFcards can integrate real-time inventory information like costs, charge codes, and the quantity of every item used during a case, the ability to capture costs more accurately for each surgery is greatly improved.



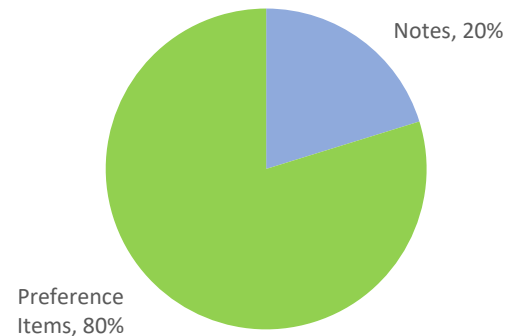
The Results

PREFcards software overcomes the problems posed by traditional preference cards management process through easy editing and enhanced accuracy, which results in reduced wastage. **12% of nurses state that their OR's waste supplies in more than 25% of their surgical cases².**

This dollar amount is significant when considering surgical supplies make up 40-60% of total supply costs³ in a hospital. By focusing on the top 20 most common procedures at this particular facility, PREFcards fostered consistent updates to these high-use preference cards, often by utilization of their "Card Edit Suggestions" report. The 20 preference cards tied to these procedures, which accounts for only 2.9% of the facility's total preference cards, were used for more than one third (36.6%) of the cases during the study period. The study revealed that these cards were updated, on average, every 33 business days, with an average of 4.5 changes per update. These alterations encompassed additions of supplies, adjustments in quantities, and updates to notes—changes, that led to lower supply costs.

This new ability to frequently and easily make updates contributed to reduced errors and ensured the alignment of the preference cards with the latest surgical requirements and requests from the surgeon.

Type of Change in Preference Cards



\$16,046

Total cost variance amongst 20 preference cards.

\$802

Average cost accuracy disparity per case.

\$1.4M

Potential annual savings.

In addition to bolstering accuracy, **PREFcards demonstrated significant cost-saving potential.** The study compared the cost differential between outdated paper cards and their updated electronic counterparts. Each high-use preference card underwent an average of 14.55 changes during the study period. These 291 item changes resulted in a total cost variance of \$16,046 amongst 20 preference cards. Moreover, these cards exhibited an average cost accuracy disparity of \$802 per case. Given their frequent usage, PREFcards showcased potential annual savings of over \$1.4 million.



To illustrate the financial impact a single inaccurate preference card can cost a facility in one year, here is an example of a Shoulder Arthroscopy RCR preference card from this facility. This card had \$1,220.79 worth of open and hold items that were inaccurate per case. **Were this card never updated, it would waste over \$153K a year** (assuming 125 cases yearly or 2.6% of total cases). Considering this is only 1 of the 20 high-use preference cards, total yearly cost savings due to the use of PREFcards software proved to be extremely valuable.

Conclusion

In conclusion, this case study emphasizes the value of PREFcards software in enhancing surgical card accuracy, reducing costs of surgical supplies, and optimizing operational efficiency. By enabling surgical facilities to maintain precise and up-to-date preference cards, PREFcards enhances communication among nurses and surgeons by ensuring consistent expectations of preference cards. Frequent updates also resulted in reduced disruptions and contributed to operational efficiency.

References

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