

AGENDA

Section

- ABOUT NCR
- NCR S&OP JOURNEY
- APPROACH AND ENABLEMENT
- RESULTS
- WHERE WE ARE HEADED & LESSONS LEARNED

ABOUT NCR



ABOUT NCR

\$6.4B

Trailing 12 month revenue \$984M

Trailing 12 month EBITDA



1,270

PATENTS HELD BY NCR 20,000+

SERVICE PROFESSIONALS in 90 countries

around the world

PROFESSIONALS

ဗိုဗိုဗို **34,000**



7th

MOST REPUTABLE BRAND IN TECHNOLOGY



18M

DIGITAL BANKING USERS



TOP 100

TECHNOLOGY INNOVATORS

75,000 SITES USING Aloha Platform



REMOTELY RESOLVED



134 years as a technology innovator



NCR Understands Customer Interactions

Because we interact with consumers everywhere





- ATMs
- Consulting Services
- Financial Kiosks
- Branch Solutions
- APTRA™ Software
- Payment Solutions



#1 in **Financial Self-**Service

Source: Nielsen Report

Retail **Solutions**



- Self-Service **Solutions**
- POS and Other **Assisted-Service** Solutions
- Software, **Consulting and** Services



#1 in Scanners #1 in POS Software Source: Venture Development Corp.

Travel & Hospitality



- Airline check-in
 - Paper
 - Mobile
- Ticket & reissue
- Car rental kiosk
- Hotel Check-in



8 out of 10 airlines use **NCR Travel**

Source: Frost

Healthcare



- Patient check-in
- Wayfinding
- Co-pay
- E-signature
- Self-scheduling



New industry

Entertainment & Gaming



- Cash dispensers in casinos
- Entertainment kiosks
 - Rental
 - Buy/Sell/ Trade
 - Digital Download



New industry

NCR **Consumables**



- High-quality **Document and** Media Consumable Solutions
- Consumables Consulting, Logistics and **Sourcing Services**
- eCommerce Services



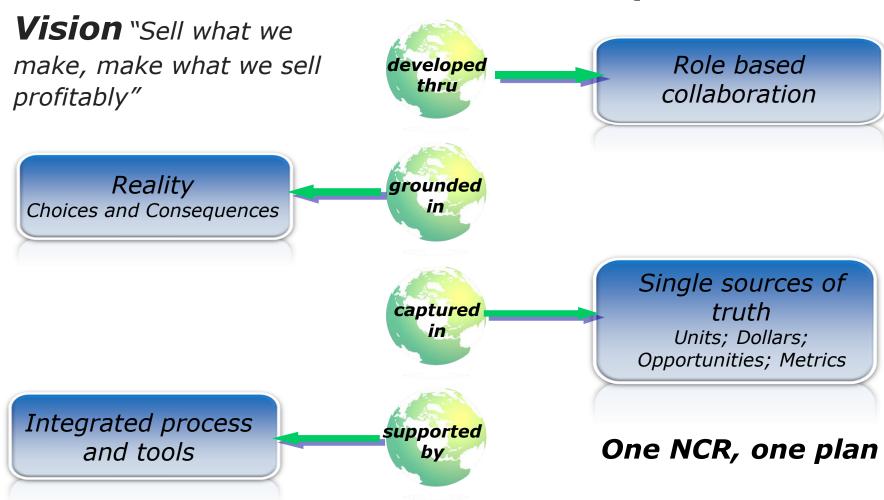
The Leading **Global Printer** Consumables Company

NCR S&OP JOURNEY



S&OP Vision & Principles- Starting Point

Based on the following **Principles**



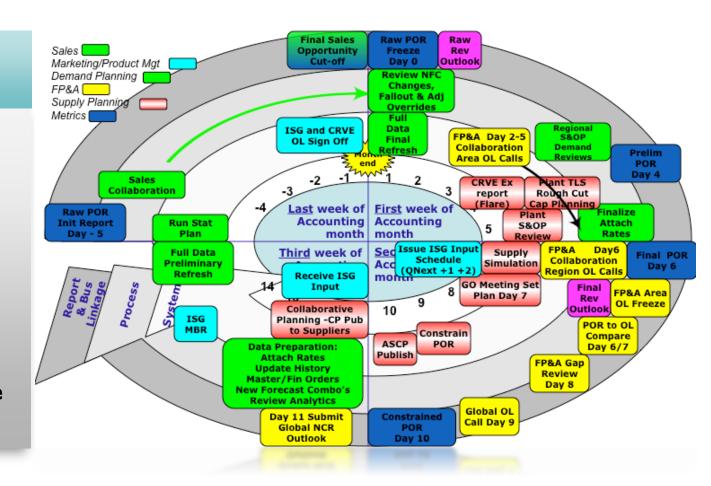
Driving to NCR business goals



NCR Results - Phase 1

Results

- Up to 20% reduction in forecast error
- Planning cycle times reduced by 25%
- Inventory reduction DP accuracy enabled lower safety stock levels
 - E&O expense reduction
- Factory blown slot avoidance minimize DP related misses
- Maturity to advanced capabilities CPFR, inventory postponement, capable-to-promise





S&OP Outlook Cycle Realized







Regional Demand



LOB MBR



Global Supply



Plants/ Supply Chain

Week 4



Week 1



Week 2



¼ Week 3₹



Data Prep

Area Outlook Unit Planning Rev Judgments Supply Planning FP&A Outlook Cycle CI

Sales Central
"Sales Funnel"

Demand"From Forecast
To Plan"

ERP
"Demand across Supply Base"
Global Sourcing; Inv
Optimizer

Supply"Managing the
Supply Base"



S&OP KPIs & Tool & Process







Regional Demand



LOB MBR



Global Supply





Plants/ Supply Chain

DASHBOARD/REPORTING

MAPE 2/3/4 Bias Tracking Volatility Vs Naïve F/C



Unit/Class/Feature

Performance Vs Plan & Outlook-Units/\$



MAPE 2/3/4 Bias Tracking Volatility Vs Naïve F/C

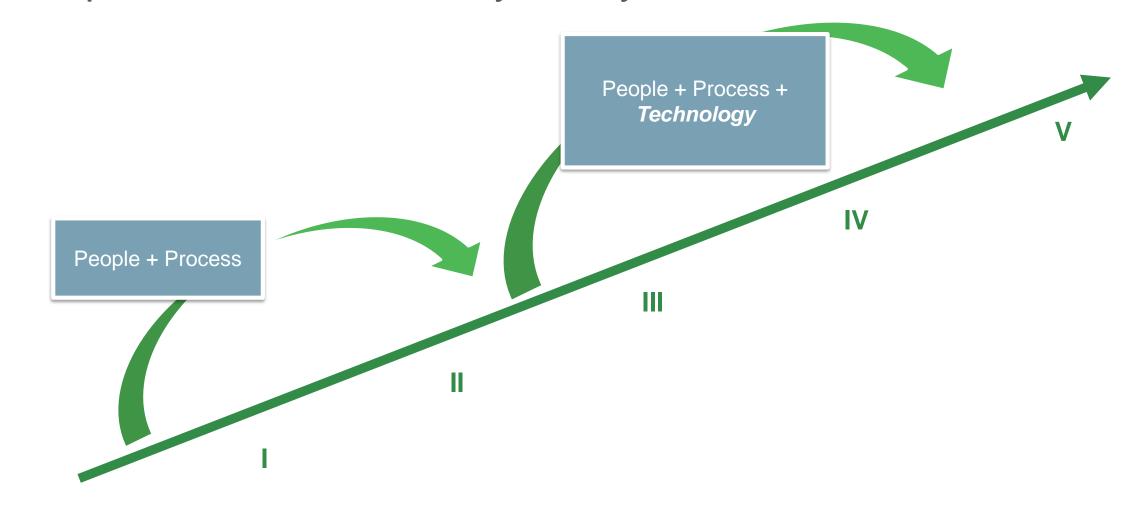
Sales Central "Sales Funnel"

Demand "From Forecast To Plan" "Demand across Supply Base" Global Sourcing; Inv Optimizer

Supply
"Managing the
Supply Base"



People + Process can only take you so far



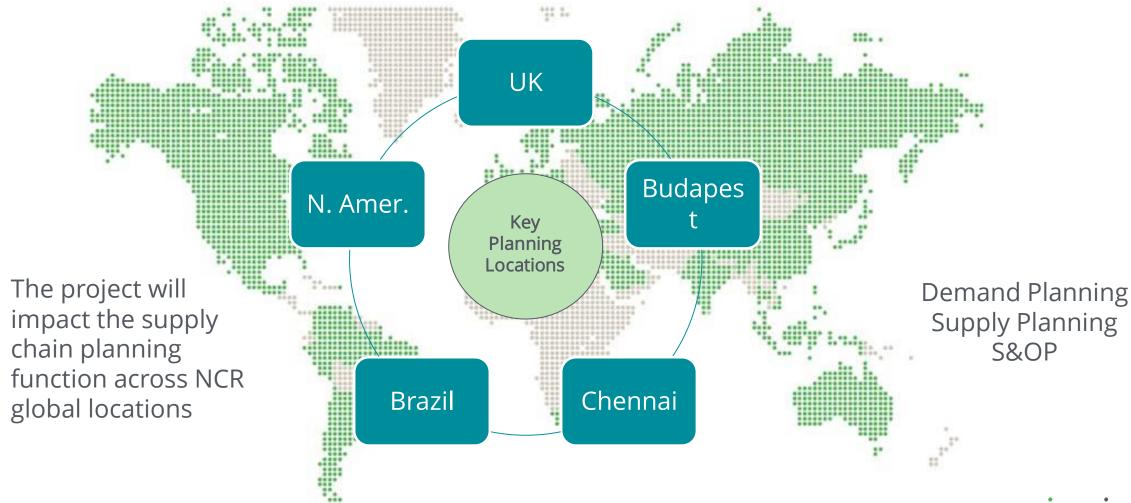
S&OP Process Maturity



Project Motivation The Need for Change

- NCR is challenged with consistent and effective execution of planning and fulfillment of demand
- Current business solution is unnecessarily complex and not producing consistent business results
- Multiple systems do not provide a single-source-of-truth
- Oracle Planning Cloud was chosen because:
 - 1. It aligns with "One System" strategy to <u>simplify</u> the enterprise solution
 - 2. Lower total cost of ownership (\$1.8M over 3 years)
 - 3. Sufficient functionality which Oracle is continually improving

Organizational Scope Planning Cloud will be a Global Deployment



High-Level System Scope & Process Impact

Software Replacement Scope

Business Function

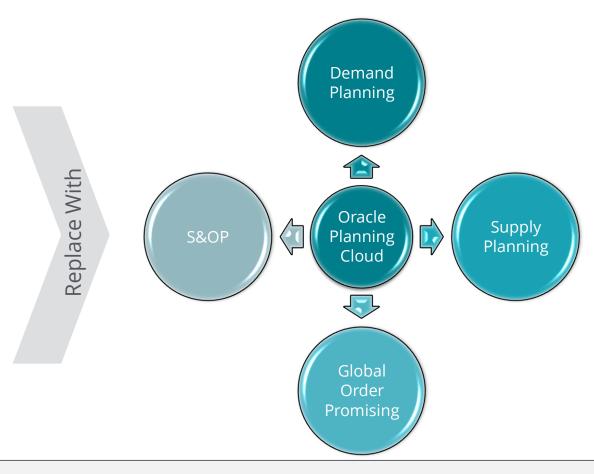
Demand Planning

- Supply Planning
- Inventory Planning
- Material Purchasing
- Hospitality Depot
- S&OP
- MRP/Purchasing
- Available-to-Promise

Oracle Demantra

Kinaxis

Oracle ASCP



Why Change?

- ☐ System has become highly complex
- ☐ Manually intensive & data latency
- ☐ Highly customized and interfaced
- ☐ New Software Economically Attractive

Benefits

- √ Simplify Business Process Design
- ✓ Increase productivity & data accuracy
- ✓ Once source of truth for planning
- ✓ Future of the Digital Supply Chain

Organizational Scope

Directly Impacted Business Groups

Directly impacted groups are those who have day-to-day interaction with the systems being replaced (Kinaxis, Demantra, Oracle ASCP).

Who Is Impacted?

- Demand Planning
- FG Supply Planning
- RM Supply Planning
- Master Scheduling
- Depot Planning

What Will Change?

- New application to learn
- Process Re-design
- Operating procedure changes (SOP)
- Reporting Changes



Demand Management Cloud Key Solution Elements

Key Features

- Unified demand and supply planning
- Exception based process
- Manage exceptions using thresholds
- New product forecasting
- Advanced modeling
- Forecast Approval



Manage Sales History

- Sense and Analyze multiple demand signals
- Adjust for outliers
- View customer & location details
- Year-over-Year comparisons



Manage Forecasts

- Transparent statistical forecast results
- Units and % Overrides
- View forecast in units and dollars \$
- Visibility of Sales Forecast
- Waterfall accuracy analysis of past forecasts
- Attach rate based forecast for feat

Multi-Dimensional Views

- Item Product Category
- Model Class Range
- Master Customer Key Account LOB
- Country Region Area





Supply Planning Cloud Key Solution Elements

Key Features

- Common Dimensions and Hierarchies between Demand and Supply planning
- Rich set of User Interfaces
- Ready-To-Build
- Build Plan
- Material Plan
- Plan Comparison
- Rough Cut Capacity Planning
- Drop Ship planning
- Back to Back planning
- Outside Processing
- In Memory based Simulations



Multi Planning Item Types

- Configure to Order (CTO) items
- Standard items
 - End items
 - Raw Materials



Plan by Exception

- Inventory shortage exceptions
- Reschedule existing orders
- Lead time exceptions
- Drill down to planning details



Plan for Multiple Demand Inputs

- Local Forecast from Demand Planning
- Customer sales orders (&PBO's)
- Internal sales orders
- Safety stocks



Safety Stock

- Statistical calculation of end items using forecast
- Item attribute days of supply
- User Defined safety stock



Sales & Operations Planning (S&OP) Cloud Key Solution Elements

Key Features

- Built-in best practices S&OP Processes
- Built-in aggregate supply planning
- Balance demand and supply
- Multi dimensional views
- Rough Cut Capacity Planning
- Plan Comparisons
- Consensus based forecasting
- Exception based process
- Revenue and Cost Tracking
- Built-in S&OP review dashboards incl. Product review
- Rapid in-line simulation



- Process definition based templates
- Actions and decisions based
- Capturing forecast assumptions and tracking
- Units and dollarized views



APPROACH



S&OP is a journey

Inspirage Maturity Framework

Stage 1
Reacting

Stage 2
Anticipating

Stage 3
Capable S&OP

Stage 4
Optimized
Planning

Stage 5
Integrated
Business Planning

- Business plan drive forecast
- Short-term forecast
- Aggregate S&OP Data
- Off-line Demand / Supply tactical balancing
- Volume focused
- Tribal knowledge dependency
- Manual Tools
- Silo focused

- Consensus Forecasting (volume and value)
- Capacity Constraints
- Demand, supply and inventory plans at aggregate level.
- Scenario planning using simulated plans
- New Product Plans
- Foundational dashboards
- Multiple sources of truth
- Conflicting metrics across functions

- Demand/supply tactical balancing on-line
- Financial projections price, cost, inventory and margin projections
- IBP management dashboards & KPI suite
- Flexible Budgeting
- Supply Chain Segmentation
- Robust Long-Term Planning Processes

- Business simulation capability for demand shaping, financial reconciliation and cost to serve
- Demand Driven
- Product & Innovation Reviews
- Inventory Optimization
- Centers of Excellence
- Master Data Governance
- Digitization IoT etc.
- · Business wide focused
- Integrated suite of tools

- Plan drives the business, enabled and linked to strategy
- Market Driven
- Extended Integrations:
 - New Product Introduction
- Extended / Integrated Analytics (Control Tower)
- IBP management reviews not an "event"
- Network Optimization
- Extended Enterprise focused

Incremental Value

Efficiency Effectiveness Optimization



Cloud Implementations Are Different

Process Harmonization and Change Management are key

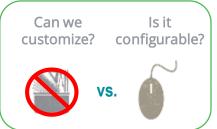


- Understand capabilities
- Leverage built-in leading practices
- Emphasis on adapting to gaps

Solution Driven

Adapt Processes

- Highly-configurable options
- Shorter test cycles
- Predictable results





- Frequent visualization of solution
- Ability to inject changes
- Better understanding of solution prior to testing

Iterative

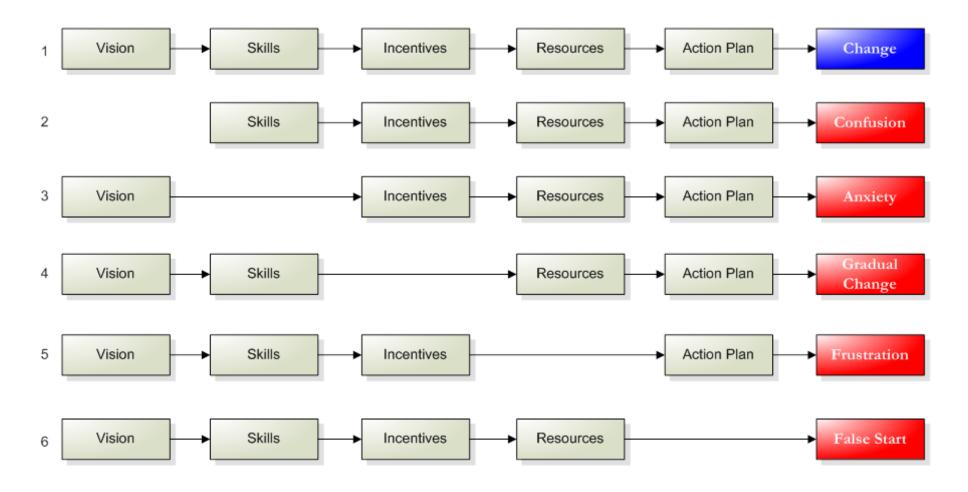
Incremental

- Shorter implementation cycles
- Multiple wins
- · Change over time

Are we done yet? What's next?



Process – The Right Sequence is Important



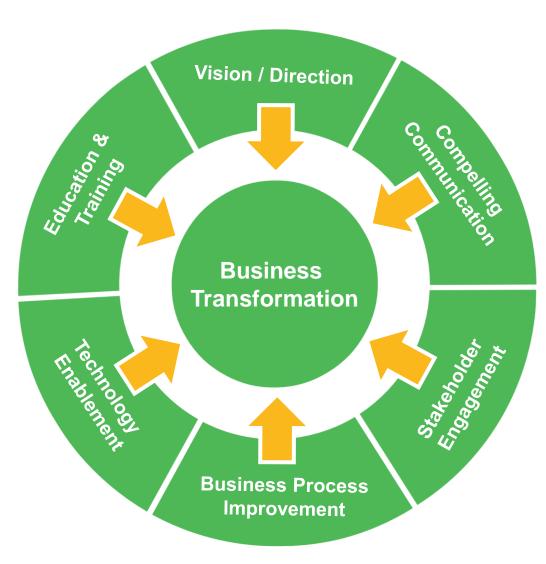


Change Management

It's more than just system implementation.
It is about achieving **business transformation**through successful adoption of simplified processes
and new capabilities

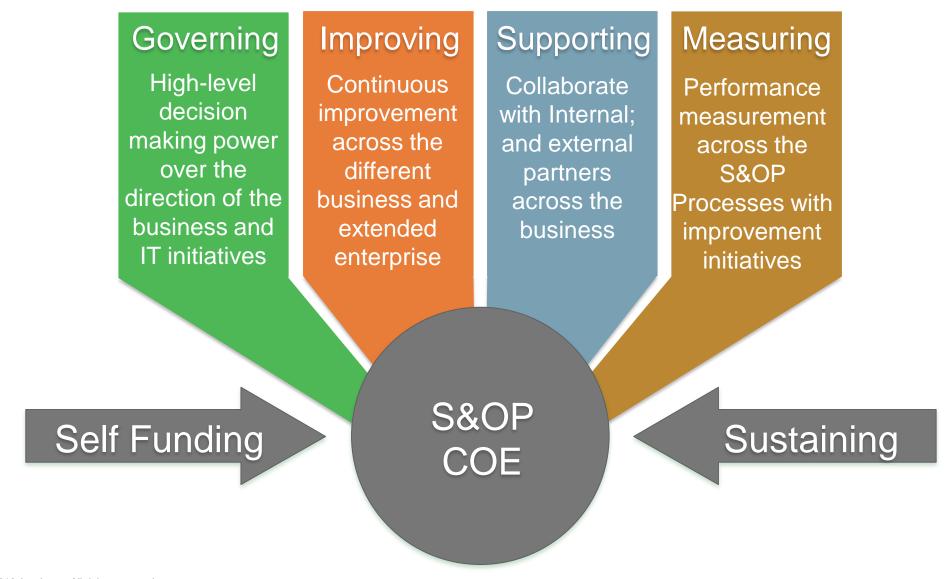
Organizational Change Management (OCM) Benefits

- Reduced negative impacts of change on the business (organizational structures, policies, business processes, and employees)
- Increased employee commitment to change
- Increased speed of adoption to new technology
- Reduced project risk (on time, on budget)
- Maximized business results, achieving the project ROI





Establish a Center of Excellence





WHERE WE ARE HEADED & LESSONS LEARNED



Data is crucial

Collaborative Systems for **Cross Functional Discussions**



Week 1

Innovation & Demand Review

2 Week 2

> Supply Review and Balance Supply and Demand

Week 3

What-if Scenarios and Trade-Off Analysis

Week 4

Executive Review and Monthly Cycle Output

Aggregate **Planning**

Detailed Planning

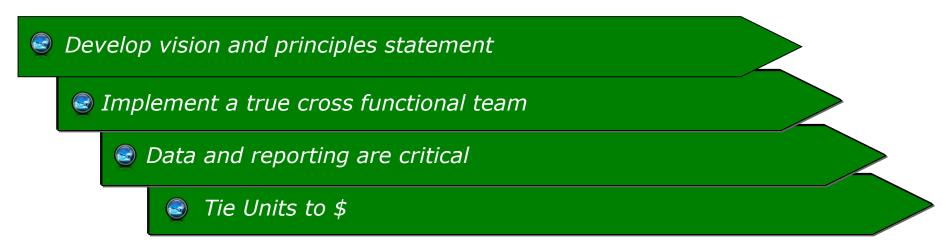
Traditional ERP

Operational Systems for Functional Silos

inspirage

Recommendations & Next Steps

Recommendations



Next Steps - Cloud

Move to Cloud – provide one single source of truth

Integrated Business Planning simplification

Reduce complexity and improve decision making

Leverage advanced features as process mature and new feature are enabled in cloud



Planning Cloud Project Benefits

To the End-to-End Supply Chain Planning Process

Demand Planning

- ✓ Simplified forecasting no feature forecast
- ✓ Forecast Accuracy Tracking
- ✓ Week-to-week visibility to demand changes
- Weekly visibility to demand sources
- ✓ Dollarized Forecast
- ✓ Use of demand time reduces forecast maintenance

Supply Planning

- Dedicated application to constrain & balance demand
- ✓ Transparent feature planning using planning percentages
- ✓ Visibility to critical plant capacities (RCCP)
- Comparison of TLS change impacts to production
- ✓ System generated demand signal for USL and Jabil
- ✓ Time fences to protect demand signal stability

SLM / Materials

- Stable build schedule for driving shortage management
- ✓ Single source of truth for the material plan
- Visibility to monthly TLS change impacts to suppliers

Master Scheduling

- Ability to build and commit to a stable MPS
- ✓ Plant-level RCCP visibility
- ✓ Comparison of TLS change impacts to production
- ✓ Exception-driven capabilities for the MPS

Cleanly Integrated & Transparent Demand Signal

- Only one integration point
- Single demand signal driving supply actions