

Nástroje vizuálního managementu

Karty KANBAN



Lean/Six Sigma VE SLUŽBÁCH

Vizuální Management:

Výsledková tabule zpracovaných objednávek				
Včera:	443	objednávek		1.61 Orders/Hr
Dnes:	440	objednávek		1.66 Orders/Hr
Hodiny	Plánováno	Stav plnění	+/- rozdíl	Poznámky
7-8	60	53	- 7	System spadl na 5min.
8-9	60	59	- 8	
9-10	45	48	- 5	
10 -11	60	61	- 4	protáhl se oběd
11-12	30	34	0	
12-13	60	59	- 1	
13-14	50	50	- 1	
14-15	40	41	0	
15-16	35	35	0	
Celkově	440	440		

System měření

- **Výtěžnost**

Quantity good vs quantity rejected

- **Odpad**

Amount of scrap by lot or run

- **Přepracování**

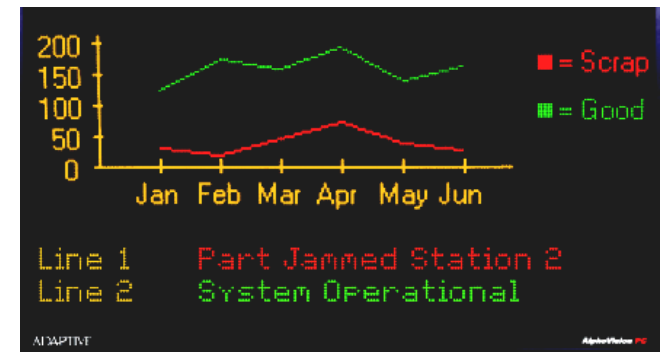
Amount of rework by lot or run

- **Přestavby a změny nastavení**

Amount of lost production time during job changeovers

- **Prostoje**

Amount of time the process was not available to produce



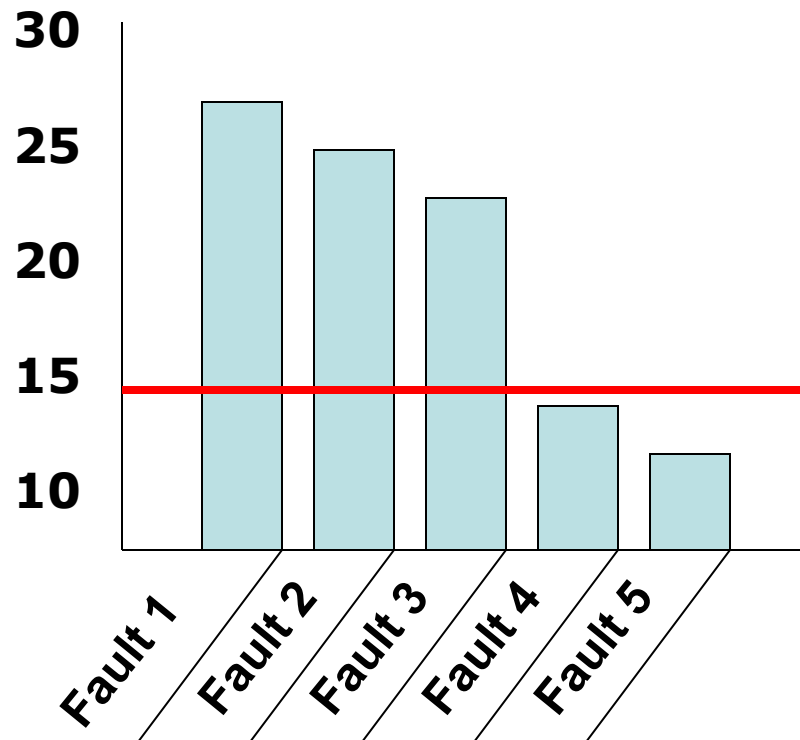
System měření

Current State **CURRENT METRICS**

- Metrics - Describe the metric.**
 - Define how it is measured.**
 - Define how it is calculated.**
 - Define frequency of metric.**
 - Describe how metric relates (flows up or drills down) to other metrics**
 - Define Metric ownership**
 - Define Metric reporting (media)**
 - Define Metric distribution**
 - Define Metric System Audits**

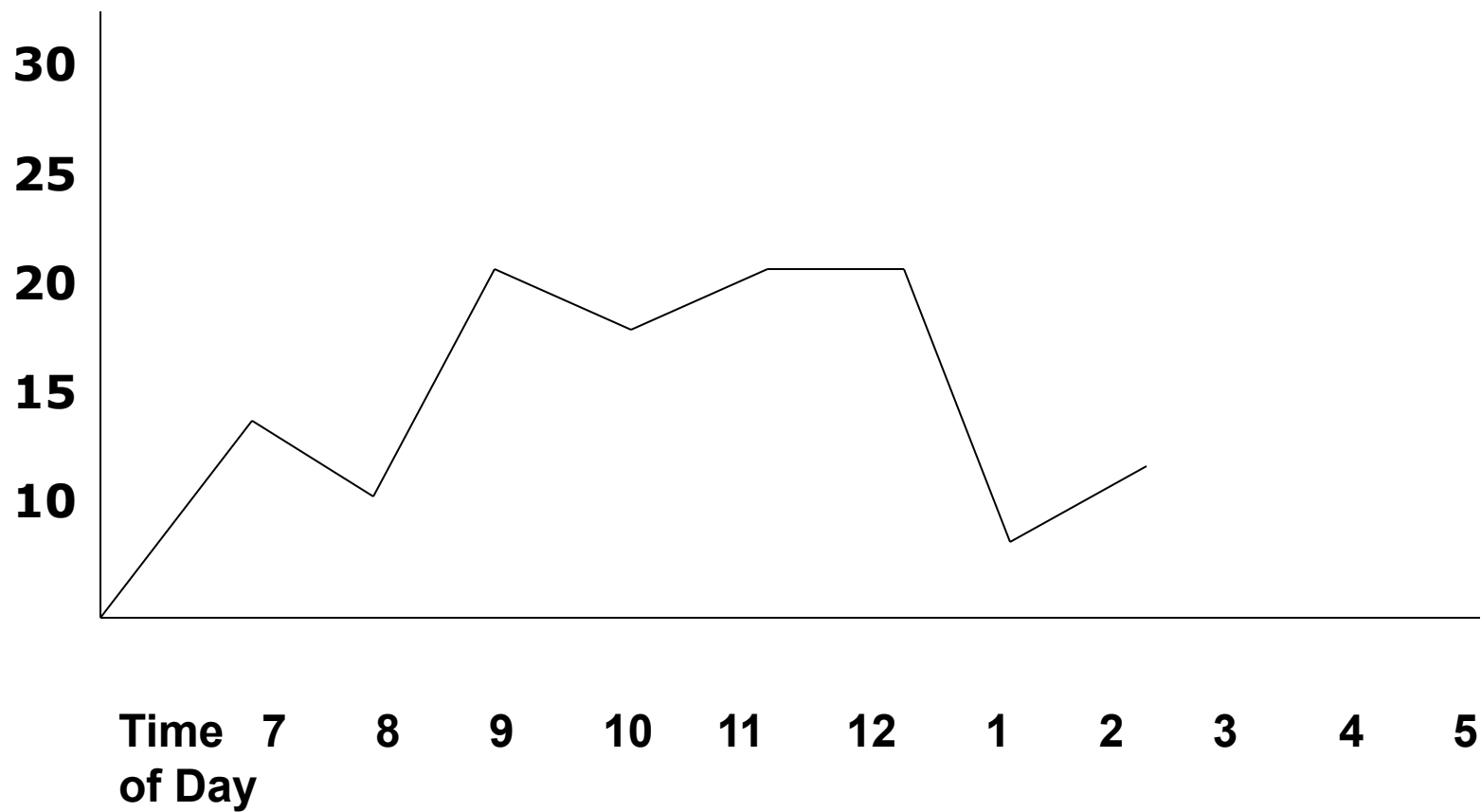
Typy měření

Paretův digram @ Pracovní stanice nebo stroj



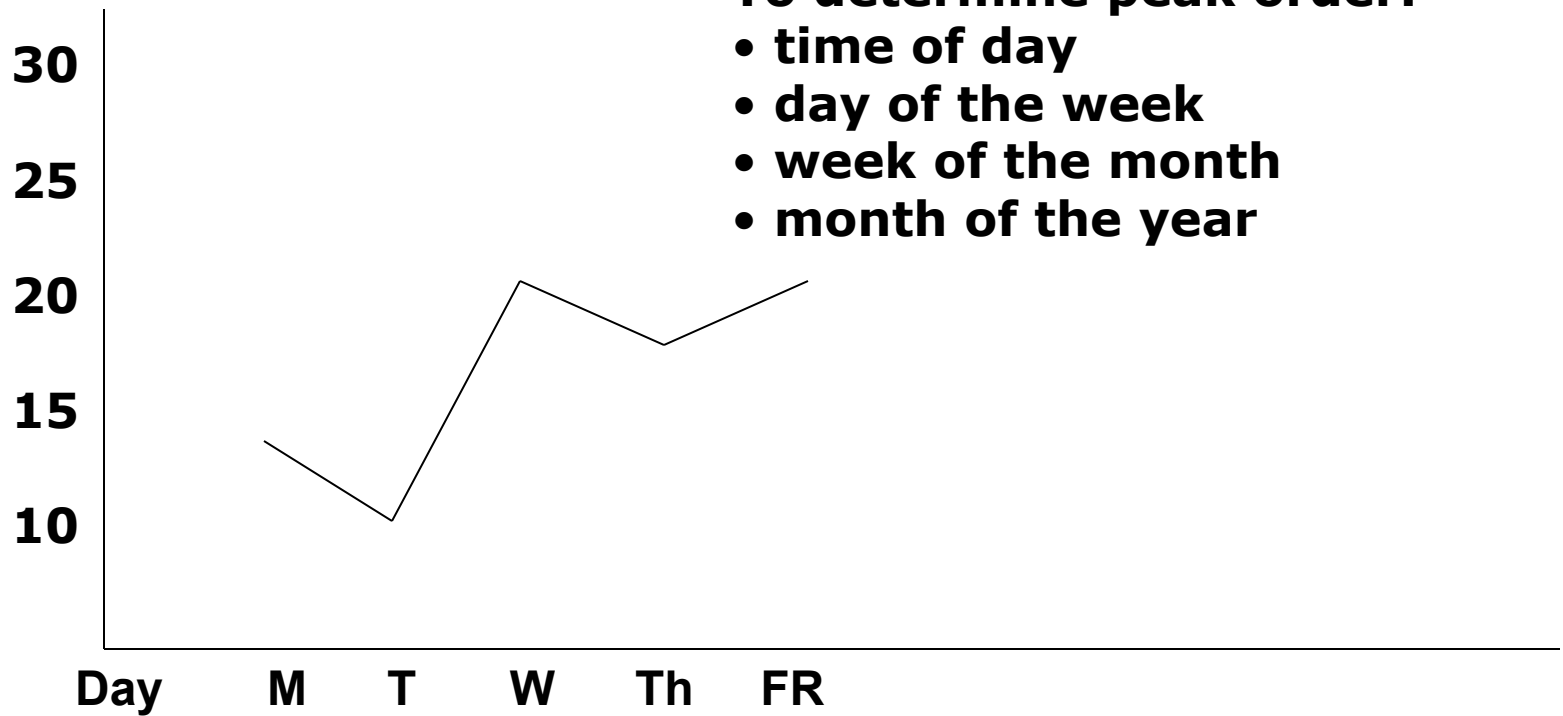
Typy měření

Run Charts



Typy měření

Run Charts



**Extend out this measurement:
Why?**

To determine peak order:

- time of day
- day of the week
- week of the month
- month of the year

OEE Measurements:

The OEE improvement measurement is the product of three different measurements:

- 1. Equipment Availability (EA)**
- 2. Equipment Efficiency Performance (EEP)**
- 3. Equipment Quality Performance (EQP)**

Poslání

Posláním naší společnosti je ...

Cíle pro rok 2005 jsou:

- 1.
- 2.

Pro více informací
nás kontaktujte

www.bec.xxx.com

800-321-6763



MACHINE STOPPED

PARTS COUNT 980

CONVEYOR STOPPED
PART JAMMED

CONVEYOR*	RUNTIME	SHIFT	STATUS
Tool Line 1	2433	2	84%

 CAUTION !!
Hard hat area

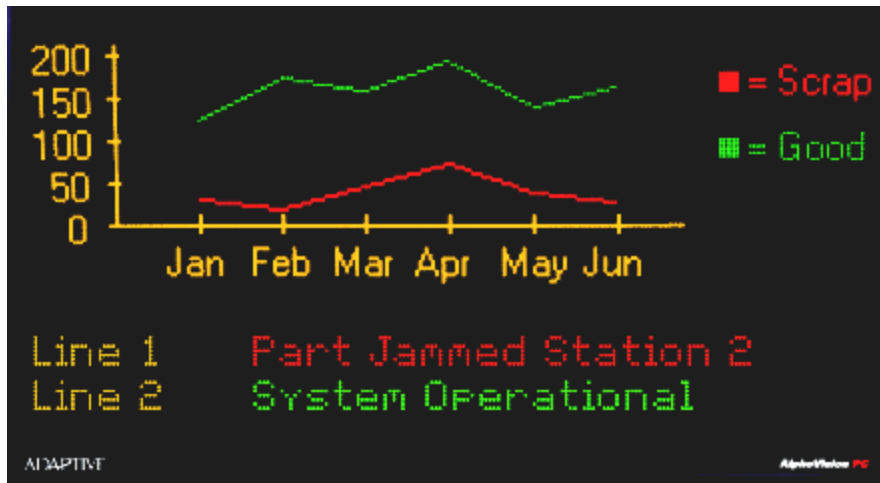
DOCK	LOADER	WAREHOUSE	JOB#	STATUS
1	Bob C.	AV-Sec 5	40821	33%
2	Tom H.	AV-Sec 3	11339	Done

PRODUCT NO.	TOTAL	REJECT	PERCENTAGE
FM-256128	106	03	2%
FM-19296	304	08	3%
FM-22480	94	01	1%

PART	GOAL	ACTUAL
3Z5H	3225	2011
4N7Y	1000	0622
2A9G	0875	0713

OSHA VISIT
September 4-6

CLIENTS	ORDER	STATUS	VIA
Genworks	GK4091	Open	UPS
BlockCo	BC4102	Delayed	FedEx
Sun Mfg	SM4107	Shipped	ABF



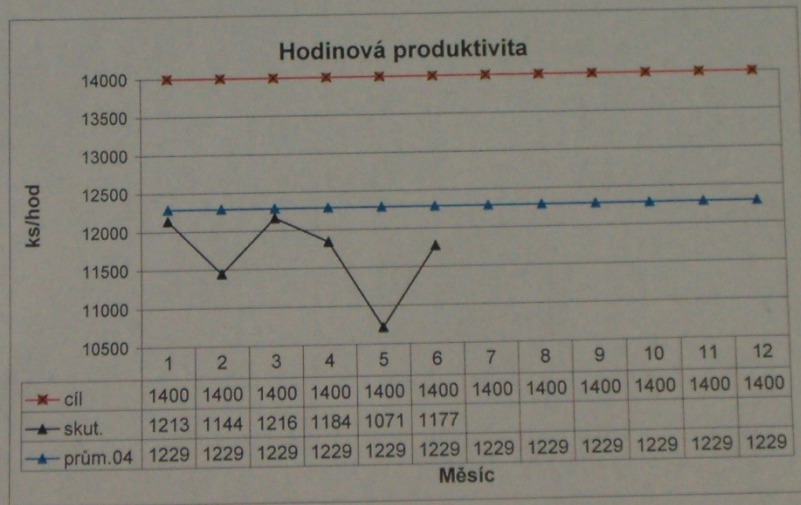
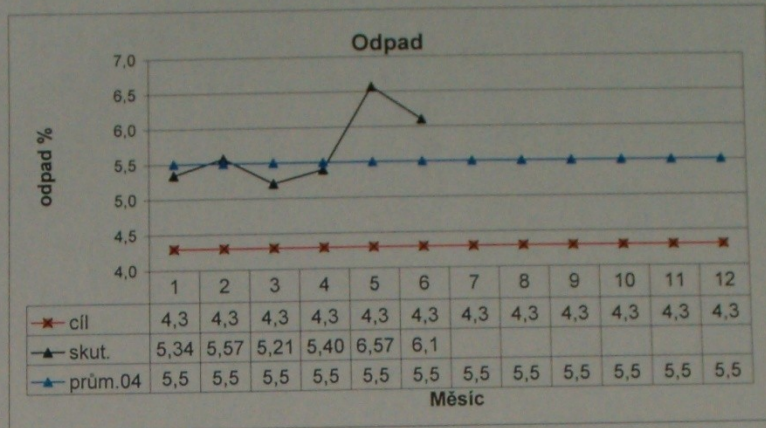
PART #	QUAN	DESTIN	DATE
125-RJ	45	MKE	4/11
215-BZ	72	CHG	4/15
762-AJ	69	DET	4/18
125-RK	115	STL	4/12
643-BR	35	GRB	4/9

ADAPTIVE AlphaMetric PC



GOAL: 2250

TEKMA - DP 4



Před a po 5S

APMG – závod Beauharnois: Čistička kelímku

Poté



APMG – závod Beauharnois: centrální pasáž

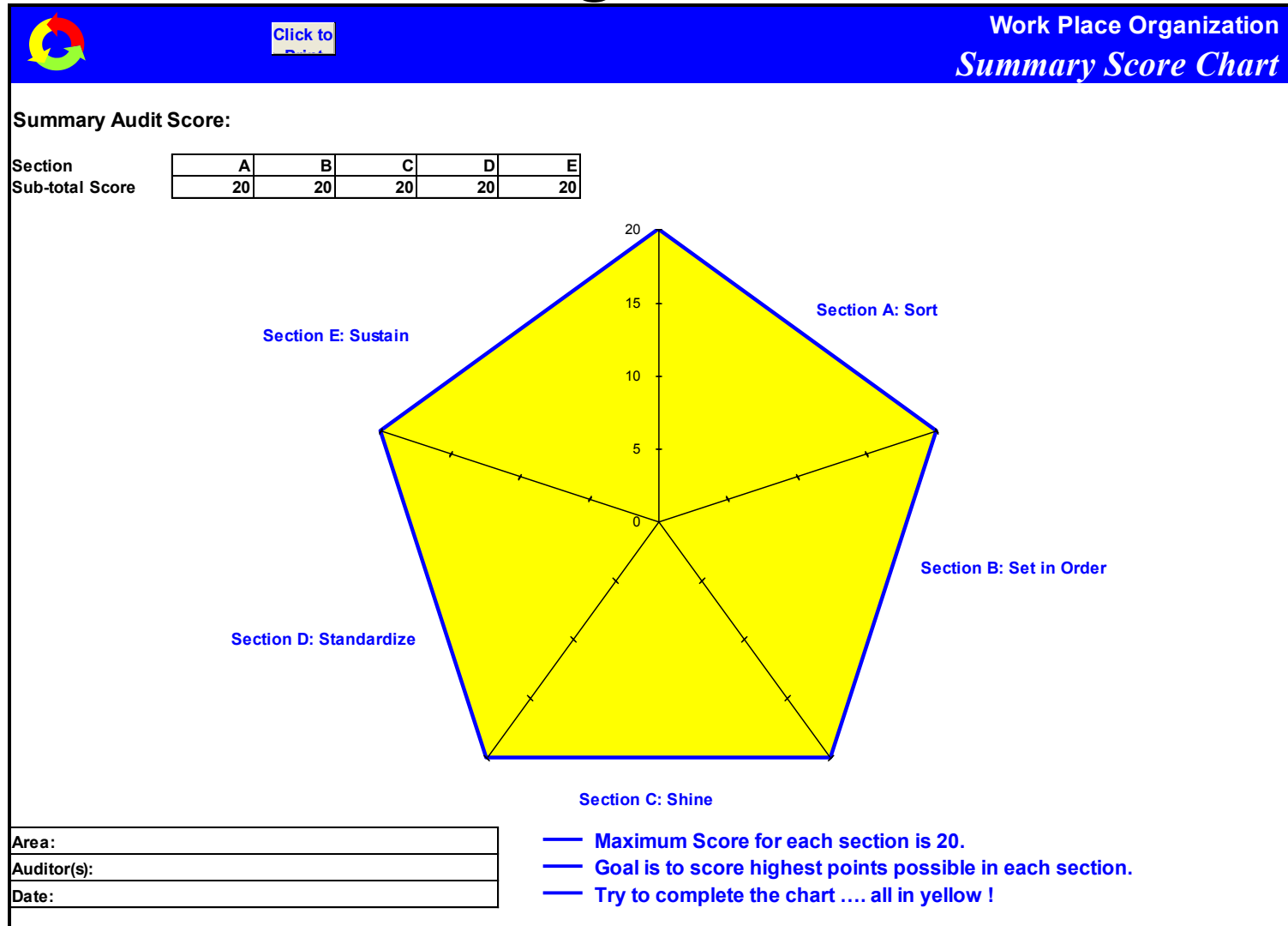
Před



Poté



5S “Radarový” neboli “pavučinový” graf

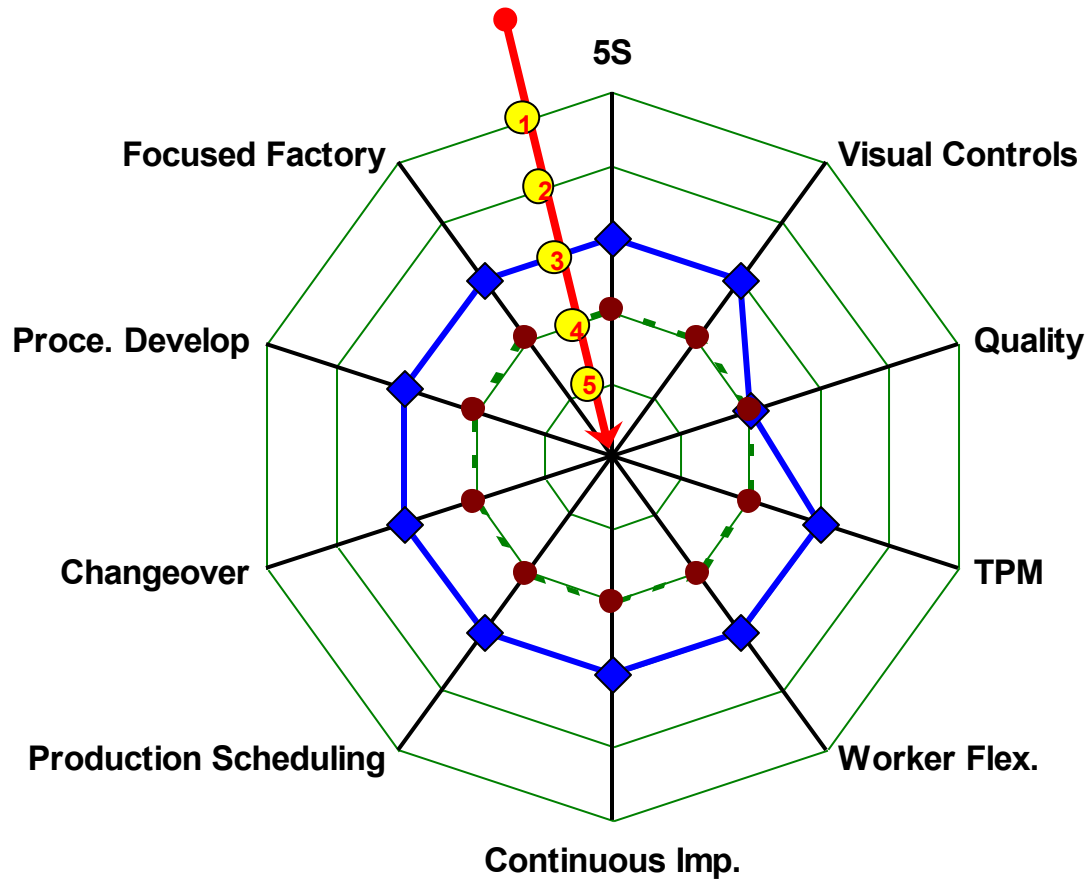


Lean Sigma Road Map

Target - World Class

European :

12/1/2003



Actual
B 1 2 3 4

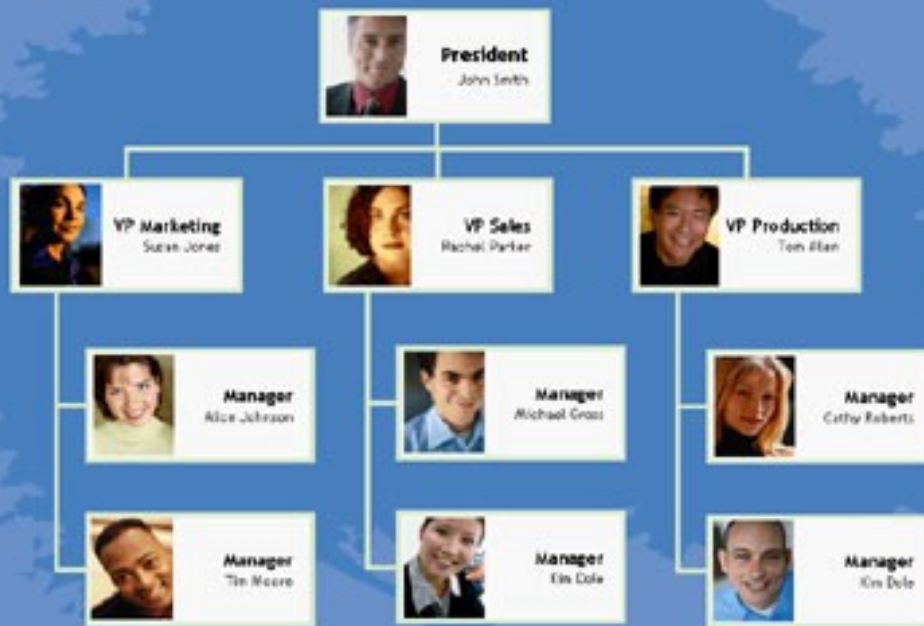
Goal

Nástěnka auditu 5S

MOTOROLA CONTENDER POWER 5-S SUSTAIN BOARD					
AREA	Mon. 10am/2pm	Tues. 10am/2pm	Wed. 10am/2pm	Thurs. 10am/2pm	Fri. 10am/2pm
SUB-ASSY 1-3	Oscar Brite		Rosalio Medina	William Ayala	Hue Bui
SUB-ASSY 4-7	Gloria Ramirez	Antonio Collins	Araceli Mereno	Mohammed Mohamed	Ahn Phan
PWR LINE 1	Jose Perez	Santos Arce	Masoud Elmouy	Juan C.	Guillermo Lopez
PWR LINE 2	Oscar Lopez	Lupe Perez	Luis Vargas	Juan Z.	Condlerio V.
Operator Audit Every Tues. & Thurs.	Supervisor Audit Every Fri.		Integr. Mgr. Audit Every Other Weds.		Director Audit First Monday each Month

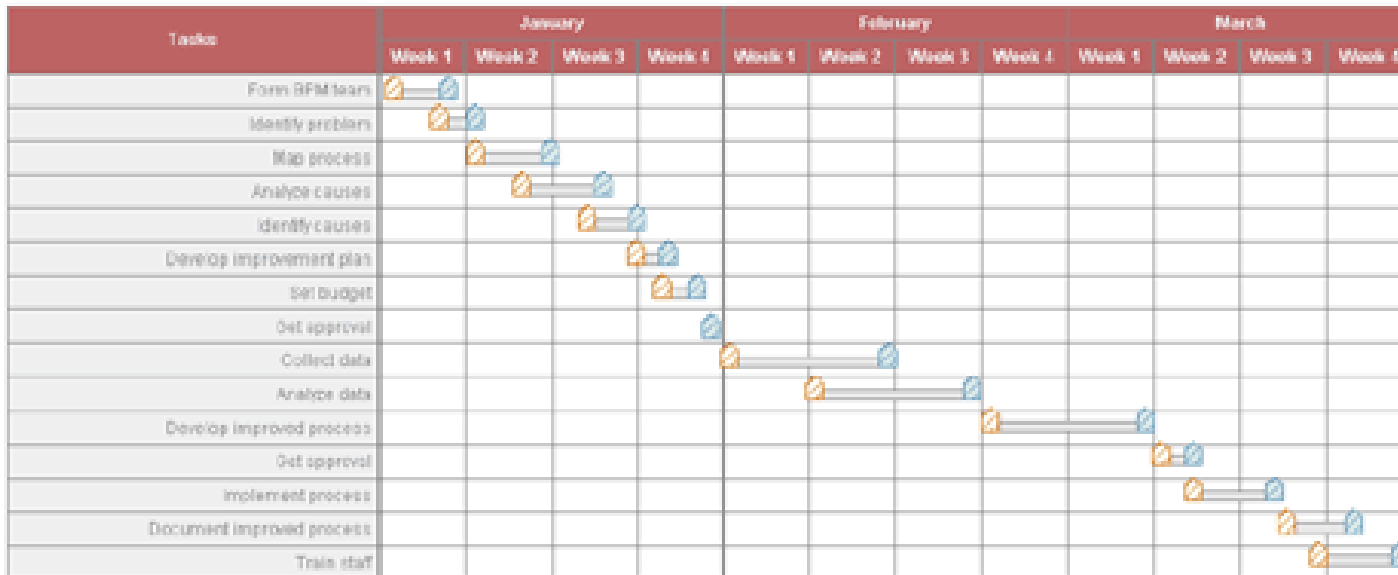
Vedení podniku

The Business Company, Inc.



Gantt diagram

GANIT CHART - 3 MONTH TIME LINE



KEY

- Milestone marker - start
- Milestone marker - end
- Gantt bar

Key Dates			
1/7	Form team	2/4	All data collected
1/9	Identify problem	2/21	All data analysed
1/14	Map process	3/7	Mapped improved process
1/20	Identify causes	3/13	New process map approved
1/27	Develop improvement plan	3/21	New process implemented
1/29	Set budget	3/28	Staff trained
1/30	Budget and plan approved		