

Before (July 18)

Print performance stagnates

- No make ready script
- No training
- A lot of interruptions

Goals & key figures

- No key figures for print machine available
- No goals defined



Potential analyze "high make ready time" Abnormalities

Make ready procedure

Filling Ink be

Scratches in plates (3-5 times / shift / machine / week)

Assistant has some different activities (logistic, searching

H H Rüstdrehbuch üstdrehbuch XL 106-8-No standardized setup process (no make ready script, each job has a different procedure) ion tro 1. Abrag 120 Bogen ca.(min is 2. Abzug 120 Bogen ca H Interruption "Searching plates and scratches" Problem Es entstehen hohe Sochaufwände um die benötigten Platten zu finden. Durch Umstellen entstehen Kratzer. Reason ot assigned to the machine on a plate cart makes it diffire Multiple i New plate cards (each job have a carn place 450h x 250€ = 112.500€/year H erei Klampfer | SX 52-5+1 Ø Druckgeschwindigkeit in Bogen/h

Achievement of goals XL106-6-P+L current 02.08.19 start 31.10.18 goal 31.03.19 13430 Bg/r Running speed 12969 Ba/h 14000 Ba/h 8% Make ready time 19 min 26 min 43 min -56% 263 Bg Make ready waste 401 Bg 250 Bg/h -38% 2715 Bg/h 4500 Bg/h 66% 3433 Bg/h Net productivity

After (July 19)

Improvement process implemented

- Make ready script available
- Improvement process established
- Problems / interruptions are resolved regularly

Goals & key figures

- Key figures available •
- Goals defined with the • printers and the executives

change in value since the start in %	difference to goal in %					
4%	Achievement of goals XL 106-8-P 18k					
-40%	Running speed	31.01.19	30.04.19 + %	02.08.19	since the start in %	goal in %
-34%						-10%
26%	Make ready time	25 min	20 min -20%	18 min	-28%	
	Make ready waste	324 Bg	300 Bg -7%	295 Bg	-9%	-2%
	Net productivity	6277 Bg/h	6500 Bg/h 4%	6560 Bg/h	5%	1%



Before (July 18)

Area concept

- Machine locations are not according to material flow
- Long distance to the next workplace
- The buffer locations were not close to the machine
- No paths and buffer were marked
- Missing area concept in the whole hall
- A lot of waste everywhere

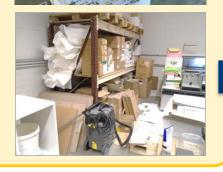












Material flow







After (July 19)

Area concept

- The location of 80% of the machines has been changed
- Machines are oriented according to material flow
- Much shorter distance to the next workplace
- Paths are marked
- The buffer locations are close to the machine
- Processes are defined
- The hall is clean







