

CBTA

Competency Based Training and Assessment

ICAO: new qualification standards on basis of competency targets and realistic tasks for:

- Air Traffic Safety Electronics Personnel
- Aircraft Maintenance Personnel
- Flight Operations Officer
- Air Traffic Controller
- Pilot

Competence as a combination of „KSA“

- Knowledge
- Skills
- Attitude

Competency Based Training and Assessment CBTA
is nothing new... it's a simple and clear concept

The risks in education and training

- Wrong stakeholder defines competency targets
- ... unrealistic tasks are trained and assessed
- Knowledge centered training is quite simple
- ... skills and attitude centered training is not
- Same for the assessment, easy handling of multiple choice questions does not assess competence
- The ability to keep control about the training and assessment processes needs oversight and mentoring

Competency need analysis

1. What are the typical tasks of the target group?
2. What are the human resource related risks during the execution of tasks?
3. Which task related competencies shall be demonstrated?
4. Which tasks and competencies are important for the future?

Competency targets, ICAO Doc 9868

- Application of Procedures and Regulations
- Technical Expertise
- Process Improvement
- Communication
- Situation Awareness
- Workload Management
- Problem Solving and Decision Making
- Leadership and Teamwork

OCC specific task examples

1. Assessment of airport and aircraft suitability: weather, NAV-aids, procedures, limitations
2. Assessment of operational risks from CAMO and MRO processes and aircraft downtime planning
3. Assessment of operational risks in relation to crew capacity, reserves and limitations
4. Analysis of inflight diversion scenarios: weather, airport suitability, fuel situation, handling, costs

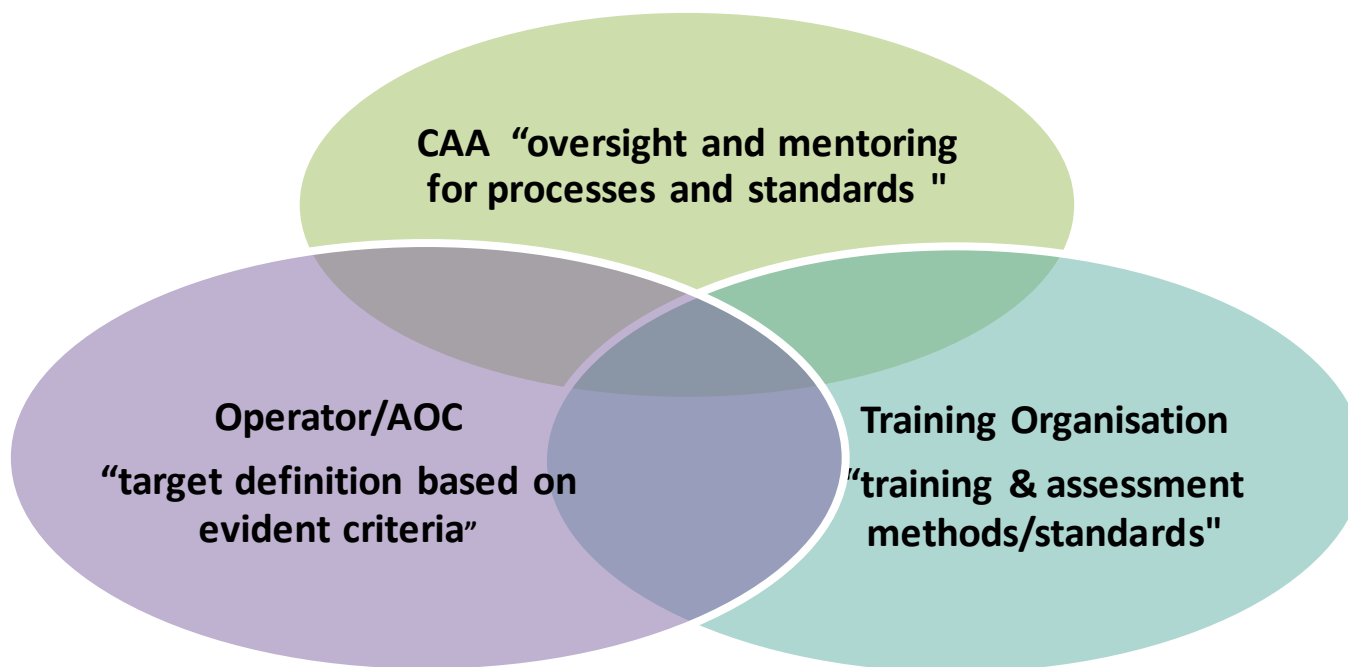
Assessment requirements

1. Assessment shall be based on realistic tasks
2. Assessment of Knowledge and Skills and Attitude
3. Assessment shall ask for context
4. Assessment shall be process related
5. Assessment shall be dialog based

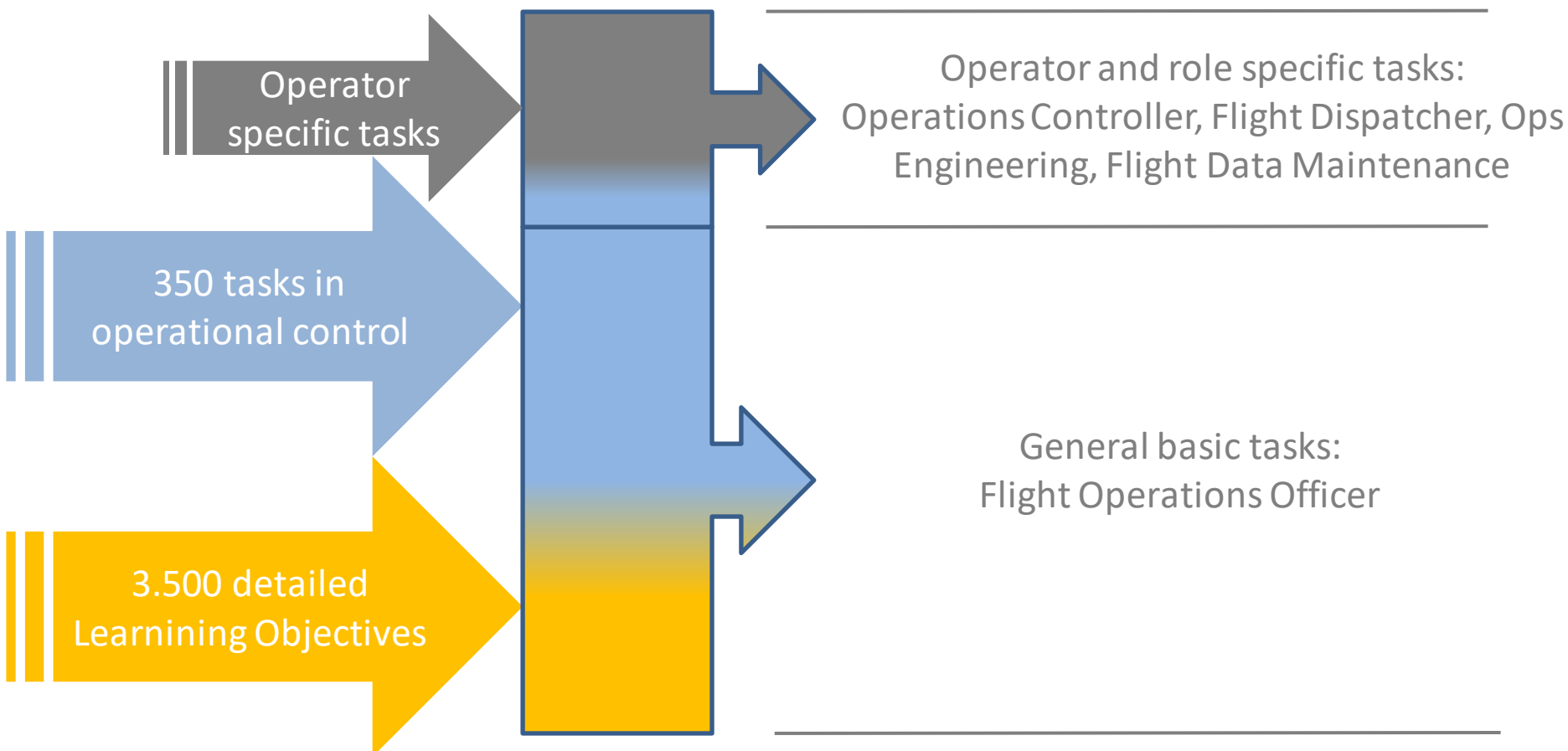
Training methods and standards

1. What are the KSA-prerequisites (learning objectives) for the execution of tasks?
2. How to generate and execute realistic exercises?
3. How to exercise and assess attitude?
4. How to control adequate instructor, material and documentation standards in a flexible CBTA system?

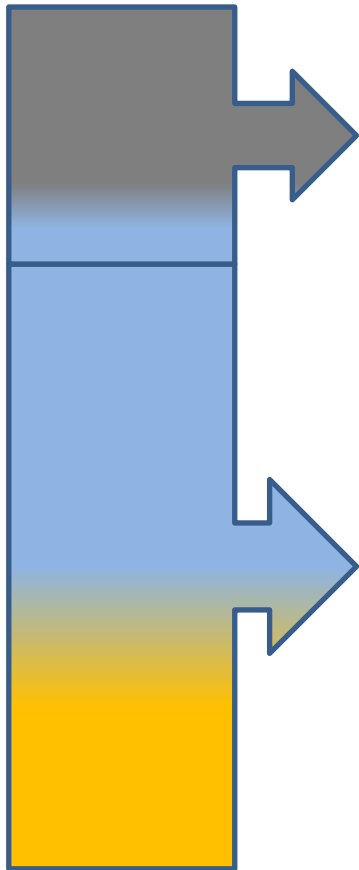
The stakeholder in CBTA



CBTA level in Operational Control



Competence development and control



Frequent competency assessments allows

- individual training pattern based on competencies
- shortcuts are possible

Unique standard course schedules are not mandatory

Before training start some prerequisites shall be checked

- basic math and physics
- ability to abstract and logical reasoning
- problem solving and decision making
- language proficiency



Thanks for your attention

www.eufalda.org