

ASET Position Statement

Best Practices in Ambulatory EEG Monitoring

The efficacy of ambulatory EEG (AEEG) monitoring for quantification of events, interictal abnormalities, efficacy of medications, identifying seizure triggers occurring outside of a hospital setting, and seizure capture, characterization, and classification has been recognized by physicians, demonstrated by researchers, and described in the medical literature (Velis et al. 2007; ACNS 2008; Schuele et al. 2021, Tatum et.al 2022; Keezer et al. 2016).

Emerging trends in health care indicate that medical services are shifting away from the hospital environment (Levine et al. 2020). Hospitals and independent medical companies now provide ambulatory EEG (AEEG) monitoring in patient homes, nursing facilities, group homes, and other residential or long-term settings. The unique challenges for performing and monitoring AEEGs outside of hospital/clinic settings, and best practices for ambulatory service providers (ASP) are addressed in this position statement¹.

- I. Operations: All AEEG operations, policies, and protocols are in full compliance with regulatory agencies requirements and national guidelines [i.e., American Clinical Neurophysiology Society (ACNS), Centers for Medicare & Medicaid Services (CMS), HIPAA/HITECH, Department of Public Health, The Joint Commission (TJC) or equivalent, and other federal, state, and/or local mandates] (Meldi, Rhoades, Gippe 2009; Ringquist 2013; AMA 2021; HIPAA n.d.).
 - 1. Scope of Service.

ASPs have a written Scope of Service policy and follow ACNS guidelines for Minimum Technical Requirements for Performing AEEG (Tatum et.al 2022)

- 2. AEEG service models.
 - a. EEG set up and disconnection in the patient home, nursing home, group home, etc.
 - b. EEG set up and disconnection at a facility location, with the patient returning home during EEG recording.
- 3. Monitoring of AEEG.

Remote monitoring of AEEG is dependent upon the service ordered and appropriate Current Procedural Terminology (CPT[®]) code (AAN 2020; AMA 2021). Best practices recommend intermittent remote monitoring to ensure uninterrupted data streaming and

¹ Business and legal aspects, such as organizational and legal structure, prior authorization, billing, government, and commercial insurance enrollment and contracting, physician supervision, contracting and credentialing, facility agreements, etc. are not addressed in detail in this document.

technical integrity of the recording (i.e., verification that the patient is on camera if video was ordered, the recording device is working properly, and that electrode impedances meet ACNS requirements throughout the duration of the test).

4. Privacy and security compliance.

As with any medical service, all laws and regulations concerning patient privacy, data management, and security must be followed.

5. Work environment.

The ASP is responsible for ensuring HIPAA/HITECH-secure work environment (US Dept. HHS 2017; HIPAA n.d.) for personnel via providing a secure ASP office/facility or approving a secure home office with dedicated high-speed internet.

- 6. Equipment requirements.
 - a. ASP provides AEEG recording equipment, EEG review software, and monitoring equipment that, at minimum, meets FDA and ACNS criteria (Tatum et al. 2022).
 - b. ASP provides adequate and compliant EEG supplies, PPE, and disinfection supplies.
- 7. Qualified personnel.

Qualifications of personnel are defined in section VII. Human Resources (ASET 2020)

- 8. Staffing Coverage Plan.
 - a. The staffing model guarantees comprehensive coverage for all services provided (AEEG set ups and maintenance, 24/7/365 coverage for AEEG monitoring if ordered, on-call technologist coverage to augment AEEG services as needed, IT support).
 - b. Essential elements include:
 - i. Supervision of personnel on every shift
 - ii. Redundancy: additional technologists available to assume monitoring during unplanned shortages of staff (due to power or internet loss, severe weather, unscheduled time off, etc.) to ensure continuity of coverage.
 - iii. Staffing processes for equipment and network connectivity downtime with clear roles and responsibilities for technologists, and IT staff to avoid disruption of patient care.
- **II.** Information Technology (IT) / Information Systems (IS): Infrastructure, hardware and software with optimal functionality, maintenance and service for all network, software, servers, equipment, as well as real-time support for ASP personnel are integral for the operations of AEEG provider. ASP provides:
 - Portable, lightweight, battery-operated AEEG recording equipment meeting at minimum ACNS requirements (Tatum et.al 2022), with patient event button, and the ability to add auxiliary channels (e.g., PSG, EMG, pulse ox) with options to record audio and video, wireless, infrared HD camera with zoom capabilities available (optional secondary camera may increase clinical yield).
 - 2. Monitoring equipment meeting ACNS criteria for screen size and resolution (ACNS 2008).
 - 3. Network connection quality for real-time intermittent monitoring is equivalent to in-facility monitoring, without lag, freezing, or visual gaps in the EEG or video data. Best practice recommends the ability to simultaneously view data real-time side-by-side with a review window for reviewing previously recorded data.

- 4. Real-time data streaming/transfer to cloud server, if requested.
- 5. EEG review software meeting ACNS criteria, including quantitative EEG (QEEG) analytics and spike and seizure detection (Sinha et al. 2016; Halford et al. 2016; Tatum 2022).
- 6. Health Information Management and Data Security.

The ASP adheres to all federal/state/local security and data compliance guidelines necessary to protect patient privacy wherever patient health information (PHI) and data are acquired, accessed, and/or stored²:

- a. Data and device internal security (i.e., encryption, individual password management security, multi-factor authentication, role-based access to PHI, databases, portals, EEG review software, servers). Medical encryption and cybersecurity are provided to ensure safety of PHI, data transmission, and storage in adherence with HIPAA/HITECH regulations in the following environments:
 - i. Recording equipment and data collection in the home
 - ii. Cloud streaming
 - iii. Cloud servers, secure databases
 - iv. Internet and network security (email accounts, antivirus), secure communication platform/portals.
 - v. Mobile phone, short message service (SMS), multimedia messaging service (MMS), texting applications, etc.
- b. Archiving and secure storage of EEG and video data.
 - At minimum, the entire EEG and relevant video associated with events and seizures are archived and stored according to all regulations and ASET and ACNS guidelines (ASET 2013; ASET 2016c) in a secure location, with procedures delineated for retrieving data when needed.
- c. Mandatory reporting and investigation for data security breach.
- d. Data loss and recovery.
 - i. ASP processes include root cause(s) analyses and corrective measures
- e. Patient care/business recovery plans.
 - i. Disaster recovery plan includes redundancy of data storage and external connectivity, and downtime procedures
 - ii. Routine safety drills are performed for internet/power loss, infrastructure outages, etc.
- 7. Daily IT/IS operations include:
 - a. Electrical and equipment safety, maintenance, service, and repair (coordination with equipment and software vendors)
 - b. Monitoring of all systems to identify IT issues (i.e., network, database, software, server issues and failures etc.)
 - c. Real-time IT assistance to technologists and physicians
- **III. AEEG Protocols**: Protocols for performing and monitoring AEEG studies are tailored specifically to the patient environment, including:

² The following is a general summary, but not a comprehensive guide to adherence of privacy requirements.

1. Infection control and prevention.

In addition to vaccination requirements (i.e., tuberculosis, influenza, etc.), training is provided on standard precautions, good hand hygiene, bloodborne pathogens, highly infectious diseases [such as COVID-19, Creutzfeldt-Jakob disease (CJD), etc.], etc. The ASP also provides appropriate personal protective equipment (PPE), EEG supplies, and personnel training on:

- a. Specific infection prevention practices to minimize the risk the of spread of viruses and bacteria when traveling to multiple homes and work sites (e.g., individual per patient supply kits, disposable workspace covers, face masks for patients, limiting the number of family members present in the room during setup, etc.)
- b. Insect infestation policy (bedbugs, lice)
- c. Transportation, storage, disposal, cleaning, and disinfection of EEG equipment and supplies meeting OSHA and TJC standards (or equivalent), manufacturer recommendations [i.e., manufacturer indications for use (IFUs), safety data sheets (SDS)] and published best practices (Bonner & Davidson, 2020a; Bonner & Davidson, 2020b)
- d. Designated areas for cleaning and disinfection of equipment
- 2. Patient/caregiver education.

Ensuring patients/caregivers understand the procedure and expectations of them and providing ongoing communication during the EEG recording are necessary components for a successful AEEG. In addition to offering online information and brochures (i.e., "what to expect", "how to prepare for the in-home EEG appointment"), the following are best addressed prior to the initial AEEG appointment:

- a. The need for medical interpretative services to effectively communicate with non-English-speaking patients/caregivers and the hearing/visually impaired
- b. Health screening for symptoms and exposure of communicable diseases per appropriate CDC and ACNS guidelines, etc.
- c. Medical history, typical events, most recent seizures/events, and medications
- d. Consideration of special needs (i.e., pediatric/elderly, mental health, handicap/wheelchair-bound, known allergies, etc.)
- e. Expectations for home and patient personal preparation (EEG set-up area in the home, pets in home, adult supervision of pediatric and special needs patients, clean hair free of product, proper clothing: button-down shirt, etc.) (also refer to section IV. Patient and Staff Safety)
- f. Internet availability in the home
- g. Patient/caregiver questions regarding the AEEG procedure
- 3. AEEG set-up.
 - a. Patient identification utilizing two unique identifiers
 - b. HIPAA notification and patient consent
 - c. Electrode application per IFCN (Klem et al. 1999) with appropriate headwrap (see Skin Safety, Section IV.1.d), per ACNS guideline one (Sinha et al. 2016))
 - d. Starting technically acceptable AEEG (Tatum et al. 2022) and video if ordered

- e. Transfer of care to remote monitoring team and initiation of data streaming if ordered
- f. Instructions for patients/caregiver (i.e., using event button, documenting events and daily activities, moving/operating equipment/camera, contacting technical support, contacting emergency services, etc.).
- g. Activation procedures if requested by ordering physician unless contraindicated (Sinha et al. 2016).
- 4. Remote AEEG monitoring.

Performance and documentation of:

- a. Quality and integrity checks of the EEG, and video and audio, as appropriate (i.e., patient in camera view)
- b. Troubleshooting and dispatching on-call technologist
- c. EEG review, annotations, and reports, as per appropriate CPT[®] code requirements (AAN 2020; AMA 2021)
- d. Daily communication with patients/caregivers (verification of events, daily skin comfort checks)
- e. Time and date of patient hand-off at shift changes, communication of any seizures, events, or emergencies (refer to Section IV. Patient Safety for details)
- f. Compliance with minimum tech-to-patient ratios as mandated by the American Medical Association's CPT[®] codes and adopted by CMS of 1 technologist to 12 patients for intermittent monitoring and 1:4 for continuous (AAN 2020; AMA 2021)
- Post-study data transfer (if applicable). Specific procedures for data transfer must be in place for naming conventions, upload of data to facilitate technologist and physician review, and safely deleting all copies from the recording equipment
- 6. Technologist review and annotation of AEEG studies.

EEG review protocols include:

- a. Verification and EEG annotation of patient events, patient diary, and activities of daily living
- Annotations of sample 'awake with eyes open/eyes closed', sleep stages N1, N2, N3, REM, normal variants, etc.
- c. Activations, if performed, are annotated on the EEG with comments on patient effort and clinical responses
- d. Thorough review of the EEG for abnormalities and annotations consistent with ACNS guidelines and nomenclature (Hirsch et al. 2021; Sinha et al. 2016). Markedly abnormal EEG, electroclinical, electrographic, and/or clinical seizures trigger prompt physician notification.
- 7. Technical reports per ACNS guideline 7 (Tatum et al. 2016), ABRET NA-CLTM (ABRET 2022a), and other requirements (CMS, payer, etc.), include:
 - a. Patient history
 - b. Technical description:
 - c. EEG description utilizing current ACNS nomenclature (either Tatum et al. 2016; Hirsch et al. 2021; or Scheffer et al. 2017)

- d. Reporting frequency as stipulated per facility protocol and CPT[®] coding requirements (AAN 2020; AMA 2021)
- 8. Physician review and interpretation.
 - a. Entire raw EEG and video data are provided to physicians for interpretation (Tatum et.al 2022)
 - b. Interpretation reports adhere to ACNS guidelines (Herman et al. 2015)
 - c. Physicians performing interpretations are credentialed and licensed according to applicable standards
- Storage and archiving of EEG and video data.
 Following all applicable local, state, CMS, HIPAA/HITECH, ASET and ACNS guidelines and regulations (ASET 2013; ASET 2016c; HIPAA n.d.; US Dept. HHS 2017).
- IV. Patient & Staff Safety: Performing AEEG procedures outside of the hospital produces unique patient and staff safety challenges. Safety policies provide guidance for personnel and are established in compliance with all regulations (OSHA, TJC, state/local, etc.). Adherence to TJC standards and TJC accreditation (or equivalent) are highly recommended (Meldi, Rhoades, Gippe 2009; Ringquist 2013).

Note: Currently, AEEGs are not indicated for pre-surgical patients or for patients with tapered medications for seizure-induction because of inability to provide immediate medical assistance, administer rescue medication, or perform awareness tests during seizure.

- 1. Patient safety policies address:
 - a. Patient and caregiver expectations for emergency responses to seizures or other acute medical events
 - b. Seizure safety and other emergency response training (i.e., any event that places patient at risk for loss of life or serious injury: house fire, home invasion, fall, physical abuse, etc.) with specific protocols for personnel based on role and responsibilities that include clear notification parameters (physician, local emergency department, patient family)
 - c. Specific precautions related to the needs of high-risk patients, i.e., immunocompromised, elderly, pediatric, special needs, infectious diseases, etc.
 - d. Skin safety. Prolonged duration of the AEEG test increases the risk of skin irritation or skin injury. Personnel training in proper electrode application using non-abrasive products and head wrap techniques, patient education/instructions, and daily skin comfort checks help reduce the risk for skin injury (ASET 2016b).
 - e. EEG equipment and supply safety (see Section III.1 Infection Prevention):
 - i. All electrode wires are covered and protected, and EEG recording unit is secured allowing patient to move comfortably without the risk of pulling the lead or tripping on wires.
 - All EEG products (i. e collodion, collodion remover, Ten20 Conductive Paste[™], etc.) are transported, stored, and handled in accordance with IFUs (e.g., collodion is used in a ventilated room). SDS is readily available. Personnel are trained in first aid for use of these products.

- f. ASP has processes for responding, reporting, documenting, and investigating any patient safety incidents (i.e., seizures, skin breakdowns, emergencies, abuse, neglect, etc.).
- g. ASP provides and documents training for all safety protocols.
- h. Technologists have current CPR/BSL certificate
- 2. Staff Safety

Technologists providing AEEG services outside of the hospital clinic face unique safety risks (Tatum et al. 2022).

- a. ASP provides safety devices to all personnel who travel, such as cell phones, emergency alarms, flashlights, etc.
- b. Driving: ASPs provide:
 - i. Properly maintained, insured vehicles for personnel with policies around use of company or technologist-owned vehicles, specifying minimum requirements for insurance and servicing, and mileage reimbursement
 - ii. Roadside assistance
 - iii. Safety equipment in the car (e.g., tire chains, first aid kits)
 - iv. Safe driving training
- c. Safe work environment (NIOSH 2010). To ascertain and evaluate workplace risks, policies are developed for:
 - i. Training on a workplace violence (assessment, de-escalation, appropriate responses, etc.) upon hire and annually thereafter
 - ii. Providing clear guidance when technologists feel unsafe in or around the patient environment, workplace, or another facility (for example, sending an accompanying staff member, or performing the EEG set up in another location).
 - iii. Risk mitigation in the patient's home environment may include requiring patients/caregivers to:
 - 1) Restrain pets/animal away from the set-up area
 - 2) Remove weapons from the set-up area
 - 3) Refrain from use of recreational drugs/illicit substances immediately before or during EEG testing
 - 4) Provide a cleared workspace for supplies and set up
- d. Lifting and carrying. Training is provided in safe lifting, providing carrying cases, and proper footwear requirements.
- e. Ergonomics. Training includes EEG set-up in the home environment. Accommodations for safe ergonomics while monitoring (i.e., ergonomic chairs, monitor distance, etc.) are made (Cal/OSHA 2007).
- V. Quality Assurance (QA). Ongoing efforts to improve are a part of the ASP work culture. All personnel are responsible for high-quality standards. Employee feedback and involvement in improvement initiatives are encouraged. QA initiatives include:
 - 1. A QA plan that outlines dedicated efforts to monitor and measure quality through surveillance methods, metrics, reporting outcomes, and continuous QA performance improvement initiatives (QAPI). The plan covers:

- a. Quality metrics, such as:
 - i. Audits of all processes
 - ii. Interpreting provider feedback for technologists
 - iii. Patient and referring provider surveys
- b. Root cause analyses, process improvement plans, corrective action plans, individual technologist feedback, education, and retraining.
- c. Regular reporting of quality findings
- d. Performance improvement initiatives
- e. Continuing education opportunities for personnel (see Section VII.9 Human Resources)
- 2. Personnel dedicated to QA and improvement, such as a QA Manager or Coordinator (i.e., CLTM[®]-level)
- **VI. Compliance:** ASPs comply with all applicable federal, state, and local laws and regulations. Compliance policies address:
 - 1. Credentialing/licensure criteria per regulatory guidelines.
 - 2. Conflicts of interest (annual disclosures, attestation/equipment procurement, patient/vendor gifts/gratuities, etc.).
 - 3. Client facility agreements related to access and management of PHI, according to state, local, and federal regulations, such as HIPAA/HITECH Acts, etc. (see Sections I.4 and V).
 - 4. Anonymous reporting of quality and safety concerns per TJC (or equivalent) requirements (TJC 2022; Meldi, Rhoades, Gippe 2009; Ringquist 2013).
 - 5. Regulatory requirements in accordance with Department of Health and Human Services (HHS.gov):
 - a. Patient's rights and responsibilities (including financial obligations)
 - b. Consent to care/HIPAA, etc.
 - c. Patient records policy

VII. Human Resources/Standard Organizational Practices. ASPs have:

- 1. Organizational chart for reporting structure
- 2. Job descriptions for each position, including requirements for education, experience, credentials (ASET 2016a), and other skill sets.
 - a. AEEG set ups are performed by R. EEG T.[®] or competent unregistered technologists. Additional requirements may apply to independent testing facilities (IDTF).
 - b. Monitoring and EEG reviewing technologists are qualified (ASET 2020) and, at a <u>minimum</u>, ABRET-credentialed in EEG and/or LTM (R. EEG T.[®], with CLTM[®] or NA-CLTM[®] preferred), competent in epilepsy, adult, and pediatric EEG (ABRET 2022a-c).
- 3. Personnel dedicated to QA and improvement, such as a QA Manager or Coordinator with appropriate experience and credentials.
- 4. Personnel dedicated to onboarding, orientation, and training, competency assessments (i.e., 30-, 60-, 90-day) and annual performance reviews.
- 5. Training policies and documentation including initial and annual:
 - a. Mandatory training in health care service delivery
 - b. Position-specific neurodiagnostic training

- c. Position-specific patient safety and infection prevention training
- Hiring practices incorporating skills assessments, such as: electrode placement according to the 10-20 System (Klem et al. 1999), recognition of relevant EEG patterns and artifacts, troubleshooting, computer technology.
- 7. Background check requirements consistent with hospital-based Clinical Neurophysiology labs with clear processes outlined prior to hiring.
- 8. Dress code for personnel and attendance policies.
- 9. Professional advancement and continuing education opportunities for technologists to attend educational sessions, webinars, neurodiagnostic conferences, etc.

Summary

ASPs should follow best practices and provide customized services which meet the needs of individual patients and ordering physicians. ASPs can offer flexible scheduling, video and audio recording, 24/7 remote monitoring, real time (live) physician access to allow for daily reports, timely uploads for physician review, EEG review and annotation by qualified personnel, and optional interpretation by a credentialed, licensed neurologist.

To ensure patient safety and high-quality EEG recordings, ASPs should prioritize well written protocols, patient safety and communication, compliance, quality assurance and improvement initiative and invest in technically advanced EEG recording and monitoring equipment, secure infrastructure, competent personnel, and patient education tools.

References:

- 1. ABRET Neurodiagnostic Credentialing and Accreditation. (2022a) EEG exam eligibility requirements. Retrieved from: https://abret.org/index.php?cID=682. Accessed: March 10, 2022.
- 2. ABRET Neurodiagnostic Credentialing and Accreditation. (2022b) CLTM exam eligibility requirements. Retrieved from: https://abret.org/index.php?cID=685. Accessed: March 10, 2022.
- 3. ABRET Neurodiagnostic Credentialing and Accreditation. (2022c) NA-CLTM exam eligibility requirements. Retrieved from: https://abret.org/apply/na-cltm-exam/. Accessed: March 10, 2022.
- American Academy of Neurology (AAN). 2020. CMS proposed rule for 2020: summary of longterm EEG code provisions. Retrieved from: https://www.aan.com/siteassets/home-page/toolsand-resources/practicing-neurologist--administrators/billing-and-coding/cpt--em/20-eegsummary_tr.pdf. Accessed May 26, 2022.
- 5. American Clinical Neurophysiology Society (ACNS). (2006) Guideline eight: guidelines for recording clinical EEG on digital media. *J Clin Neurophysiol*. Apr;23(2):122–4.
- 6. American Clinical Neurophysiology Society (ACNS). (2008) Guideline twelve: guidelines for long-term monitoring for epilepsy. *J Clin Neurophysiol*. Jun;25(3):170–80.
- 7. American Medical Association (AMA). (2021) CPT 2022 Professional Edition. AMA. Chicago, IL.
- ASET The Neurodiagnostic Society (ASET). 2013. ASET Position Statement: Retention of neurodiagnostic procedures data. Retrieved from: https://www.aset.org/best-practices/. Accessed: May 5, 2022.
- 9. ASET The Neurodiagnostic Society (ASET). 2016a. Job Descriptions for the LTME Specialist I

and II; ICU/cEEG Specialist I and II; and Advanced LTM Analyst. In: <u>Handbook of Neurodiagnostic</u> Job Descriptions and Competencies, 2nd Edition. Kansas City, MO.

- 10. ASET The Neurodiagnostic Society (ASET). 2016b. ASET position statement on skin safety during EEG procedures A guideline to improving outcome. *Neurodiagn J.* Dec;56(4):296–300.
- ASET The Neurodiagnostic Society (ASET). (2016c) ASET Position Statement: Video EEG data management in long-term monitoring studies. Retrieved from: https://www.aset.org/bestpractices/. Accessed: May 5, 2022.
- ASET The Neurodiagnostic Society (ASET). (2017) ASET position statement on skin safety during EEG procedures – A guideline to improving outcome. Addendum: neonatal continuous EEG. Neurodiagn J. Mar;57(1):84–8.
- 13. ASET The Neurodiagnostic Society (ASET). (2020) ASET Position Statement on the Definition of a Qualified Neurodiagnostic Technologist. *Neurodiagn J.* Sep;60(3):211.
- Bonner AM & Davidson P. (2020a) Infection prevention: 2020 review and update for neurodiagnostic technologists. *Neurodiagn J.* Mar;60(1):11–35.
- 15. Bonner AM & Davidson P. (2020b) Technical tips: keeping it clean during COVID-19. *Neurodiagn J.* Sep;60(3):195–207.
- California Department of Industrial Relations (Cal/OSHA). (2007) Ergonomic guidelines for manual material handling. Retrieved from: https://www.cdc.gov/niosh/docs/2007-131/pdfs/2007-131.pdf. Accessed: March 10, 2022.
- Halford J, Sabau D, Drislane FW, Tsuchida T, Sinha SR. (2016) American Clinical Neurophysiology Society (ACNS) Guideline four: recording clinical EEG on digital media. *J Clin Neurophysiol.* Aug;33(4):317–9.
- 18. HIPAA Journal. (n.d.) HIPAA and HITECH. Retrieved from: https://www.hipaajournal.com/hipaaand-hitech/. Accessed: March 10, 2022.
- Hirsch LJ, Fong MWK, Leitinger M, LaRoche SM, Beniczky S, Abend NS, Lee JW, Wusthoff CJ, Hahn CD, Westover MB, Gerard EE, Herman ST, Haider HA, Osman G, Rodriguez-Ruiz A, Maciel CB, Gilmore EJ, Fernandez A, Rosenthal ES, Claassen J, Husain AM, Yoo JY, So EL, Kaplan PW, Nuwer MR, van Putten M, Sutter R, Drislane FW, Trinka E, Gaspard N. (2021). American Clinical Neurophysiology Society's standardized critical care EEG terminology: 2021 Version. *J Clin Neurophys*: 38(1):1–29.
- Keezer MR, Simard-Tremblay E, Veilleux M. (2016) The Diagnostic Accuracy of Prolonged Ambulatory Versus Routine EEG. *Clin EEG Neurosci*. Apr;47(2):157-61. doi: 10.1177/1550059415607108. Epub 2015 Sep 15. PMID: 26376916.
- Klem GH; Lüders HO; Jasper HH, Elger C. (1999) Chapter 1.1. The ten-twenty electrode system of the International Federation. In Recommendations for the Practice of Clinical Neurophysiology: Guidelines of the International Federation of Clinical Physiology. EEG Suppl. 52.
- Levine DM, Ouchi K, Blanchfield B, Saenz A, Burke K, Paz M, Diamond K, Pu CT, Schnipper JL. (2020) Hospital Level Care at Home for Acutely III Adults: A Randomized Controlled Trial. *Ann Intern Med.* Jan 21;172(2):77 85. doi: 10.7326/M190600. Epub 2019 Dec 17. PMID: 31842232.
- 23. Meldi D, Rhoades F, Gippe A. 2009. The big three: a side-by-side matrix comparing hospital accrediting agencies. Synergy;Jan/Feb:12–14. Retrieved from:

https://www.namss.org/Portals/0/Regulatory/The%20Big%20Three%20A%20Side%20by%20Side%20Matrix%20Comparing%20Hospital%20Accrediting%20Agencies.pdf. Accessed: March 10, 2022.

- National Institute for Occupational Safety and Health (NIOSH). (2010) NIOSH Hazard Review: Occupational hazards in home healthcare. DHHS NIOSH Publication No. 2010–125. Retrieved from: https://www.cdc.gov/niosh/docs/2010-125/pdfs/2010-125.pdf?id=10.26616/NIOSHPUB2010125. Accessed: March 10, 2022.
- Ringquist L. (2013) The big five healthcare accreditation organizations side by side comparison. Behavioral Health & Medical Review Experts (BHM). Retrieved from: https://bhmpc.com/calltoaction/accreditation-comparison-cta/Accreditation-Comparison-Tool.pdf. Accessed: March 10, 2022.
- 26. Schuele, SU, Lhatoo SD, Tatum WO. (2021) Utility of ambulatory surface electroencephalography. *J Clin Neurophysiol*. Mar;38(2):75–6.
- Sinha SR, Sullivan LR, Sabau D, San-Juan D, Dombrowski KE, Halford J, Hani AJ, Drislane FW, Stecker MM. (2016) American Clinical Neurophysiology Society (ACNS) Guideline one: minimum technical requirements for performing clinical EEG. J Clin Neurophysiol. Aug;33(4):303–7.
- 28. Tatum WO, Selioutski O, Ochoa JG, Munger Clary H, Cheek J, Drislane F, Tsuchida TN. (2016) ACNS guideline seven: guidelines for EEG reporting. *J Clin Neurophysiol*. Aug;33(4):328–32.
- 29. Tatum WO, Halford JJ, Olejniczak P, Selioutski O, Grigg-Damberger MM, Gloss D, Acharya J, Schuele S, Sinha S, Tsuchida T, Drislane FW. (2022) Minimum technical requirements for performing ambulatory EEG. *J Clin Neurophysiol*. Sep;39(6):435–40.
- 30. The Joint Commission (TJC). (2022). Report a patient safety concern or file a complaint. Retrieved from: https://www.jointcommission.org/resources/patient-safety-topics/report-apatient-safety-concern-or-complaint/ Accessed: May 26, 2022.
- US Department of Health and Human Services (HHS). HITECH Act Enforcement Interim Final Rule. Updated June 16, 2017. Retrieved from: https://www.hhs.gov/hipaa/forprofessionals/special-topics/hitech-act-enforcement-interim-final-rule/index.html. Accessed: March 10, 2022.
- 32. Velis D, Plouin P, Gotman J, Lopes da Silva F. (2007) Recommendations regarding the requirements and applications for long-term recordings in epilepsy. *Epilepsia*. Feb;48(2):379–84.

--Approved by the ASET Board of Trustees, November 1, 2022

© Copyright 2022 by ASET – The Neurodiagnostic Society