

Preparing for the Sleep Board Exams

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Why Get Credentialed?

- State Requirements
- Medicare Requirements
 - Medicare suing IDSF for using non-credentialed technicians to run Medicare patient studies
- Marketability
 - Sleep centers want credentialed technologists
- More money
 - Maybe ?

Studying for the Exam

- Not an easy exam
- Years as a sleep tech may not prepare you for exam
- Know the topics well that are heavily tested
 - Instrumentation/Study Performance
 - Scoring
 - PAP Titration
- Use AASM protocols not your lab's protocols

Important Websites

Board of Registered Polysomnographic Technologists (BRPT)

www.brpt.org

American Board of Sleep Medicine (ABSM)

www.absm.org

National Board of Respiratory Care

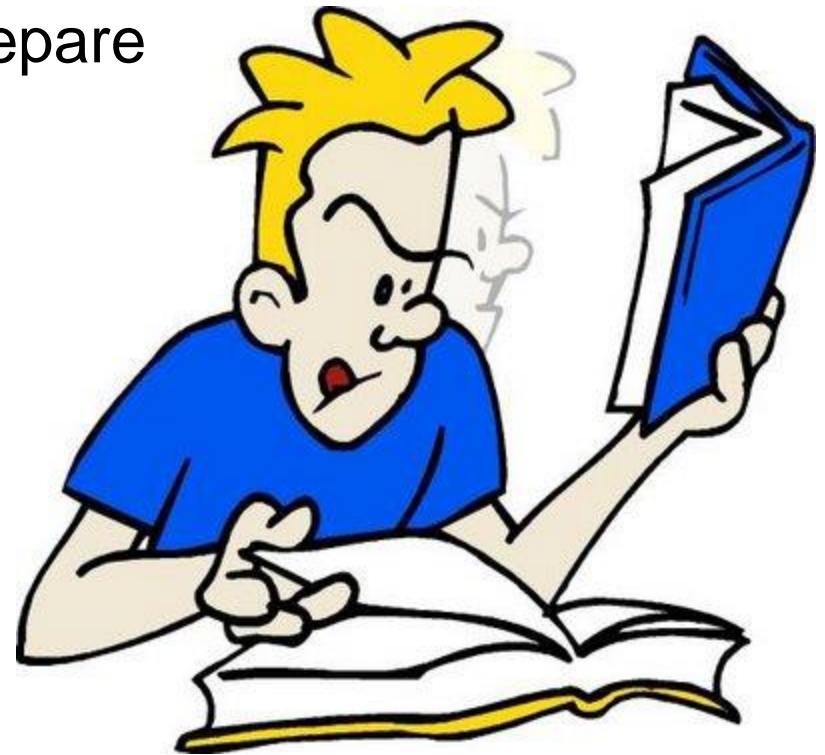
www.nbrc.org

American Academy of Sleep Medicine (AASM)

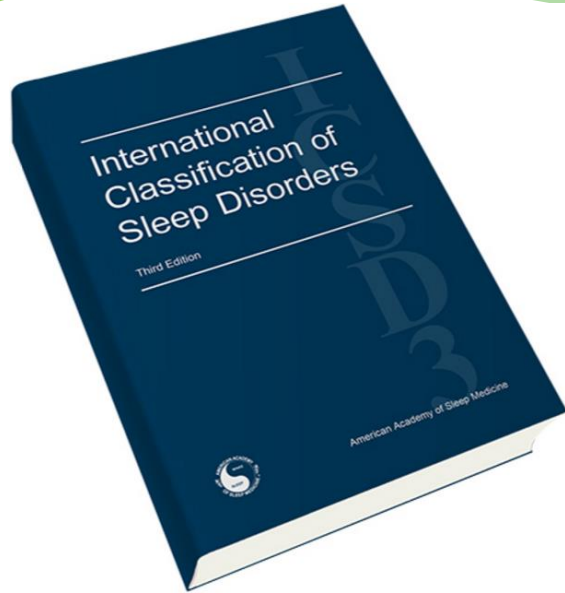
www.aasmnet.org

Credential Exam Preparation

- Set a study schedule
- Give yourself six months to prepare
- Practice exams available (BRPT, AAST, ASET)
- Find a partner/mentor/tutor
- Use flash cards
- Read recommended texts
- Study group



AASM Suggested Reading List



1. Mattice C, Books R, Lee-Chiong T: Fundamentals of Sleep Technology, Philadelphia, 2012, Lippincott Williams
2. International Classification of Sleep Disorders: Diagnostic and Coding Manual, 2014, AASM
3. Berry R, Brooks R, et al.: *The AASM Manual for the Scoring of Sleep and Associated Events: Rules, Terminology & Technical Specifications*, AASM (online)
4. Clinical guidelines for the manual titration of positive airway pressure in patients with obstructive sleep apnea, *Journal of Clinical Sleep Medicine*, 2008; 4(2):157-71. Find at <http://www.aasmnet.org/Resources/clinicalguidelines/040210.pdf>
5. Clinical guide for the evaluation, management and long-term care of obstructive sleep apneas in adults, *Journal of Clinical Sleep Medicine*, 2009; 5(3):263-76. Find at http://www.aasmnet.org/Resources/clinicalguidelines/OSA_Adults.pdf

Other Reference Material



Reading books and articles is essential. There are many excellent textbooks available.

Texts published before 2012 have old scoring rules. Be sure to study from the most current textbooks.

Increase your vocabulary and familiarity with terms that may be on the exam. A list of abbreviations is in the BRPT Candidate Handbook.

Types of Questions

- Recall Questions
- Application Questions
- Analysis Questions

Recall Questions

- Recall Questions
 - Next step in process, identify equipment, define stage of sleep
- Example:
 - Time constant is referred to:
 - (A) The time it takes the pen to fall to 37% of the peak deflection
 - (B) The time it takes the pen to rise to 63% of its peak
 - (C) The time it takes the pen to fall to 63% of the peak deflection
 - (D) The time a signal is constant across the epoch

Asking the exam taker for a definition.

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Application Questions

- Application Questions
 - Use of associated knowledge
 - Which equipment for specific symptom
 - Identify sleep stage from recording sample
- Example:

The tech increases the time constant. What happens to the low frequency filter as a result?

 - (A) It increases
 - (B) It decreases
 - (C) It stays the same as it was
 - (D) The time constant and low frequency filter are not related

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Asking for exam taker to relate time constant to low frequency filter.

Analysis Questions

- Analysis Questions
 - Integrate and analyze pieces of information
 - Identify answer based on multiple variables
 - Given situation and information, identify most appropriate next course of action

Analysis Questions

- Example of Analysis Question:
In an EEG channel, which statement(s) is true regarding the low filter setting?
 - a. Inappropriately high setting may lead to overscoring SWS
 - b. Inappropriately low setting may lead to SWS overscore
 - c. Inappropriately low setting may introduce respiratory artifacts
 - d. Inappropriately high settings may introduce respiratory artifacts
 - i. a only
 - ii. a and b
 - iii. b and c
 - iv. c only

Asking for exam taker to know that low frequency filter relates to SWS and what will happen to signals if low filter setting is inappropriate.

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Question Composition

- Three Components
 - The stem (what is being asked)
 - Positively worded vs. negatively worded
 - Distractors (incorrect responses)
 - Answer key (best or most correct response)

Approaching Questions

- **Carefully** read the stem
- Identify key words
- Determine what is being asked
- Review **all** of the responses
- Eliminate 2 incorrect responses, if possible
- Consider AASM guidelines or parameters versus your lab's protocol or how you were trained

Positively Worded Questions

- In order to assure that the digital readout of delivered pressure is correct on a PAP unit, the pressure can best be verified by using a ...
 - (1) Water column manometer
 - (2) D.C. amplifier
 - (3) Sphygmomanometer
 - (4) Pressure transducer

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Negatively Worded Questions

- Poor sleep hygiene would include all of the following except ...
 - (1) Having a regular bedtime
 - (2) Eating a large meal before bedtime
 - (3) Consuming alcohol
 - (4) Exercising strenuously before bedtime

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Negatively Worded Questions

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Words to be Wary Of

- Always read questions two or three times that have these words in them:
 - Always
 - Never
 - Except
 - Not
 - All



Read All the Responses

The calibration signal on a PSG is $50 \mu\text{V}$. The technician has the sensitivity set at $5 \mu\text{V}/\text{mm}$. What height should the pen deflection be measured at?

- a. 5 cm
- b. 10 mm
- c. 10 cm
- d. 1 cm
- e. a and b
- f. b and d

Analyzing the Responses

Equation $D=V/S$ so
 $50 \mu\text{V} \div 5 \mu\text{V}/\text{mm} = 10 \text{ mm}$

Response b. is correct

$10 \text{ mm} = 1 \text{ cm}$

Response d. is also correct

Response f. Is the correct answer to the question

The Board will sometimes use $\mu\text{V}/\text{mm}$ and sometimes $\mu\text{V}/\text{cm}$. Watch for this.

- a. 5 cm
- b. 10 mm
- c. 10 cm
- d. 1 cm
- e. a and b
- f. b and d

Identify What You Do Know

Which of the following meets the criteria for a hypopnea?

YOU KNOW IT HAS TO BE 10 SECONDS LONG

- A) 30% reduction in airflow, 10 seconds long, 3% desaturation or associated with an arousal
- B) 40% reduction in airflow, 15 seconds long, and 2% desaturation or associated with an arousal
- C) 10% reduction in airflow, 13 seconds long, 4% desaturation,
- ~~D) 50% reduction in airflow, 7 seconds long, 5% desaturation~~

Identify What You Do Know

Which of the following meets the criteria for a hypopnea?

YOU KNOW IT HAS TO BE 30% REDUCTION

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- B) 40% reduction in airflow, 15 seconds long, and 2% desaturation or associated with an arousal
- ~~C) 10% reduction in airflow, 13 seconds long, 4% desaturation,~~
- ~~D) 50% reduction in airflow, 7 seconds long, 5% desaturation~~

Identify What You Do Know

Which of the following meets the criteria for a hypopnea?

YOU KNOW IT HAS TO BE A 3% DESATURATION

- A) 30% reduction in airflow, 10 seconds long, 3% desaturation or associated with an arousal
- ~~B) 40% reduction in airflow, 15 seconds long, and 2% desaturation~~
- ~~C) 10% reduction in airflow, 13 seconds long, 4% desaturation~~
- ~~D) 50% reduction in airflow, 7 seconds long, 5% desaturation~~

Identify What You Do Know

Which of the following meets the criteria for a hypopnea?

BY PROCESS OF ELIMINATION, YOU GOT THE ANSWER

- A) 30% reduction in airflow, 10 seconds long, 3% desaturation or associated with an arousal
- ~~B) 40% reduction in airflow, 15 seconds long, and 2% desaturation~~
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Published Standards vs. Lab Protocol

What is the RECOMMENDED maximum IPAP-EPAP differential?

- (a) 2 cm H₂O
- (b) 4 cm H₂O
- (c) 6 cm H₂O
- (d) 10 cm H₂O

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- (d) 10 cm H₂O ✓

JCSM
Journal of Clinical
Sleep Medicine

SPECIAL ARTICLE

Clinical Guidelines for the Manual Titration of Positive Airway Pressure in Patients with Obstructive Sleep Apnea

Positive Airway Pressure Titration Task Force of the American Academy of Sleep Medicine

Task Force Members: Clete A. Kushida, M.D., Ph.D., RPSGT (Chair)¹; Alejandro Chediak, M.D. (Vice-Chair)²; Richard B. Berry, M.D.³; Lee K. Brown, M.D.⁴;

Source: AASM Clinical Guidelines for the Manual Titration of Positive Airway Pressure in Patients with Obstructive Sleep Apnea

Referring to Recording Samples

- Carefully examine channel labels and time scale
- Sample may not always be 30 second epoch
- Channels may be in different sequence than in your lab
- Markers give reference for measuring amplitude, voltage, duration, frequency and time
- Become familiar with common channel labels
 - LAT, L-Leg (left anterior tibialis muscle)
 - PRESS, PTAF, P-Flow (nasal pressure)
 - E1, E2, LOC, ROC, LEOG, REOG (eyes)

Before You Begin the Exam

- * If you have test anxiety, start NOW developing tactics to handle it—don't wait until the day before the exam
- * Proctor will give you a whiteboard. Write down what you want to remember
- * Read each question at least two times
- * Read ALL of the choices before answering
- * If you don't know an answer, skip and come back to it
- * Mark for review questions you want to think more about
- * If you have time left over, go over all questions again
- * Do not second guess yourself. Trust your intuition. Go with your first response, it is usually the correct one

Good Luck!

- SleepTechTutor.com is approved by BRPT STAR Self-Study Program - SS007
- Tutoring available at SleepTechTutor.com
- Questions to sleeptechtutor@gmail.com
- Thank you