



The Rendering of Descriptions to ERP's

ISO 8000 Data Quality Conference

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Battle Creek, Michigan

Bad Descriptions

- Bloated inventory, yet with backlogs
- Poor response to requests for quotations
- Difficult to find new sources of supply
- Maverick, free text or off contract spend
- Duplication in master data
- Poor accuracy information from ERP

Characteristics of good descriptions

- Read-ability / clarity
- Machine readable
- Search-ability
- Recognition
- Up to date
- Correctness
- Accuracy
- Timeliness
- Availability
- Usability
- Flexibility
- Maintainability
- Consistent
- Properties, UOM's, Currencies, Features, Restricted values
- Classifications
- Standard

In support of: 5 C's of Master Data

- **C**LEAN
- **C**ATEGORIZED
- **C**OMplete
- **C**USTOMISED
- **C**URRENT

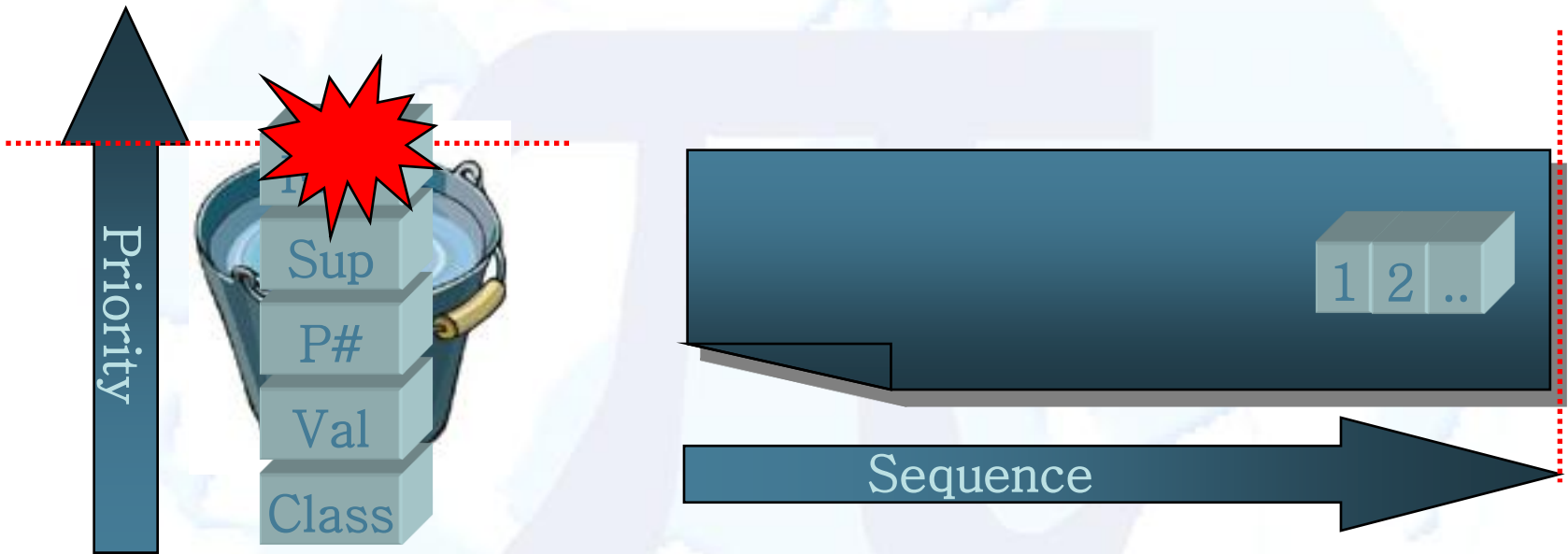
Must have standards

- Create standard descriptions with **searchable** key words
- Preservation of **integrity** and ownership of the data
- It must be an **open** standard
- Must have coded reply tables to accommodate **multilingual** environments
- “Create once **publish** many times”
- Avoidance of **duplicate** items entering inventory
- **Compare** and aggregate items programmatically
- **Manipulate** ERP short descriptions
- Risks of losing **control** of data
- **Reduce return** to supplier items due to wrong item delivery

Description rendering rules

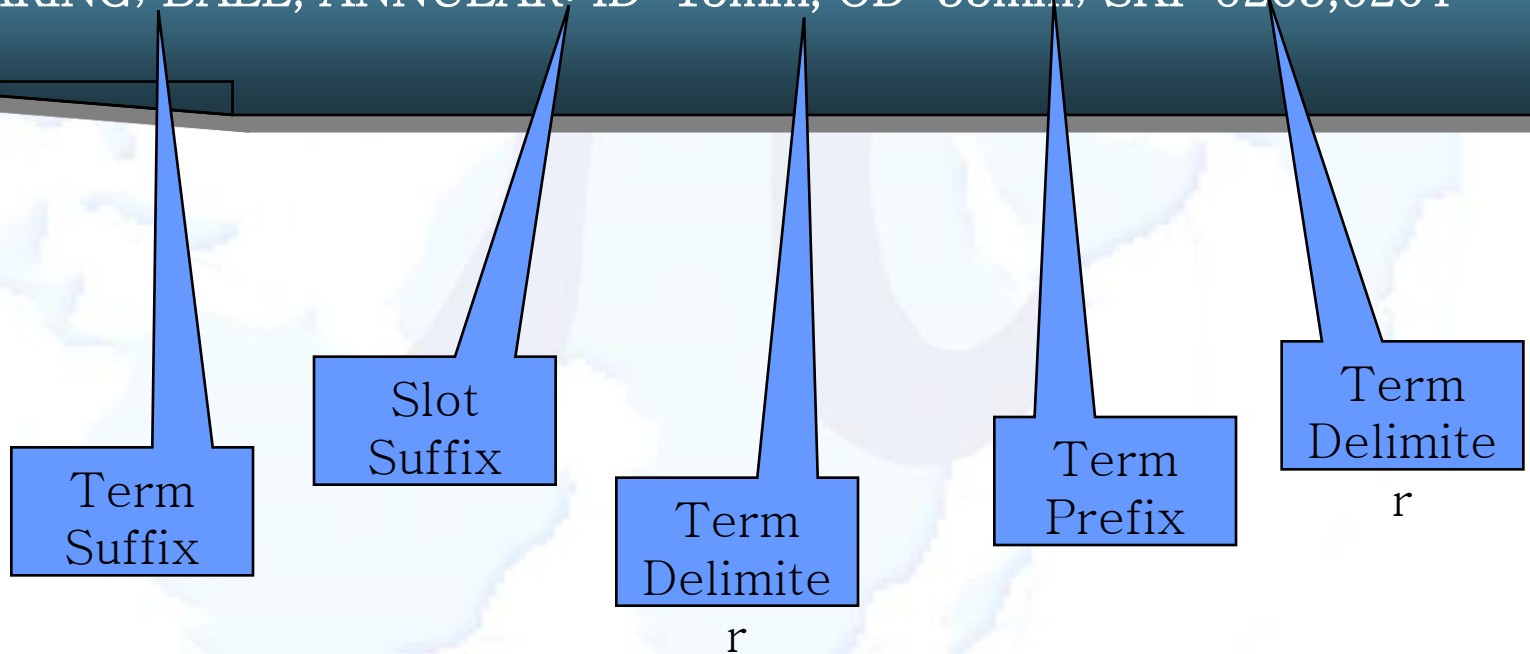
- Priorities
 - 1st determine **WHAT** will go into description
- All or nothing
- vs.
- Partial
- Structure
- Localization
- Sequence
 - 2nd determine **HOW** the description must be rendered with content

Priority vs Sequence



Structure: Prefix, Suffix and Delimiter

BEARING; BALL, ANNULAR: ID=15mm, OD=35mm; SKF 6203,6204



Localization

eOTD
IG

Corporate Description characteristics

Business
Unit

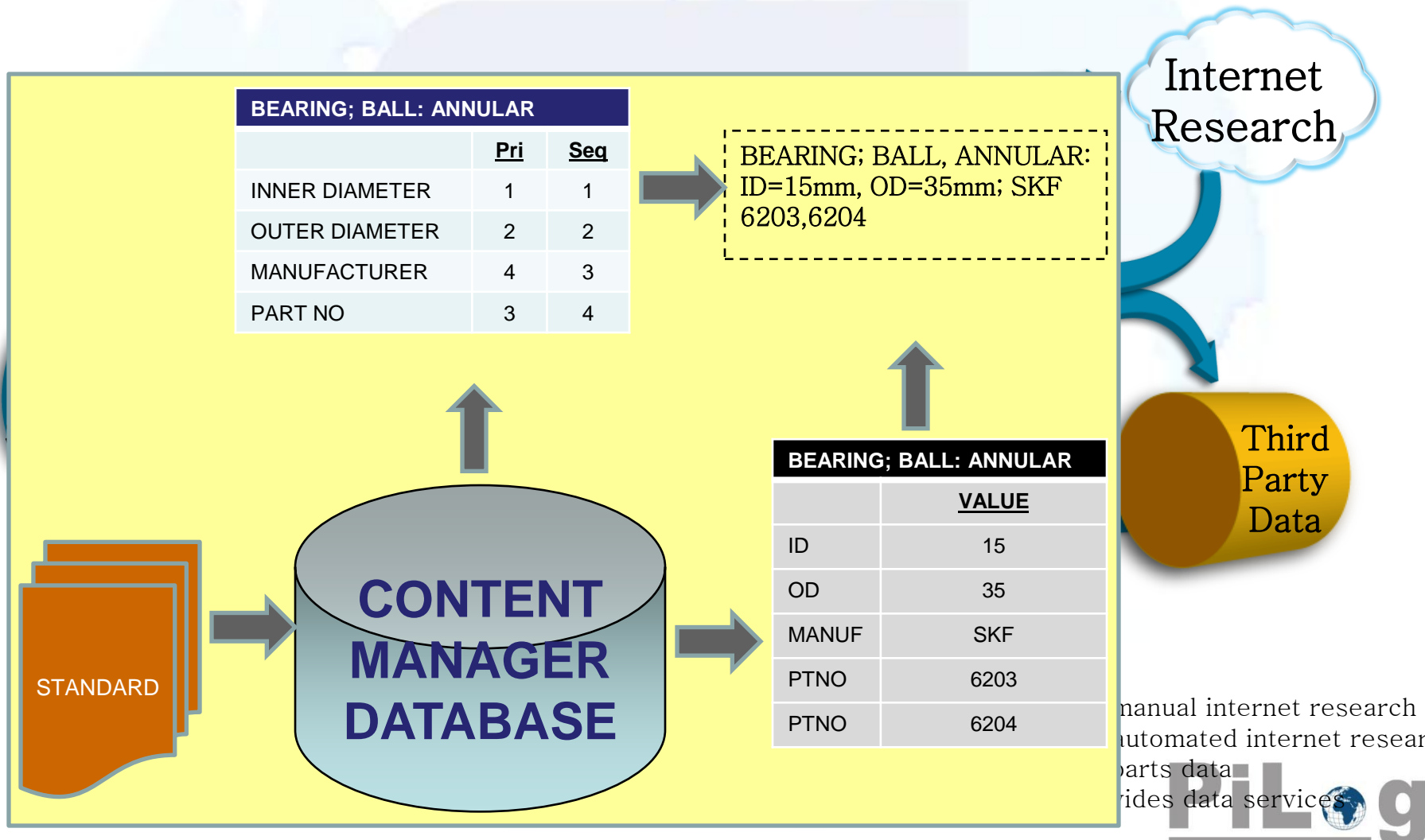
My way or the highway

Master
Data

This specific one
doesn't work any
other way

Item

In context



Example 1: Pipe Flange

MAT NO SN_EXX_0556494

ORIGINAL

FLANGE TYPE - WELD NECK RATING - CLASS 300 FACING - RAISED FACE BORE - EXTRA STRONG BORE MATERIAL - FORGED CARBON STEEL ASTM A350 GRADE LF2 NORMALIZED COLOUR CODE - YELLOW AND RED STANDARD - ASME B16.5 SPECIFICATION - SP-50-13

CLASS NAME

FLANGE, PIPE

FFT

EXTRA STRONG; STANDARD ASME B16.5; SPECIFICATION - SP-50-13

ATTRIBUTES	VALUE	UOM	SEQ	MAND
BORE	*****	N/A	6	I
COLOR CODE	YELLOW/RED	N/A	8	I
FACING	RF	N/A	7	I
MATERIAL	CS FORGED NORMALIZED	N/A	4	M
MATERIAL SPECIFICATION	ASTM A350 GR LF2	N/A	5	I
PIPE SIZE	*****	N/A	2	M
RATING	CL300	N/A	3	M
TYPE	WELD NECK	N/A	1	M

SHORT

FLANGE, PIPE:WELD NECK,CL300,RF;EXTRA

LONG

FLANGE, PIPE: TYPE: WELD NECK, RATING: CL300, MATERIAL: CS FORGED NORMALIZED, MATERIAL SPECIFICATION: ASTM A350 GR LF2, FACING: RF, COLOR CODE: YELLOW/RED; EXTRA STRONG: STANDARD ASME B16.5; SPECIFICATION - SP-50-13

Example 2: Strainer basket

MAT NO	SN_EXX_0763611			
ORIGINAL				
STRAINER,SCREEN TYPE - BASKET TYPE FOR RAISED FACE RATING - 150# MATERIAL - 304 STAINLESS STEEL NOTES - FOR USE WITH SCH 60 FITTINGS REFERENCE - DRAWING NUMBER 4560-00-A3-SPB-1 SPECIFICATION - SP-50-15C SPECIFICATION - SP-50-15				
OBJECT				
BASKET; STRAINER				
FFT				
FOR RAISED FACE; NOTE: FOR USE WITH SCH 60 FITTINGS; SPECIFICATION - SP-50-15C AND SP-50-15				
ATTRIBUTES	VALUE	UOM	SEQ	MAND
MATERIAL	SS 304	N/A		5 I
MESH	*****	N/A		4 M
PERFORATION SIZE	*****	N/A		3 M
RATING		150 LB		2 I
SCHEDULE	*****	N/A		6 I
TYPE	SCREEN	N/A		1 M
DOCUMENT NO	REV	ITEM	DOC TYPE	
4560-00-A3-SPB-1			DWG	
SHORT				
BASKET STRAINER:SCREEN,150 LB,SS 304				
LONG				
BASKET, STRAINER; TYPE: SCREEN, RATING: 150 LB, MATERIAL: SS 304; FOR RAISED FACE; NOTE: FOR USE WITH SCH 60 FITTINGS; SPECIFICATION - SP-50-15C AND SP-50-15; DWG: 4560-00-A3-SPB-1				

Example 2: Globe valve

MAT NO	SN_EXX_0344326			
ORIGINAL				
GLOBE VALVE, BUTT WELD ENDS TYPE - OS&Y, BOLTED BONNET RATING - CLASS 600 BORE - SCHEDULE 160 MATERIAL: BODY & BONNET - 1-1/4 CHROME - 1/2 MOLY CASTINGS - ASTM A217 GRADE WC6 FORGINGS - ASTM A182 GRADE F11 TRIM - F6 WITH STELLITED SEATS AND DISC BONNET BOLTING - ASTM A193 GRADE B16 STUD BOLTS WITH ASTM A194 GRADE 2H NUTS SPECIFICATION - SP-50-10				
OBJECT				
VALVE; GLOBE				
FFT				
BORE - SCHEDULE 160; SPECIFICATION - SP-50-10				
ATTRIBUTES	VALUE	UOM	SEQ	MAND
APPLICATION	*****	N/A	12	I
BODY MATERIAL	1-1/4CR1/2MO CAST OR FORGED	N/A	4	M
BODY MATERIAL SPECIFICATION	ASTM A217 GR WC6 OR ASTM A182 GR F11	N/A	5	I
BOLTING MATERIAL SPECIFICATION	STUD BOLT ASTM A193 GR B16; NUT ASTM A194 GR 2H	N/A	14	I
BONNET GASKET	*****	N/A	8	I
BONNET JOINT	BOLTED	N/A	10	I
CONNECTION	BW	N/A	3	M
DESIGN RATING	CL600	N/A	2	M
EMISSION CLASS	*****	N/A	15	I
OPERATED	*****	N/A	11	I
SERVICE	*****	N/A	13	I
STEM DESIGN	OS/Y	N/A	9	I
STEM PACKING	*****	N/A	7	I
TRIM	F6; BONNET 1-1/4CR1/2MO ASTM	N/A	6	M
VALVE SIZE	*****	N/A	1	M
SHORT				
VALVE GLOBE: CL600, BW, OS/Y, BOLTED; BORE -				
LONG				
VALVE GLOBE: <u>DESIGN RATING: CL600</u> , CONNECTION: BW, BODY MATERIAL: 1-1/4CR1/2MO CAST OR FORGED, BODY MATERIAL SPECIFICATION: ASTM A217 GR WC6 OR ASTM A182 GR F11, TRIM: F6; BONNET 1-1/4CR1/2MO ASTM A217 GR WC6 CAST OR ASTM A182 GR F11 FORGED; DISC/SEAT STELLITE, STEM DESIGN: OS/Y, BONNET JOINT: BOLTED, BOLTING MATERIAL SPECIFICATION: STUD BOLT ASTM A193 GR B16; NUT ASTM A194 GR 2H; BORE - SCHEDULE 160; SPECIFICATION - SP-50-10				



Example 4: Russian

MAT NO	SN_EXX_0556494			
ORIGINAL				
FLANGE TYPE - WELD NECK RATING - CLASS 300 FACING - RAISED FACE BORE - EXTRA STRONG BORE MATERIAL - FORGED CARBON STEEL ASTM A350 GRADE LF2 NORMALIZED				
CLASS NAME				
FLANGE, PIPE				
FFT				
EXTRA STRONG; STANDARD ASME B16.5; SPECIFICATION SP-50-13				
ATTRIBUTES	VALUE	UO	SEQ	MAN
BORE	*****	N/A	6	I
COLOR CODE	YELLOW/RED	N/A	8	I
FACING	RF	N/A	7	I
MATERIAL	CS FORGED NORM	N/A	4	M
MATERIAL SPECIF	ASTM A350 GR LF2	N/A	5	I
PIPE SIZE	*****	N/A	2	M
RATING	CL300	N/A	3	M
TYPE	WELD NECK	N/A	1	M
SHORT				
FLANGE, PIPE:WELD NECK,CL300,RF;EXTRA				
LONG				
CL300, MATERIAL: CS FORGED NORMALIZED, MATERIAL SPECIFICATION: ASTM A350 GR LF2, FACING: RF, COLOR CODE: YELLOW/RED; EXTRA STRONG; STANDARD ASME B16.5; SPECIFICATION - SP-50-13				

MAT NO	SN_EXX_0556494			
ORIGINAL				
ТИП ФЛАНЦА - ПРИВАРНОЙ - КЛАСС 300, ЛИЦЕВОЙ-СУПЕРПРОЧНЫЙ МАТЕРИАЛ - КОВАНАЯ УГЛЕРОДИСТАЯ СТАЛЬ ASTM A350 COPT LF2 НОРМАЛИЗОВАННАЯ ЦВЕТОВАЯ МАРКИРОВКА - ЖЕЛТЫЙ И КРАСНЫЙ СТАНДАРТ - ASME B16.5 СПЕЦИФИКАЦИЯ - SP-50-13				
CLASS NAME				
ФЛАНЕЦ, ТРУБНЫЙ				
FFT				
СУПЕРПРОЧНЫЙ, СТАНДАРТ ASME B16.5, СПЕЦИФИКАЦИЯ SP-50-13				
ATTRIBUTES	VALUE	UOM	SEQ	MAN
ОТВЕРСТИЕ	*****	N/A	6	I
ЦВЕТОВАЯ МАРКИРОВКА	ЖЕЛТЫЙ/КРАСНЫЙ	N/A	8	I
БЫТЬ ОБРАЩЕННЫМ	ЛИЦЕВОЙ	N/A	7	I
МАТЕРИАЛ	КОВАНАЯ УГЛЕРОДИСТАЯ С	N/A	4	M
МАТЕРИАЛ СПЕЦИФИКАЦИЯ	ASTM A350 COPT LF2	N/A	5	I
РАЗМЕРЫ ТРУБ	*****	N/A	2	M
РАСЧЕТНЫЕ ЗНАЧЕНИЯ	CL300	N/A	3	M
ТИП	ПРИВАРНОЙ	N/A	1	M
SHORT				
ФЛАНЕЦ, ТРУБЫ:ПРИВАРНОЙ,CL300,ЛИЦЕВОЙ;СУПЕРПРОЧНЫЙ				
LONG				
<u>ФЛАНЕЦ ТРУБНЫЙ</u> ; <u>ТИП: ПРИВАРНОЙ</u> ; РАСЧЕТНЫЕ ЗНАЧЕНИЯ: CL300, МАТЕРИАЛ: КОВАНАЯ УГЛЕРОДИСТАЯ СТАЛЬ, НОРМАЛИЗОВАННАЯ, МАТЕРИАЛ СПЕЦИФИКАЦИЯ: ASTM A350 COPT LF2, БЫТЬ ОБРАЩЕННЫМ: ЛИЦЕВОЙ, ЦВЕТОВАЯ МАРКИРОВКА: ЖЕЛТЫЙ/КРАСНЫЙ; СУПЕРПРОЧНЫЙ; СТАНДАРТ ASME B16.5;				

Practical lessons

- You cannot satisfy everybody
- There are a lot of very unique and valid requirements across the business
- Business units' requirements will conflict
- Must be able to accommodate an evolutionary process of maturation
- You must cater for multiple languages
- You must cater for multiple ERP's

Benefits of good descriptions

- **Faster** access to quality characteristic data
- Faster NSN assignment
- More **complete** records
- Better **search** resolution
- Fewer **duplicates**
- Fewer item **reduction** studies
- Higher customer **satisfaction**
- Savings in design and life cycle **costs**
- Reduced acquisition **lead** time
- Increased **supportability** and safety of systems and equipment





QUESTIONS?