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Oracle Practice

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Integrated Solutions
IBM GBS Oracle Practice Overview

**The Broads Base of Successful Engagements and Unparalleled Depth of Industry Expertise**
- GBS has successfully completed 4,900+ Oracle engagements (S-S, P-S, P-P), 2011
- Cross-Industry Solutions across wide array of business processes
- Joint development of industry-specific solutions
- Project Accelerators leveraged and enhanced over multiple projects

**Oracle’s Strongest SI Services Provider**
- GBS enjoys special status as Oracle’s most significant alliance partner – Diamond Partner
- Broad and deep collaborative relationship from highest level of organizations for mid-size to large enterprises
- Granted direct priority access into Oracle Development
- An avenue in addition to what Oracle provides customers

**Integrated Approach that Enables True Global Delivery**
- The right resources from the right locations at the right time for the right costs
- Skills span management, business processes and technology
- Seamless, fully integrated delivery model
- 1,300 Oracle resources located in our Global Delivery centers in India, China, Canada, Brazil and Eastern Europe
- Processes are CMMI Level 5 certified

**Largest Base of Solution Delivery Centers**
- 15+ Centers throughout Canada, Latin America, EMEA (UK, France, Italy), AP (China, Japan, Australia, India)
- Solution centers located worldwide focused on development, delivery and S&D providing innovative, world-class expertise and solutions at submarine cost
- Re-usable assets and solutions developed and maintained at solution centers

**Largest and Most Experienced Team of Resources of Any SI**
- A combination of more than 5,000+ dedicated Oracle consultants globally with an average of 7+ years of product experience and 10+ years of industry experience

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**Healthcare Supply Chain Optimization**

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Compelling Opportunity in Healthcare

- 50% of departmental inventory is inactive
- 10% of inventory expense is obsolete
- The traditional non-labor supply chain represents 40% of the typical hospital system’s total operating expenses
- Hospitals could reduce total expenses by at least 2% through better inventory management and distribution of finished medical materials (Schneller, E.S. 2006 Strategic Management of the Healthcare Supply Chain)
- On average, a 5% improvement in forecast accuracy can drive a four day reduction in inventory (Source, Deloitte Benchmark)
- Hospitals may have up to 2 ½ times more inventory than what is on the balance sheet (Source, Supply Chain Sisters of Mercy, 2009 Deloitte Benchmark)
- In a study of 270 hospitals over a four year period, best in class hospitals had 52% greater inventory turns, averaging 17.5 turns per year (Source, Healthcare Financial Management Association)

Healthcare Supply Chain Industry Comparison

- A July 2013 survey by researchers at the University of Arkansas indicates that the healthcare industry’s supply chain lags behind the retail industry supply chain and could benefit significantly from adopting several of retail’s best practices.

“The retail industry has a long history of adopting automation, complemented by scientific and mathematical models, to improve supply chain operations. Conversely, healthcare has been relatively slow to adopt these methods. Based on survey responses, we believe that considerable efficiency gains might be available to the health-care supply chain through the adoption of best practices from the retail supply chain.”
Transforming to a Demand Driven Model

- Predictive
- Responsive
- Optimized Inventory Investment
- Collaborative Network
- Better Outcomes

Healthcare Provider Connecting Clinical Operations to Materials

What if the Healthcare supply chain was connected from supplier to patient?
A clinical operation has a schedule change and the materials to perform the operation are coming from several key suppliers. The supplies need to be rescheduled to the new date and another operation is taking the time slot. The suppliers are notified of the schedule change and both operations are provided with the right materials at the right time.

The Opportunity
Healthcare providers carry ample supplies to provide care – they cannot afford to run out, so excess is carried just in case. The typical distributor is also carrying excess inventory as the demand signals are volatile. Anticipating demand and augmenting the demand signals with real schedule data can lower the overall supply chain investment and ensure better patient outcomes by tailoring the supply network to the patient requirements.

What Makes it Smarter
A poorly-managed supply chain is a waste of inventory resource, with excess and obsolescence, unanticipated shortage and excessive spend. A well-managed supply chain can deliver better care with reduced investment. This healthcare provider is delivering greater value to its patients by being more responsive to their specific needs and tailoring its resources to the care needed. The solution uses supply chain optimization and collaboration tools that are steady-state in other industries. Supply chain professionals are leveraging best practices that are leveraging historical demands, known requirements for scheduled events, and built-in protection from demand volatility. Automated alerts tell care givers when supplies need to be realigned to adjust to changing schedules, medical events or seasonal fluctuations that can be anticipated.

Real Business Results
- Eliminated the need for excessive inventory investment
- Collaborating throughout the supplier network to reduce the overall cost of delivery and response
- Improving the change over to new suppliers and materials by anticipating demand
- Automating the procurement process and eliminating manual monitoring and ordering
- Improving patient outcomes
Value Chain Planning Strategy for Healthcare
Demand Management Scope for Healthcare Supply Chain

- Demand Management by using a system wide forecast model
- Forecast items by service area/hospital
- Capturing all demands in the service area/hospital for all items in PAR, in warehouse, on consignment and other med/surg ordered on demand
  - Opportunities to improve turns of book and PAR inventory (50% to 200%)
  - Integration to clinical systems to model constraints
- New Product Introduction (Item Conversion) modeling
- Incorporating Product Management and Clinical Operations into the demand forecast
- Incorporating causal factors into the forecast (geographic expansion, plan growth)
- Contracting and pricing negotiations
- Collaboration with suppliers and distributors to improve item availability

High-Level Demand Planning Process

Developing a demand plan involves multiple steps:

- **Analyze/Load Demand History**
  - Analyze historical demand, cleanse / enhance data and understand the elements of demand patterns

- **Generate Base Forecast**
  - Build the system-generated forecast by running the forecast engine

- **Incorporate Business Intelligence**
  - Gather and analyze top-down / bottom-up forecasts as appropriate

- **Finalize Consensus Demand**
  - Reach consensus on a forecast and publish to stakeholders / systems

- **Evaluate and Enhance Forecast Performance**
  - Track forecast performance exceptions
  - Continuously improve forecast accuracy
Inventory Optimization

Account for supply chain variability in your inventory investment strategy

- Make better inventory investment decisions by including variability
  - Demand variability
  - Lead time variability

Inventory Optimization

Obtain higher service levels while maintaining less inventory investment by:

- Establishing time-phased safety stock levels using reduced forecast error generated by Demantra
- Utilizing IO postponement inventory tactics
- Utilizing ASCP to proactively plan replenishment on a timely matter and longer horizon
- Utilizing constraint-planning
- Efficiently managing events by exception messages
Demand Driven Supply—Partnerships to Improve Patient Outcomes

- Plan your extended value chain to improve visibility
  - Share forecasts with suppliers
  - Make alternate sourcing decisions

- Reduce inventory cost and improve fulfillment
  - Suppliers manage your inventory
  - Manage your departmental inventory

- Vendor collaboration
  - Support leading IDN initiatives
  - Share Clinical Operations schedules with key suppliers or distributors

- React quickly to supply chain exceptions
  - Demand changes in OR schedules
  - User-configurable exceptions
  - Automated exception handling via workflow

Value Chain Planning Integrated with Healthcare Delivery Model

- Demand Management solutions that can forecast at the departmental Par level
- Integrated Inventory Optimization solutions improve Par utilization (turns) by over 200%
- Advanced Supply Planning reduces ordering costs and further optimizes inventory investment
- Collaborative Planning creates partnering opportunities with your key suppliers and distributors to deliver OR and Perioperative supplies based on actual demands

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Value Realization

Business Benefits Targeted for Advanced Supply Chain Capabilities

- Inventory optimization, improving turns from 50% to over 200%
- Improve spend visibility and contract compliance, while giving self-service options to select suppliers
- Improve contracting for better pricing, service levels and availability
- Reduced ordering cost through automation of resupply, increased on-contract spend
- Enhance information systems capabilities for extended supply chain collaboration
Value Propositions for Healthcare Supply Chain Optimization

Financial Value
- Direct Cost Takeout
- Reduced Operating Capital
- Direct Operating Profit Contribution

Operational Value
- Streamline/Automate Business Process
- Unify Business Functions
- Reduce Operational Overhead
- Reduced Inventory/Warehousing

Risk Mitigation Value
- Reduced Complexity
- Increased Visibility to the Extended Supply Chain
- Reduced E&O

Patient Value
- Improved Patient Outcomes
- Increased On Time Delivery
- Patient-centric Supply Chain

Shareholder Value
- Increased Operating Profit
- Reduced Risk
- Positioned for Growth
- Differentiated in Market
- Improved Financial Returns

Example Project
Value Chain Planning in Healthcare

**Demand Forecasts (Demantra)** to support:
- Contracting and Pricing
- Item Conversion and New Product Introduction/End-of-Life
- Pharmaceutical window buys
- Feeds to Inventory Optimization (IO) for warehouse and PAR inventory levels
- Feeds to replenishment models and supply planning (ASCP)

**Inventory Optimization/Strategic Network Optimization**
- Stock vs. wholesale analysis
- New hospitals, clinics, pharmacies
- Distribution network design
- PAR level optimization

**Advanced Supply Chain Planning**
- Centralizing purchase to forecast by commodity
- Slowly replacing replenishment models where appropriate
- Collaboration with distributors and manufacturers

**Collaborative opportunities**
- Warehouse and Transportation Management
- Sales and Operations Planning
- Collaborative Planning

Predictive and Responsive Supply Chain Planning

**Oracle VCP Extended to Healthcare Delivery Model**
Where to Start?

- Assess the Inventory Optimization potential for your business
  - Where is the inventory?
  - What are current service levels for inventory availability?
  - How is business performing in on-contract spend?

- Find out if you have good forecast information being used to support contracting, item conversion, new product introduction

- Find out if forecast information is being used to formulate inventory and service level targets across the organization

- Define the cost elements within your procurement activity
  - Cost to raise a PO
  - Direct Purchase Cost
  - Freight, additional costs (e.g., expedite, off-contract spend)

- Answering these questions can describe the scope of opportunity for demand management and inventory optimization