

Didactical Guidelines

Is there constructive, motivating feedback?



TARGET GROUP: police training coordinators & trainers

WHAT TO EXPECT: Good practices for constructive and motivating feedback

SOURCES: based on empirical and experiential findings of the research studies and field trials of the SHOTPROS project

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Is there constructive, motivating feedback?

Feedback informs the learner of their performance and supports the learner in evaluating and adjusting the performance behaviour in the future. Providing constructive and motivating feedback has been shown to increase the learner's motivation, self-confidence, self-efficacy and benefits learning (Bandura, 1997; Chiviacowsky, 2020).

For relevant information on how to apply the didactic concept of constructive, motivating feedback in VR, watch this information video by scanning the QR code or clicking the link.



tinyurl.com/yykwt3ji

Good practices for constructive and motivating feedback

- The trainer mentions good results and improvements.
- The trainer mentions commitment and efforts of trainees.
- The trainer gives feedback after successful scenario attempts.
- The trainer uses the following feedback structure:
 - Where am I going? What are the learning goals? (e.g., disarming a suspect, doing better than previous repetition).
 - How am I going? What does the evidence tell us about performance? (e.g., we disarmed the suspect to the expected standard, the task was performed more successfully than the previous repetition, and a part of the task that went very well was that we avoided crossfire, a part that went less well is that we moved a little too slowly).
 - Where to next? What learning activities should we do to make better progress? (e.g., we will train to act faster and thus increase the pace of the procedure).
- The trainer gives the trainees time to reflect on their performance and discuss with each other (e.g., trainees discuss how they can improve their movements in tactical procedures).
- The trainer asks each trainee to give their impression of the scenario and describe their own decisions (trainees explain why they behaved in the way they did).
- The trainer formulates feedback in terms of development, something that can be improved. For example, the trainer accompanies feedback with action suggestions or suggestions for learning activities to improve (where to next?).
- The trainer provides time for trainees to ask questions.
- The trainer ensures that the feedback relates to the learning objectives of the training:

- what are the relevant moments? (and why these specifically for the learning objectives of the training);
 - what information is relevant? (and how is this relevant specifically for the learning objectives of the training).
- The trainer substantiates the feedback with careful observation and analysis of the video evidence provided by the VR After-Action Review (AAR):
- The trainer makes the trainees review relevant parts of the scenario by giving them the opportunity to pause and play the AAR. The trainer asks the group to reflect on their own decisions based on what is visually observed in the AAR.
 - The trainer lets trainees review the statistical feedback presented in the AAR such as number of shots fired and targets hit, bystanders flagged, etc.
 - The trainer asks the trainees how they perceived their stress levels throughout the scenario and if they want to see the stress levels reflected in the AAR.
 - The trainer gives the trainees feedback on their communication by using the recorded sound of the AAR.
 - The trainer lets the trainees use the different perspectives from which a scenario can be reviewed in the AAR. For example, the trainer shows the perspective of the suspect to show when contact was made and how trainees entered the room.
- The trainer familiarises him/herself with the buttons and possibilities of the AAR. The trainer ensures that they can recall relevant moments in the scenarios quickly and from the desirable perspectives. As such, trainees are not distracted by scrolling through the timeline during the feedback.
- The trainer asks trainees to lift their VR head mounted display when performing the debrief and providing feedback.
- The trainer involves the role-player to give feedback to trainees. For instance, how the role-player experienced the instructions from the trainees during the scenario (*“what did you hear and understand the trainees say?”*).
- The trainer performs the AAR with a group, while the others train, and rotates the groups accordingly.
- The trainer adds a pain stimulus or other sensoric addition to the VR training to provide instant feedback on performance. This has been shown to enhance the quality of learning and the perceived level of stress.

The following guidelines apply only if the trainer is wearing a VR suit.

- The trainer wears a VR-suit in trainer mode to be able to give instant feedback during the scenario without the trainees being cut out of the VR world (by raising the head mounted display and interact with the “real-life” trainer). The trainer can choose to be visible in the VR scenarios or remain invisible to trainees.
- The trainer wears a VR-suit in instruction mode and takes over a NPC to provide feedback from the point of view of a bystander or the suspect