

## ASC Service Design & Planning

Soyring Consulting Case Study

Soyring Consulting 880 21st Ave. N.

St. Petersburg, FL 33704 www.soyringconsulting.com

P (727) 822-8774

F (727) 822-8775

E-mail: info@soyringconsulting.com

## Case Study: Ambulatory Surgery Service Design & Planning

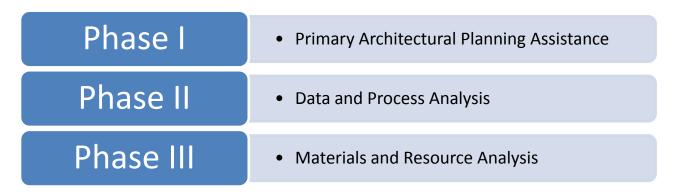
### **Project Initiation**

Soyring Consulting engaged with a large (450+ bed) academic facility to assist with the architectural design and operational planning for a new Ambulatory Surgery Center (ASC). This new ASC was built on the hospital campus and primarily services orthopedic and pain specialties.

The main focus of the project was for Soyring to provide the facility with recommendations regarding:

- Architectural drawings
- Work flow
- Storage and placement of equipment
- Productivity considerations
- Department operational processes in connection to architectural drawings

The project was set-up in 3 phases:



Each of these phases was developed to systematically dissect, analyze and present the best possible solution or course of action to go forward with respect to the selected issues.

## **Project Progress Tracking**

Soyring Consulting developed and implemented a tool to track progress through the development of solutions for the ASC. The tracking tool was an action plan/summary report which listed issues pertinent to project success, including:

- Opportunities/outcomes describing the potential for improvements in design
- Process structure
- Equipment usage
- Outcomes realized throughout the consulting engagement

The tool also allowed for comments which were utilized to note any abnormalities, hindrances or lessons learned that could assist with possible future issues.

### **Project Phases Detailed**

Each project phase consisted of detailed working objectives supporting the project goals of assistance with architectural plans and operational set-up of the perioperative process for the ASC.

### Phase I: Primary Architectural Planning Assistance

The first phase of the project (Phase I: Primary Architectural Planning Assistance) consisted of 3 components:

Primary Surgical Services ASC architectural plans consulting assistance. Soyring was tasked with
providing upfront recommendations on the architectural plans regarding layout and operability for:

# Patient Experience

- Operating Rooms
- PACU
- Pre/Post Op Services

## **Patient Access**

- Admission
- Registration
- PreAdmission

## **Support Services**

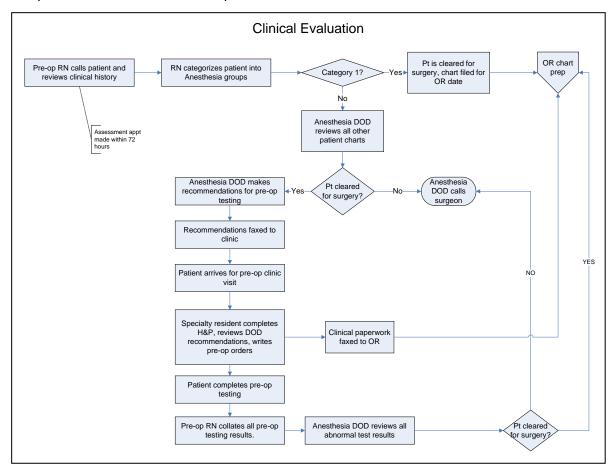
- SPD
- OR Decontam
- Materials Process
- Case Cart
- Best Practices. Patient care and operations recommendations were made based on national organizations and Soyring's extensive experience from over 800 hospitals nationwide.
- Policies and procedures. Existing policies and procedures were analyzed and adapted to meet the new demands of the ASC and included recommendations to manage future expansion of services.

### **Phase II: Data and Process Analysis**

The second phase of the project (Phase II: Data and Process Analysis) included five main components:

- Collection and analysis of ambulatory surgery data from the facility's existing ASC. This data was used as a historical reference of performance and volume as well as the basis for projected patient volumes and growth for the new ASC.
- Review of the OR schedule. In order to provide a basis for hours of operation, staffing requirements, and surgeon scheduling Soyring Consulting analyzed current block utilization focusing on orthopedics and pain and projected potential ASC procedures. This information was utilized to develop mock block schedules for an 8 hour 5 day week and a 10 hour 4 day week with open block scheduling availability.
- Schedule board design. Although the scheduling board would not be used until the ASC was built and operational, it would influence operations from day one. A well planned board would aid greatly with the flow of cases throughout the day.

Preadmission testing process design. One element to the successful start of an patient visit is the preadmission testing process, and with this in mind, Soyring set out to develop a model of the area, with policy and procedures, staffing needs, an intraoperative flow chart, combined preop and intraoperative flow chart and best practice recommendations.



Staffing needs for the ASC and supporting Sterile Processing Department (SPD). In order to develop recommendations for the staffing needs of the ASC and the SPD, Soyring Consulting created a position control document with staffing flow charts for each of the operational scenarios presented above. Accompanying the staffing flow charts were job descriptions with key requirements for each position. Cross training opportunities were also identified for enactment prior to opening the ASC to ensure better operations from the start.

### **Phase III: Materials and Resource Analysis**

The third phase of the ASC project had 7 main components and focused on materials and resources:

Preference cards for Surgeons. Existing preference cards for appropriate surgeons and procedures were reviewed. An inventory list for instruments, sutures, medications, and other supplies was formed and used to develop the inventory, supply, and instrumentation needs for the new ASC. Due to limited documentation pertaining to surgeon and procedure lists, surgeon and procedure specific lists were submitted to the appropriate facility personnel to validate the data used.

- o **Instrumentation needs**. An inventory of individual instruments was created and cross-referenced to instrument sets, surgeons, and accessory sets. To identify purchasing needs, a database was developed for all instrument sets listing each set individually and noting instruments and implants (when applicable) for purchase and cost. During this process Soyring Consulting identified instrument set problems related to efficiency of configuration, duplication, and cost. Based on these findings, a recommendation was made to revise instrumentation along with preference card redesign to improve these factors prior to final inventory identification and purchase.
- Suture supply identification. To ensure that the new ASC would have the appropriate sutures a suture database was created based on existing facility surgeon preference cards, with a specific focus on high-volume orthopedics suture needs.
- Supply inventory list identification. An inventory database was developed using the
  preference cards analysis. Individual supply inventory lists were made for the specialty caddies
  to be used in the core related to pain and orthopedics.
- o **Medication inventory identification**. An additional application of the preference card data was the creation of a medication database.
- **Development of materials flow charts**. The understanding of materials flow within and between the Preop areas, Operative area, and SPD was a vital part in design recommendations.
- **HR** analysis. Due to the outpatient focus of the ASC an additional analysis of human resources was undertaken which focused on a 23 Hour ASC staffing model. This was needed to ensure proper staffing coverage for patient care throughout the entire outpatient experience.

## **Project Completion**

Soyring worked on the project over a one year period at which point all the facilities goals for the project had been met, including:

- Assistance with perioperative specific ASC architectural design plans
- Equipment storage and placement recommendations
- Space optimization and staff productivity plans
- Development of operational models and processes

Overall, Soyring's commitment to detail and timely project completion made this project a success – allowing for operationally efficient design, as well as productivity enhancements upon the opening of the facility.