HomePAP

The study is a randomized, parallel group, unblinded, multicenter study that compares two approaches [home-based, portable monitoring (PM) versus attended, laboratory-based polysomnography (PSG) (Lab)] in adults, at least 18 years of age, with a moderate to high probability of obstructive sleep apnea (OSA) and who have been referred to sleep medicine specialists at AASM-accredited sleep centers for evaluation and/or management.

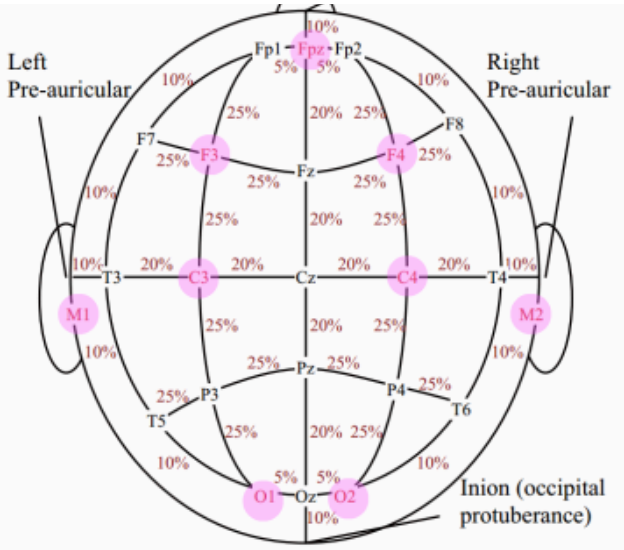
Signals

EEG (F3, F4, C3, C4, O1, O2, M1, M2)

Sampling rate: min 200Hz

Placement:

- International 10-20 system:
    - Left Frontal: F3,
    - Right Frontal: F4,
    - Left Central: C3,
    - Right Central: C4,
    - Left Occipital: O1,
    - Right Occipital: O2.
- Behind the ears at the left (M1) and right (M2) mastoid areas



Reference: FPz

EOG (E1, E2)

Sampling rate: min 200Hz

Placement: 1 cm below and 1 cm lateral to the outer canthus of the left (E1) and right eye (E2)

Reference: FPz.

Sensor type: Gold cup orAg/AgCl patch

ECG (ECG1, ECG2, ECG3)

Sampling rate: 200Hz

EMG (CChin, RChin, LChin, LLeg, RLeg)
Sampling rate: 200Hz
Chin:

- Center Chin: in the midline 1 cm above the inferior edge of the mandible (CChin)
- Right Submentalis: 2 cm below the inferior edge of the mandible and 2 cm to the right of the midline (RChin)
- Left Submentalis: 2 cm below the inferior edge of the mandible and 2 cm to the left of the midline (LChin)

Leg:

- Left Leg (LLeg)
- Right Leg (RLeg)

Reference: FPz

Respiratory signals (Nasal Pressure, MaskFlow, SaO2)
Sampling rate: 32Hz. Except for nasal pressure which is collected at 128 Hz.
Placement:

Respiratory belts and airflow cannula are placed using standardized placements. Oximeter sensors are attached to a finger of the non-dominant hand.

Other
Pulse
Plethysmography
Snore
Airflow
Sum
Chest
Abdomen
XFlow
Leak
Position
CPAP Flow