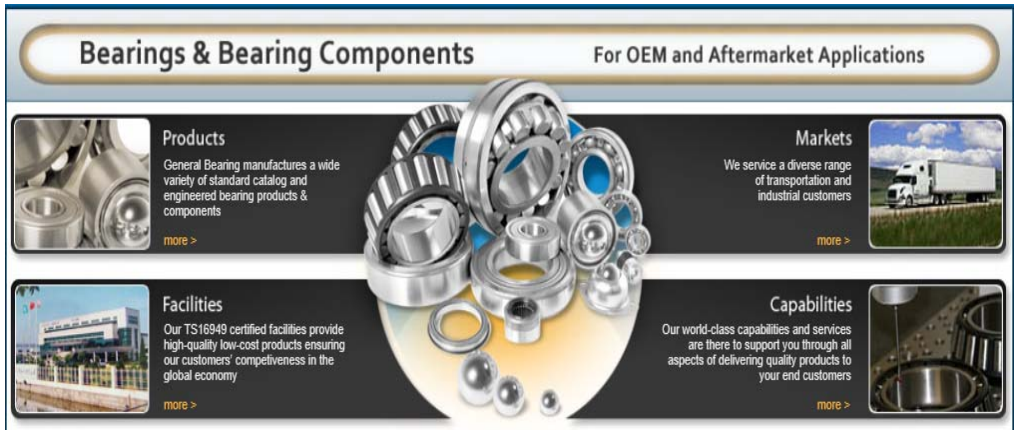


QAD Implementations in China

Mar 24, 2014

Presented By:
Jim McDonald, VP, GENERAL BEARING CORPORATION
Qing Fang (Tony), Consultant, Total Solution & Technology

Agenda

- General Bearing Corporation (GBC) Overview
- GBC's QAD implementation in China
- Q&A

General Bearing Corporation (GBC)

- **US Company**
  - Headquarters in West Nyack, New York
  - Business model designed to deliver cost-efficient quality
- **Manufacturing Facilities in China**
  - Ball Bearings, Tapered Roller Bearings, Rollers, Rings
- **World Class Quality**
  - All facilities are certified ISO/TS16949
  - All facilities are certified ISO 14001
- **Brand Names**

THE GENERAL® HYATT® Div. General Bearing Corporation

GBC Business Model

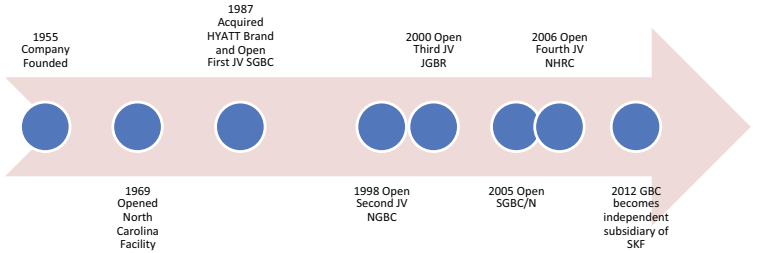
Headquarters and Support Services in New York, USA

- **Sales, Marketing, Customer Service**
- **Product Management**
- **Engineering, Product Design & Test Facilities**
  - Satellite Application Engineering / Sales support offices in Detroit; Ningbo,China; Germany; and Brazil
- **Forecasting, Planning and Logistics**
  - ERP planning
  - Safety stock inventory
  - Global supply chains
- **Quality Assurance Center**

GBC Highlights

- **Supplier to the automotive / HD truck industry**
  - Gearboxes – transmissions, transfer cases, power take off units, differentials
  - Accessory and Drivetrain – belt tensioners, drivetrain center support, steering systems, clutches, superchargers
- **Supplier to HD truck industry for wheel-end bearings**
  - 85% market share in the US OEM Truck Trailer industry
  - Specified by Mack, Volvo, International & Freightliner
  - Approved by Paccar
- **Serving customer locations worldwide:**
  - North America, South America, Europe & Asia

GBC Timeline



GBC China Operations

GBC Manufacturing and Engineer Center



TRB Plants
SGBC
SGBC-N



Engineering Tech Center
ETC



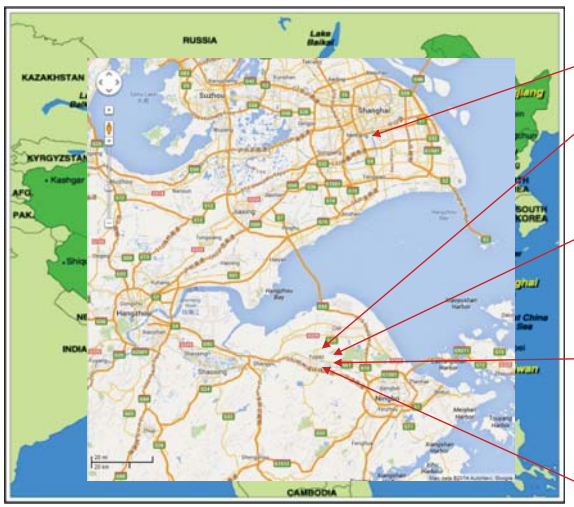
Ball Bearing Plant
NGBC



Roller Plant
NHRC

GBC China Operations

GBC Manufacturing and Engineer Center



TRB Plants
SGBC
SGBC-N



Engineering Tech Center
ETC



Ball Bearing Plant
NGBC



Roller Plant
NHRC



Shanghai Plant, Heat Treatment, Grinding and Honing





Automated Grinding/Honing



SGBC Ningbo Plant



SGBC Ningbo – Grinding Line



Automated Assembly Ring/Ball Matching



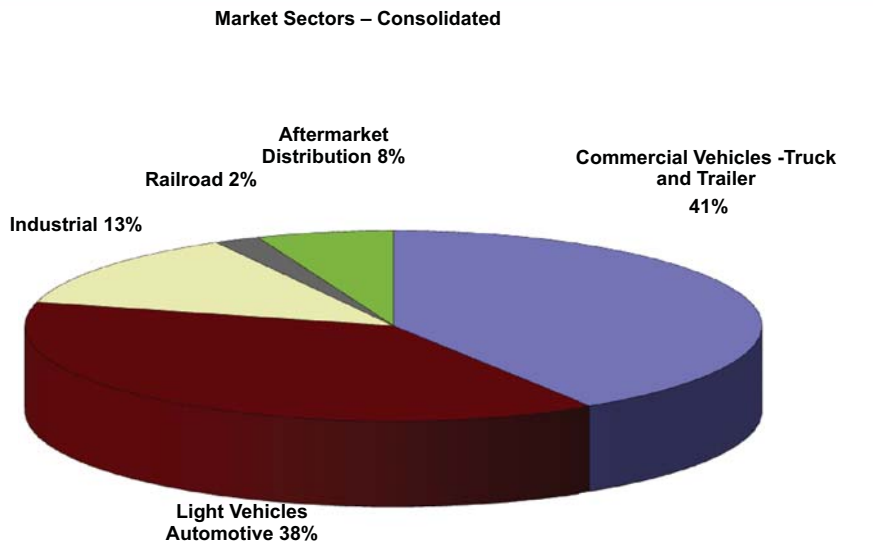
Ningbo, China



West Nyack, NY USA



GBC Sales 2014



GBC Major Customers

Aftermarket

Applied
Kaman Industrial Technologies KAMAN
MOTION INDUSTRIES Keeping Industry in Motion
BDI
MSC Industrial Supply Co.
McMASTER-CARR
FEDERAL MOGUL
BNSF RAILWAY
NS NORFOLK SOUTHERN
ELECTRO MOTIVE

Components

GKN PLC
Koyo
TIMKEN Where You Turn
Lufco, Inc.
SKF
NTN

Industrial OEMs

COOPER Tools
EZGO
KINZE
EATON Powering Business Worldwide
CROWN
FLINT & WALLING, INC.
Pitney Bowes
GD GARDNER DENVER
THE DOCUMENT COMPANY XEROX

GBC Major Customers

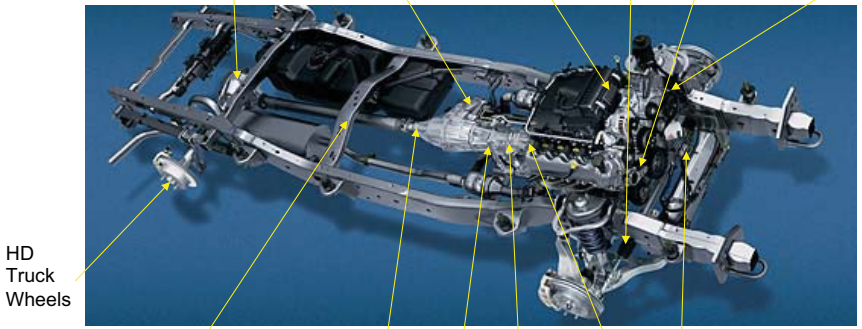
Heavy Duty Truck and Trailer

International
Freightliner Run Smart
Utility
Mack
CON-MET
VOLVO
FUSO
HYUNDAI Translead
STRICK
STOUGHTON
MOTOR WHEEL
Transcraft
MERITOR
SAF-Holland
GUNITE Corporation
CIMC
WABASH NATIONAL
WESTPORT
WEBB Webb Wheel Products
CHEETAH
WEMC
HENDRICKSON The World Rides On Us

Automotive

AAM
GETRAG Precision. Passion. Partnership.
MAGNA
EATON
GM
ZF
DANA
Ford
Litens automotive group
TRELLEBORG
DAIMLER
FIAT
Haldex
ZF Lenksysteme
neapco Innovative Driveline Solutions
GKN PLC

GBC Vehicle Capabilities



GBC Engineering

Design Capabilities - Engineering Tools

- Romax Designer Program

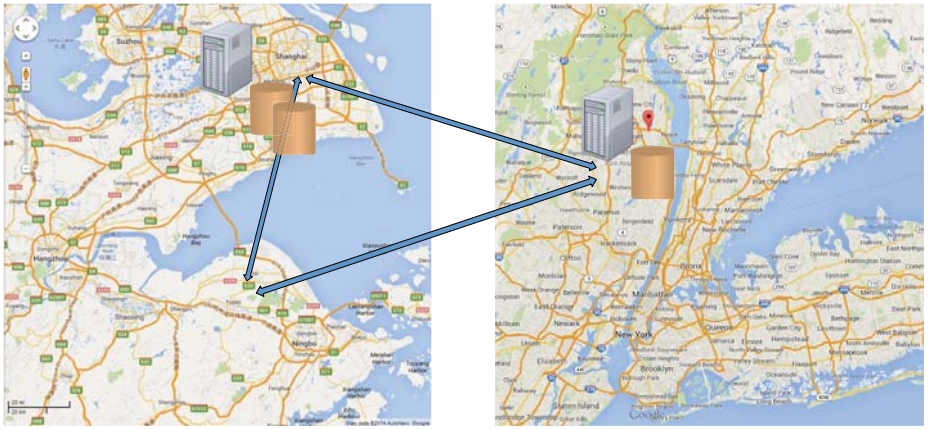


NPG-MPT-355 MTX,
Transfer Case,
GBC 91091 Ball Bearing



62TE Module,
Automatic Transmission,
GBC 91098/910999
Tapered Roller Bearing

Hardware Deployment



Project Background

3 factories (SGBC/SGBCN/GBIT)

- SGBC and GBIT (Shanghai)
- GBIT (Ningbo)
- Kick off on 05/01/2013
- Go live on 09/01/2013

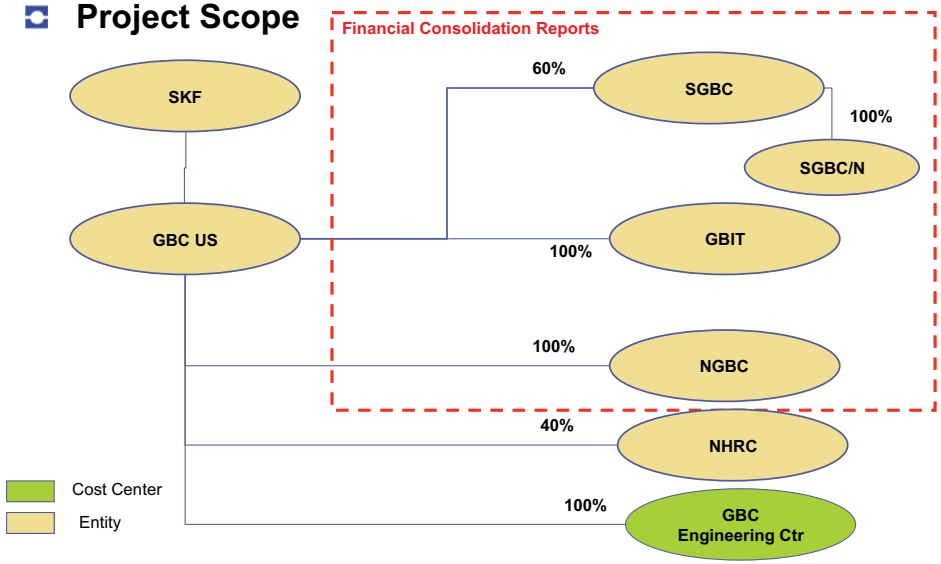
NGBC is on-going implementation

- Kick off on 12/01/2013
- Go live on 05/01/2014

More than 90 users use the QAD system.

Project Background

Project Scope

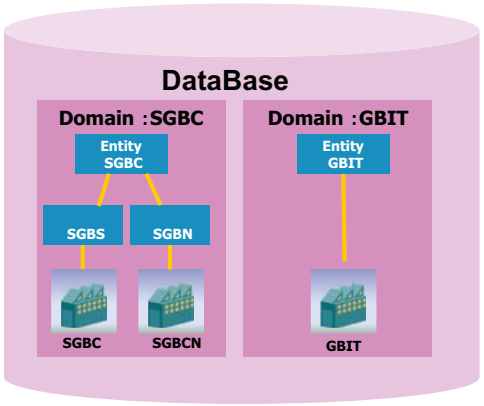


Solution: QAD Modules

- **QAD 2012 SE ERP System**
  - Sales Orders, Production Material Purchasing, Material Requirements Planning (MRP), Receiving, Inventory Control, Production Reporting, Shipping, A/R, A/P, GL
- **Release Management**
- **PSW module**
- **Fixed Asset (FA)**
- **Qxtend with GBC-NY and GBC China**

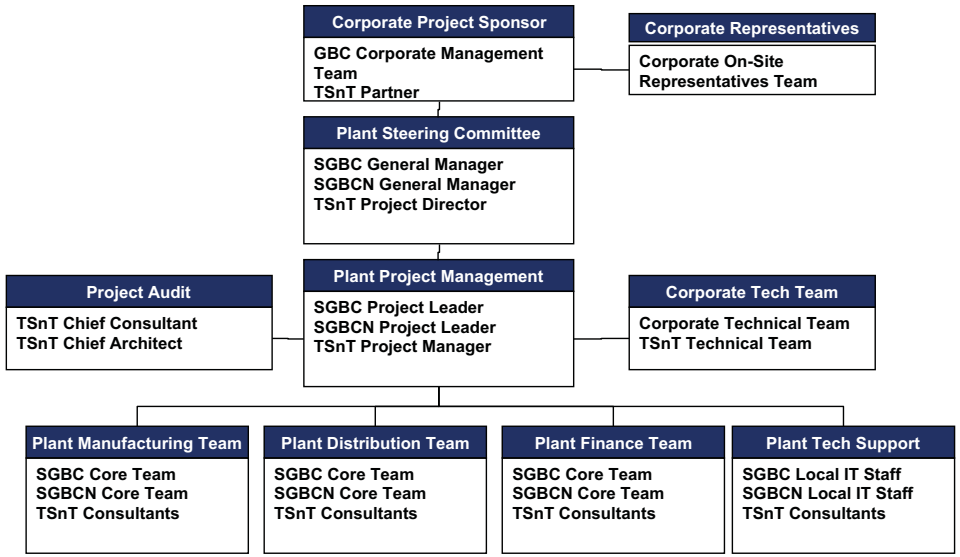
Solutions: Multiple Company Structure

- **Multi-Domain/Multi-Entity/Multi-Site**



Company	Domain	Entity		Site
SGBC	SGBC	SGBC	SGBS	SGBC
SGBCN	SGBC		SGBN	SGBCN
GBIT	GBIT	GBIT		GBIT

Analysis: Good Team Organization



Analysis: Key Success factors

- **Involvement of plant personnel, corporate key management , and staff**
- **Process Standardization for all sites**
- **Use of TSnT Smart™ for ERP system implementation methodology**
- **Phased plan with measureable milestones to minimize risks**
- **Scheduled project activities to minimize disruption**
- **Creativity in addressing process challenges and functional gaps**
- **Utilization of experienced consultants in industries and QAD package**
- **Our train-the-trainer approach made the training efficient and effective**

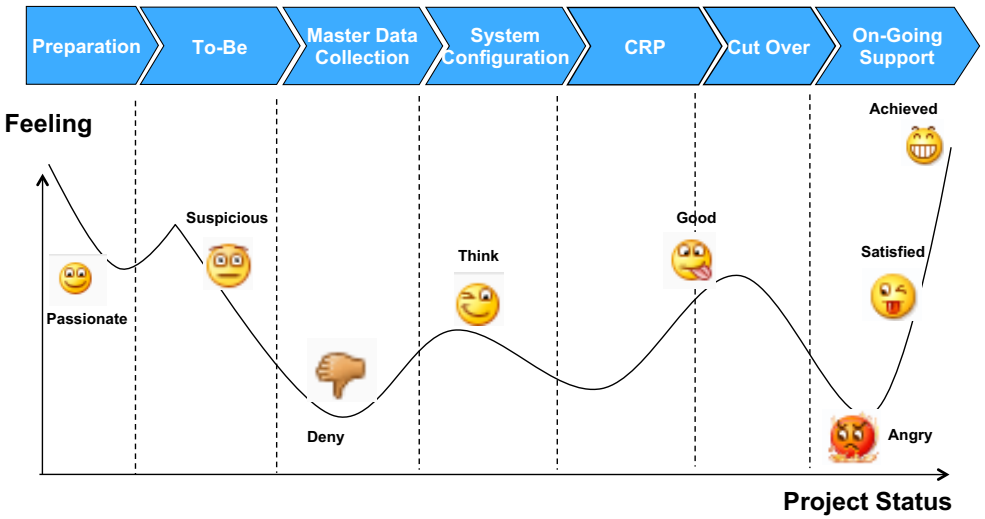
Analysis: Quality Assurance

- **Issue Management – We record, assign responsibilities, and track all the major issues until they are resolved.**
  - Risk Control methodology identifies and resolves potential risks at early stages
- **CRP test**
  - Three rounds Conference Room Pilot (CRP) Methodology
  - CRP plan and templates including data sampling, CRP process definition, activity schedule, testing expectation and results comparison
  - A complete set of CRP test scripts for user acceptance
- **Launch Readiness Assessment – Evaluate the system and processes, and make a go/no-go decision with respect to go-live.**
- **Post Launch Evaluation – Evaluate all the functions implemented to find the issues remaining and develop an improvement plan.**

Analysis : China Specifics

- **"Yes" does not necessarily mean Yes**
- **Language is still a barrier – Information losses in translation**
- **Managers like to use phone, instead of emails, to communicate**
- **Most Chinese are working hard. Over time is not problem, in general**
- **Get Knowing ERP, but may not know what exact it means**
- **"Data Management is a low level job"**
- **"It is not my job"**
- **Time conflicts**
- **Government Regulations**
  - VAT – Golden Tax System
  - Financial reporting

Project Face Status



Discussion

