pilot AEROnet

Learning Station Analysis

The procedure ‘LSA’ (Learning Station Analysis) was developed to help arrange the training at the learning places in an effective way in accordance with the business needs and operating processes

Andreas Saniter
Laure Jimenez
Juergen Ledl
Alain Savoyant
Rainer Bremer

ECER, Main Conference 2006
Geneva, Switzerland / Suisse / Svizzera
2006, September 13th – 16th

Index

1. Motivation
2. Analysis of (possible) Learning Stations
3. Central Questions
4. Documentation
5. Optimising – German results
6. Ideas for tasks to check the success

Motivation

- Company's interests and functions should be the reference for technical training
- A transparent correlation between the Typical Professional Tasks (TPT) and the Learning Stations
- Systematisation of VET
- Context-related experiences
- Detecting new workstations as possible learning stations
- Pedagogical arrangement of the learning steps & stations
- Certificates concerning the absolved learning stations

LS-Analysis

- A TPT always describes a class of tasks - a Learning Station Analysis refers to a chosen working place.
- Skilled worked is analysed – but from the viewpoint of vocational education and training.
- The meaning and the function of the chosen working process in relation to the whole business process are integral part of the analysis.
- Of special interest are the learning potentials, that can be utilised when using this working place for vocational training.
- No personal data (competencies or engagement) is recorded.

How?

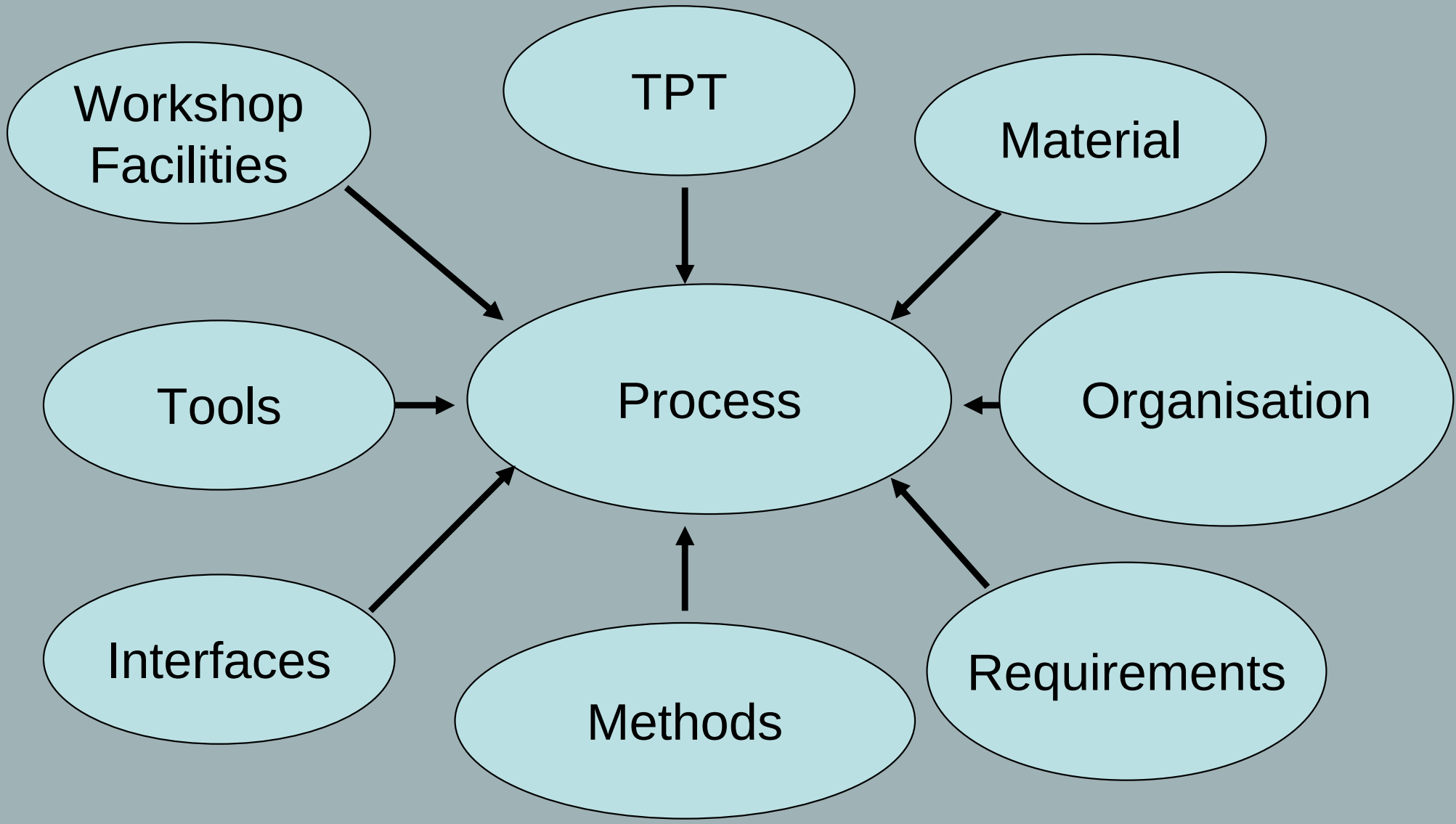
- A team of 2 – 4 trainers, workers and researchers analyse the working station by observation and inquiry.
- The analysis should be announced by permission of the area manager.
- Data is recorded on audiotapes and / or by taking notes.
- Usually an analysis takes 2-4 hours (depending on the working place) – documentation has about the same time need.
- Questions are orientated by a guideline (see next sheet).
- Product: A documentation (size: about 3 page) in form of a standardised table.

Central Questions

- Business and working process
- Working place (surrounding)
- Methods and materials of the working process
- Tools and workshop facilities
- Organisation of skilled work
- Special requirements
- Correlations to other places or TPTs
- Experiences with vocational education at this station

pilot AEROnet

Concept-Map (Part of documentation)



Documentation (Central aspect)

Vocational training	vocational year / duration / number of trainees	
	requirements / previous stations	
	What should they learn?	
	specifics	
	experience with trainees & young skilled workers	
	assistance / working tasks	
	Is the existing potential used?	
	possibilities of improvement	

LS-Analysis: Optimising

Proposals concern 3 different levels:

- The concrete learning station:

  i. e. not necessary, spend a longer time here, another organisation due to shifts, focus on survey or depth
- The organisational combination:

  i. e. station A after B, C equivalent to D
- The content-related combination:

  i. e. when focusing on tools at station X, then one should focus on methods at station Y.

Generalised Findings

- We analysed about 60 Learning Stations at 5 different German sides – all of them had a high learning potential.
- All skilled workers, managers and trainers we talked to were very interested and engaged.
- The Learning Stations are in close relation to the Typical Professional Tasks.

- => Possible Optimisation?

LS-Analysis: Chosen results (examples)

- The trainees should stay for longer periods at a station.
- They should have there own tools.
- They should start earlier with the “real work”.
- Experiences of the trainees should be transparent to the skilled workers.
- There should be a closer relation between learning steps of the same content area.
- Less “specific tasks”.
- Careful attention of the different aspects: Material, methods, tasks, organisation…

LS-Analysis: Check

The success of the completed learning station is checked:

- A set of short “Evaluation Tasks” (hear next presentation) specified for the respective Learning Station.
- Some apprentices have to solve one of these tasks.
- We calculate the rate of used learning potential by measuring the approach of the solutions.
- Examples for Tasks:
  - Purpose of workshop facilities
  - Position of this station in the business process
  - Finding crucial aspects in technical drawings
- So it is possible to decide if the potential is used and, if not, if the apprentice failed or it is a structural problem.

Thank you for your attention

Andreas Saniter
Laure Jimenez
Juergen Ledl
Alain Savoyant
Rainer Bremer

Learning Station Analysis

All presentations and further information on:

http://www.pilot-aero.net/