

# Individual Sleep Analysis Report

## Subject ID: 49 | Healthy Control Study

Analysis Date: August 16, 2025 | Nights Analyzed: 2 | Report Generated by: Sleep-EDF Analysis System

### Subject Information

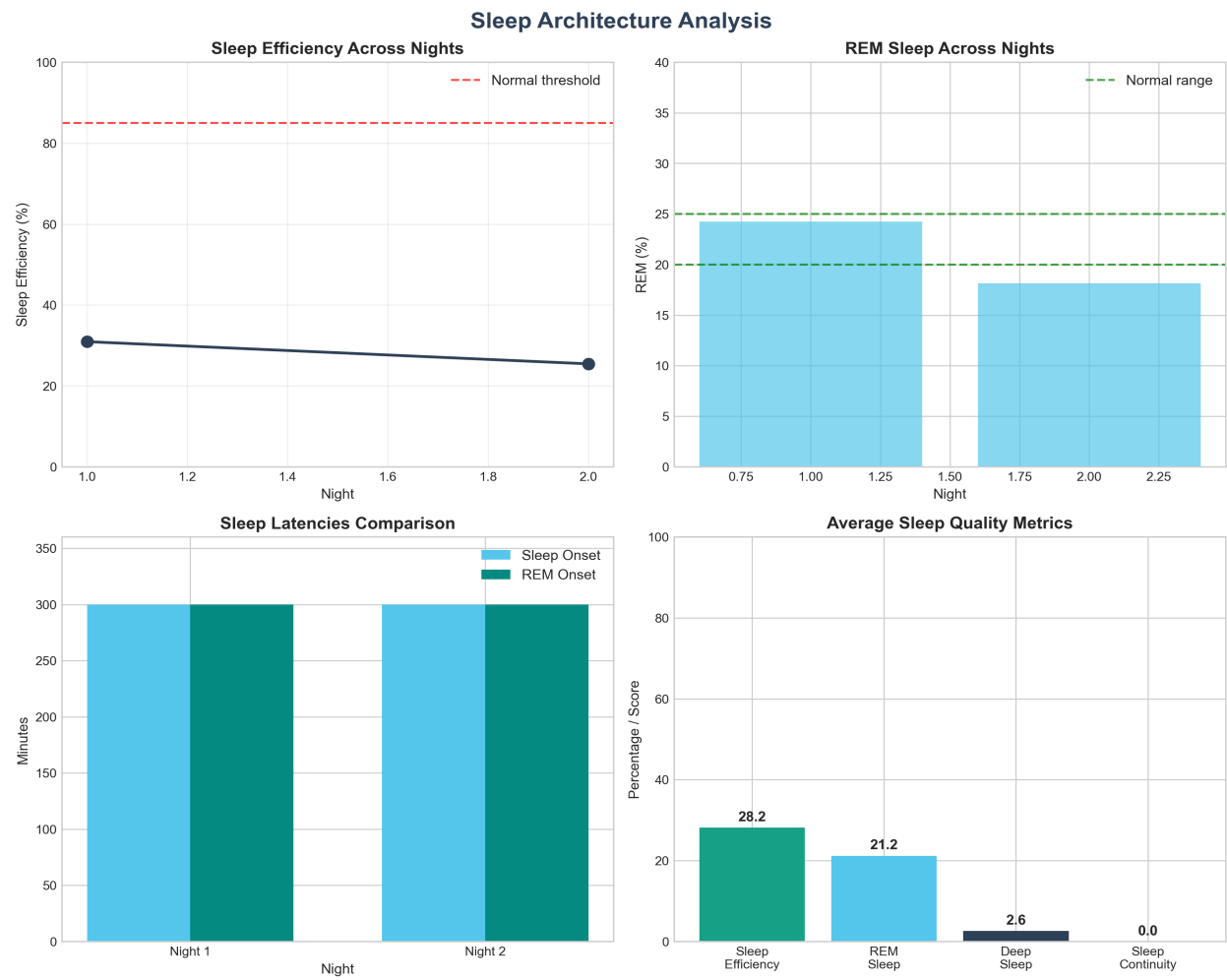
Subject ID	49
Age	67 years
Sex	F
Study Type	Healthy Controls
Number of Nights	2
Recording Dates	Multiple nights

### Executive Summary

This report presents a comprehensive analysis of 2 night polysomnographic recordings for Subject 49, a 67-year-old F participant from the Sleep Cassette (healthy controls) study under nan condition.

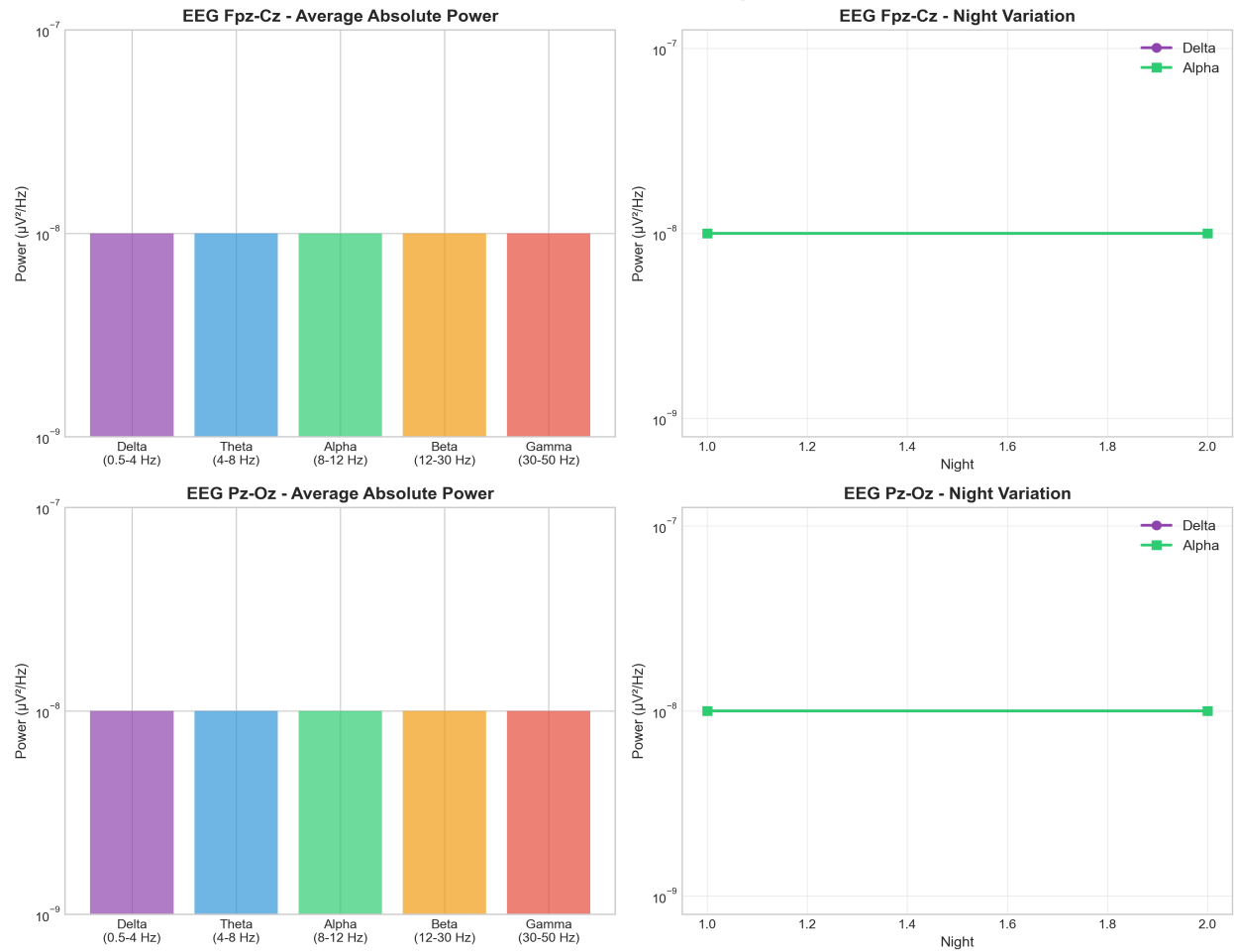
Metric	Value	Clinical Interpretation
Sleep Efficiency	28.2%	Below Normal (<85%)
Sleep Latency	529.5 min	Prolonged (>30min)
REM Latency	621.8 min	Atypical
REM Sleep	21.2%	Normal (20-25%)
Wake After Sleep Onset	298.2 min	Elevated (>30min)

# Sleep Architecture Analysis

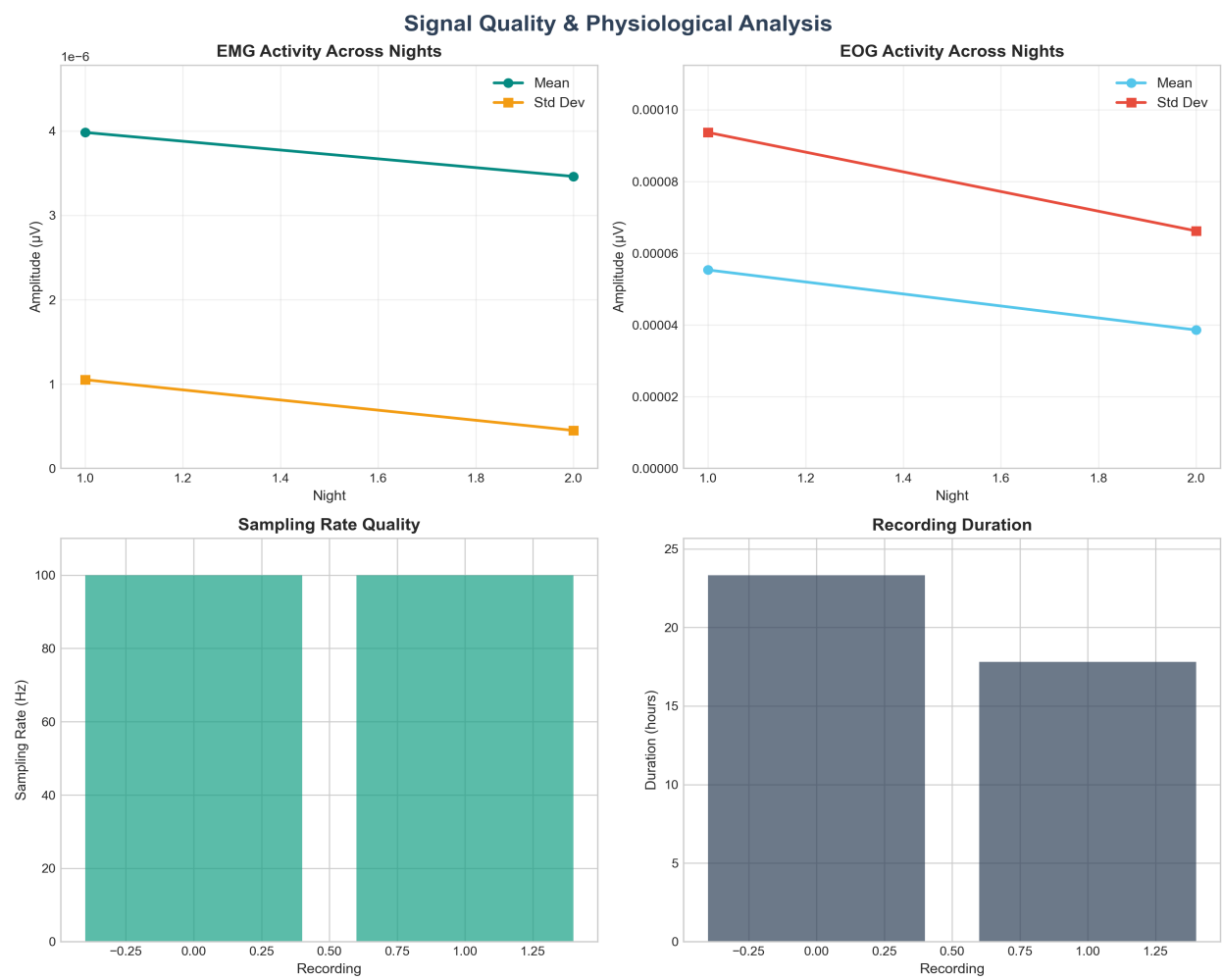


# Neurophysiological Analysis - EEG Power Spectrum

EEG Power Spectral Analysis

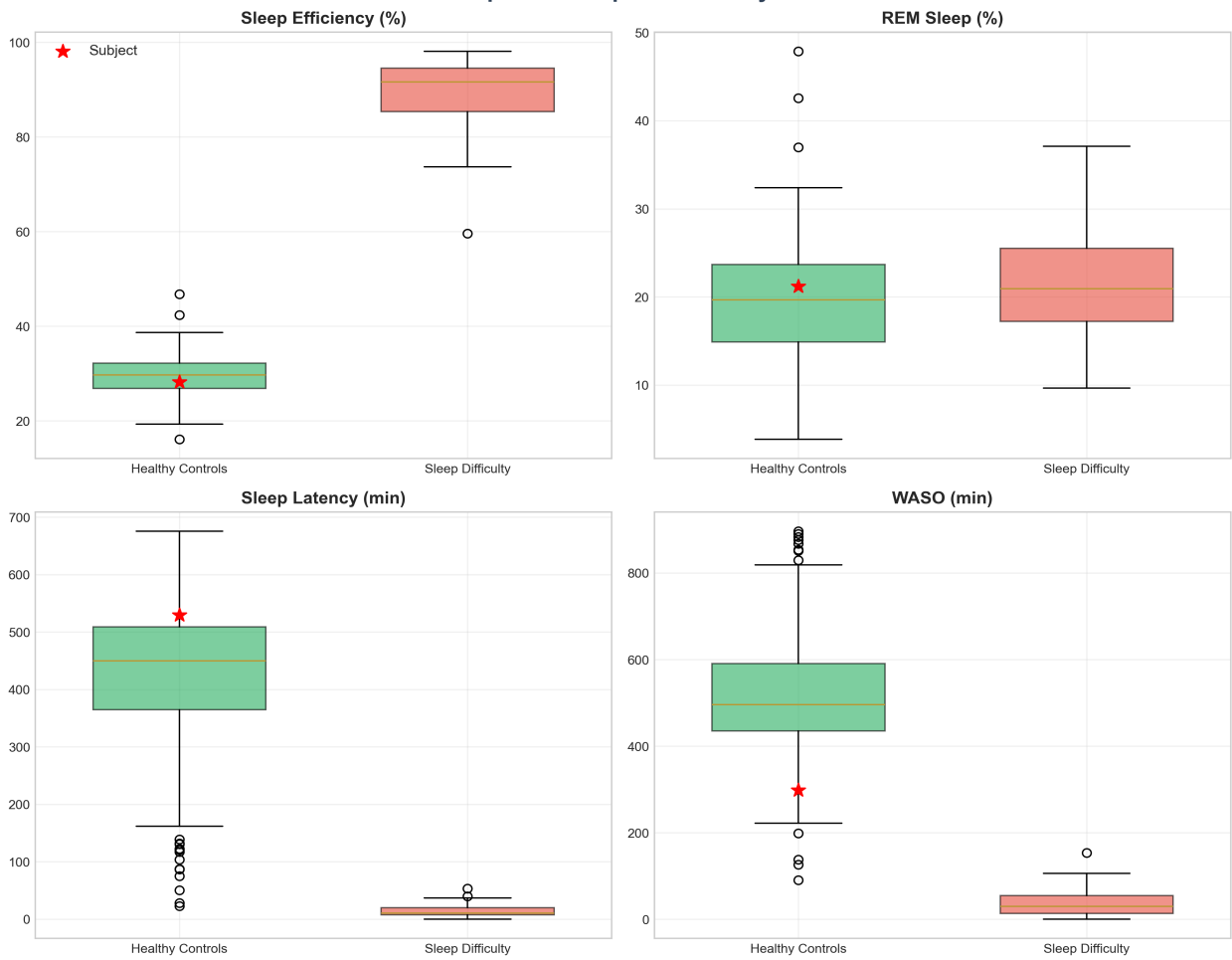


# Signal Quality & Physiological Assessment



## Population Comparative Analysis

Comparative Population Analysis



## Clinical Interpretation & Recommendations

### Overall Sleep Health Assessment

**Sleep Quality Level: POOR**

Poor sleep quality with multiple metrics outside normal ranges. The subject's sleep architecture shows:

- Sleep Efficiency: 28.2% (Below normal)
- REM Sleep: 21.2% (Normal)
- Deep Sleep: 2.6% (Reduced)
- Sleep Continuity: Fragmented (WASO: 298.2 min)

### Key Findings

- **Reduced Sleep Efficiency:** At 28.2%, sleep efficiency is below the normal threshold of 85%, indicating potential sleep quality issues.
- **Normal REM Sleep:** REM sleep comprises 21.2% of total sleep, which is within the normal range.
- **Reduced Deep Sleep:** Deep sleep stages (N3+N4) comprise 2.6% of sleep, which may indicate reduced sleep restoration.

### Recommendations

- Consider sleep hygiene counseling and evaluation of factors affecting sleep quality
- Assess sleep environment and factors that may be disrupting deep sleep stages
- Investigation of factors causing sleep fragmentation may be beneficial

#### Report Analysis and Generation:

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