

# Security Threats to Online Proctoring

- **Cheating Threats**

- C1. Colluding with others
- C2. Using cheating aids
- C3. Using a proxy test taker
- C4. Copying answers from other test takers

- **Stealing Threats**

- S1. Capturing content by digital photography devices
- S2. Transcribing questions verbally (on paper or recording device)



# Caveon Security Standards for Online Proctoring

**8.7.1 - Online proctoring provides for the effective observation of the test taker and the test environment throughout the testing session.**

- 8.7.1.1 - The online proctoring system enables at least the observation of the workstation, desk surface and keyboard.
- 8.7.1.2 - The online proctoring system enables the observation of the test taker's head, torso, arms and hands.
- 8.7.1.3 - The online proctoring system enables the relatively unobstructed and clear observation of the environment in which the test is being administered.
- 8.7.1.4 - The online proctoring system enables the monitoring of sound in the testing environment.

**8.7.2 - Online proctoring provides the capability for interaction with the test taker both before and throughout the testing session**

- 8.7.2.1 – The online proctor can communicate to and collect information from the test taker prior to and during the testing session.
- 8.7.2.2 - The online proctoring system provides a way for examinees to provide feedback regarding the online proctor or the proctoring process.
- 8.7.2.3 - The online proctoring system provides a means for examinees to seek help prior to the start of testing and during the testing session. This could include accessing FAQs, requesting an online chat, instant messaging, phone call, etc.
- 8.7.2.4 - The online proctor can control the testing session, including pausing, un-pausing, suspending or cancelling the test, based on client-provided rules.
- 8.7.2.5 - The online proctor is capable of guiding a test taker through a restart of the test delivery system in the event that the testing session is interrupted due to technical difficulties.

**8.7.3 - Online proctoring provides for the video and audio recording of the testing session and interactions between the test taker and online proctor.**

- 8.7.3.1 – The video and audio relevant to a security incident is recorded and stored, including interactions between the test taker and online proctor, system logs, decisions made, etc.
- 8.7.3.2 – Incidents recorded and stored are time-stamped to allow easy retrieval.
- 8.7.3.3 – A secured online access system to the stored material is required.
- 8.7.3.4 - The recording is saved for test security purposes for a period of time requested by the client.

**8.7.4 - The testing computer is effectively secured and monitored throughout the testing session**

- 8.7.4.1 - The test taker's operating system and browser are locked down during the test, preventing unauthorized access to the Internet and other general (e.g., hard drive) or specific (e.g., particular program) computer-based resources.
- 8.7.4.2 –The online proctoring system provides a secured “white list” of programs that are enabled and accessible during the test session (e.g., programs that provide accommodations or accessibility; programs that are required during some exam questions).

**8.7.5 - The online proctoring system is able to authenticate the test taker's eligibility to test.**

- 8.7.5.1 – Using biometric or other methods the online proctoring system is capable of authenticating the test taker prior to testing and upon return from any scheduled breaks, applying requirements approved by the test sponsor.
- 8.7.5.2 – The online proctoring system is capable of confirming the test taker's authorization to test prior to the start of the testing session, applying criteria provided by the test sponsor and accessing information for that purpose.

**8.7.6 - The online proctoring system adheres to general standards of security and professional practice.**

- 8.7.6.1 – The online proctor is not able to view test content at any time.
- 8.7.6.2 – The online proctor is sufficiently trained in security methods relative to his or her role (e.g., what threats to expect; what security rules to apply, etc.).
- 8.7.6.3 – The online proctor is completely unbiased relative to the performance of the test taker on the exam.
- 8.7.6.4 – The online proctor has been trained in the procedures to be followed if suspicious behavior is detected.
- 8.7.6.5 – The online proctoring system is supported by research indicating security effectiveness (e.g., actual false negative and false positive error rates for authentication process; improvement and effectiveness in the detection of security threats and attacks; satisfaction of client or test taker in the online proctoring process, etc.)
- 8.7.6.6 – To be effective the online proctoring system must be used in the context of adherence to comprehensive security standards or best practices.