Individual Stress Response Clinical Assessment

Subject ID: S4 | WESAD Multimodal Analysis

Analysis Date: August 22, 2025 | Sessions Analyzed: 97 | Report Generated by: WESAD Analysis System
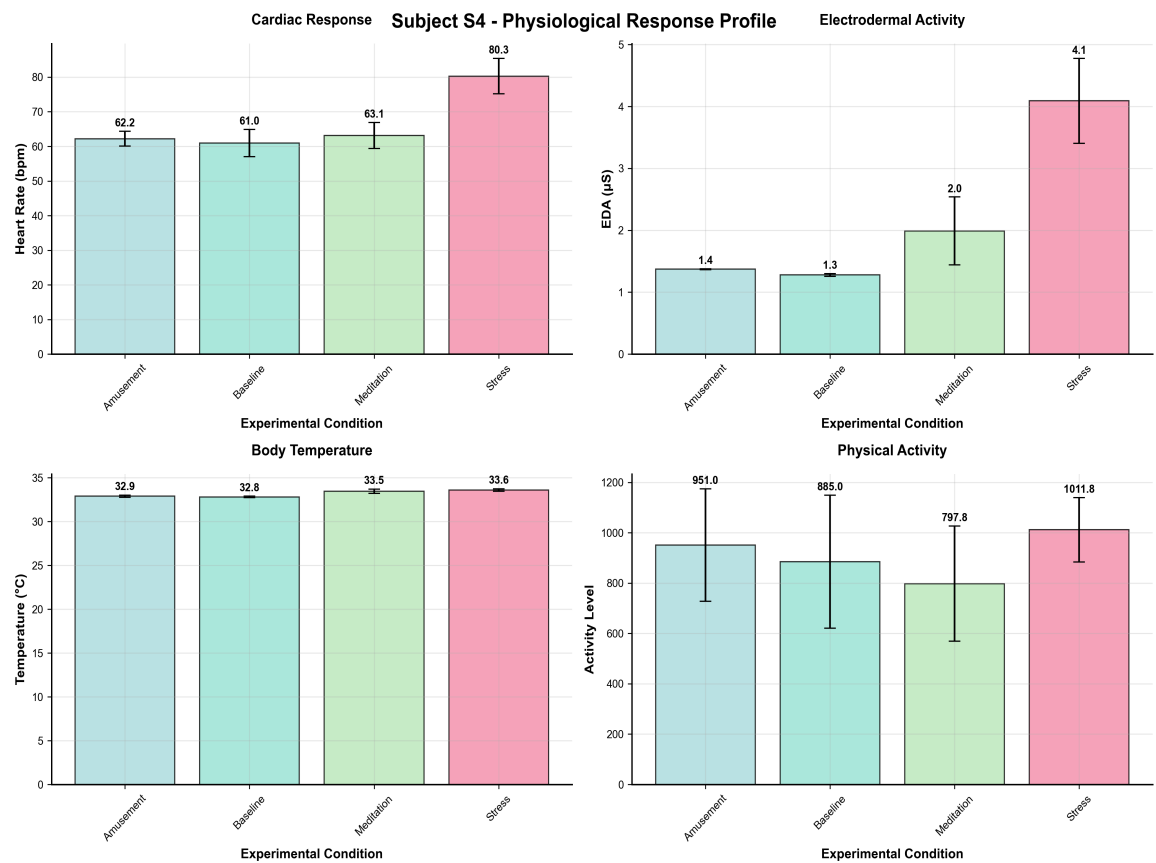
Subject Information

Subject ID	S4
Age	25 years
Gender	Male
BMI	29.4 kg/m²
Height	175 cm
Weight	90 kg
Sessions Completed	97
Conditions Tested	Baseline, Amusement, Meditation, Stress

Executive Summary

This report presents a comprehensive analysis of multimodal physiological responses for Subject S4, a 25-year-old male participant from the WESAD stress response study. The analysis encompasses baseline physiological measurements, acute stress response patterns, and recovery characteristics across multiple sensor modalities.
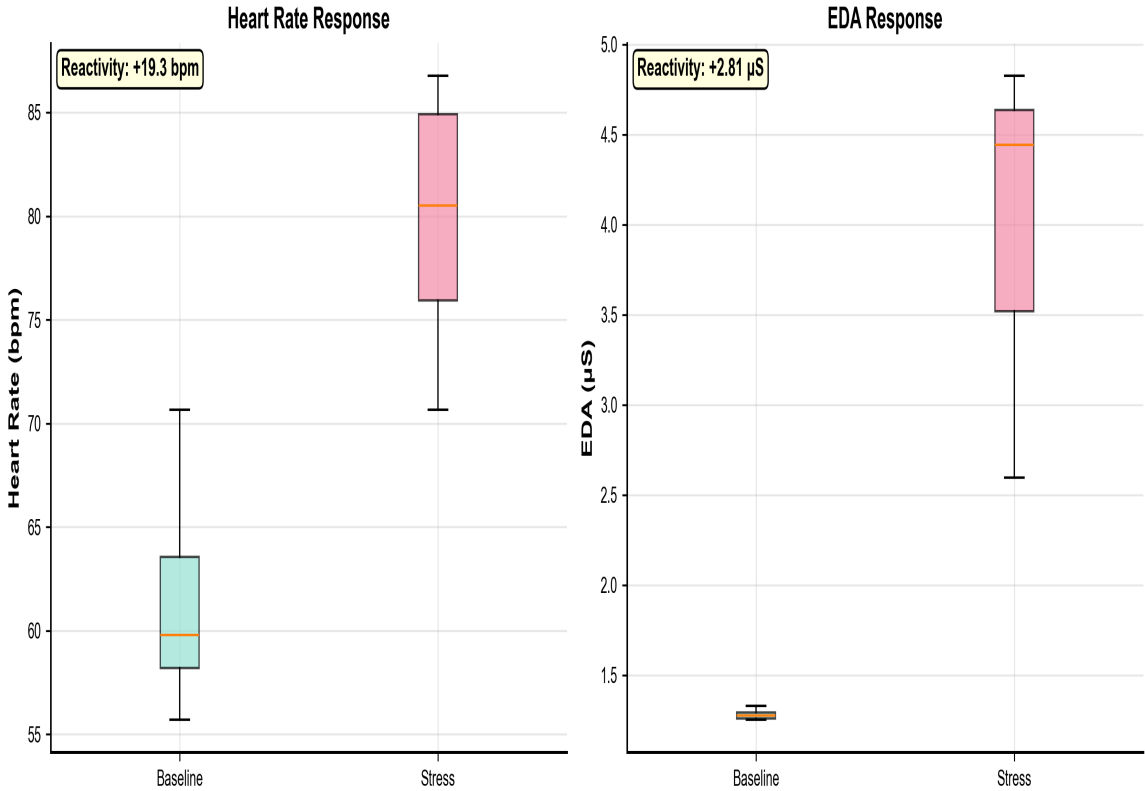
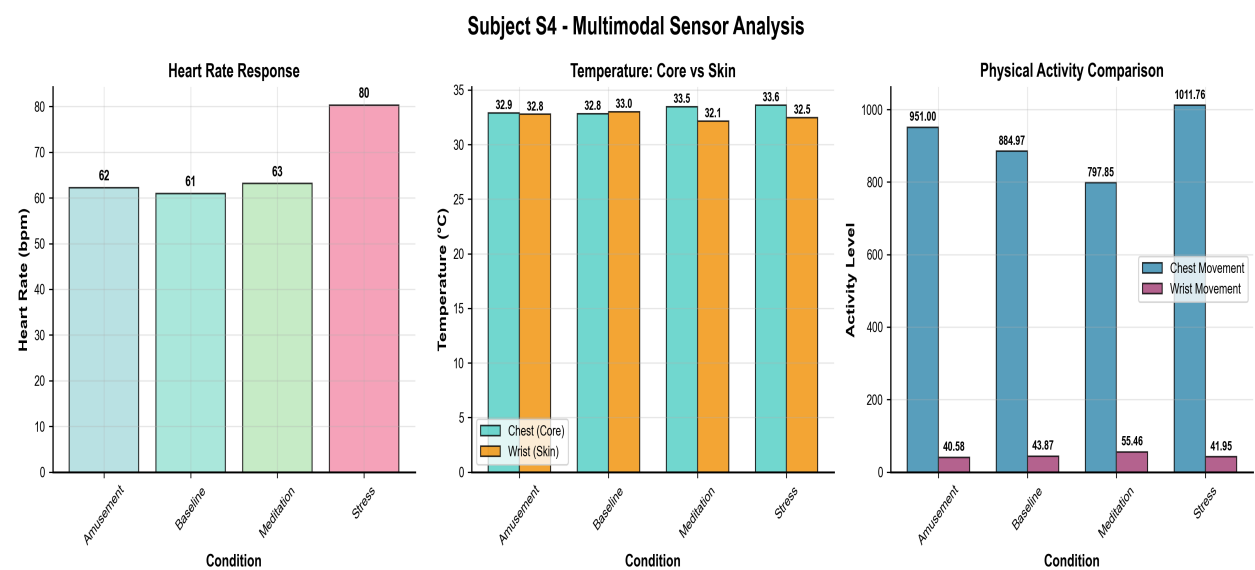| Metric	Value	Clinical Interpretation
Resting Heart Rate	61.0 bpm	Below Normal
HR Stress Reactivity	+19.3 bpm (+31.7%)	Unknown
EDA Stress Response	+2.81 µS (+219.9%)	Unknown
Core Temperature	32.8°C	Within Normal Range

Physiological Response Analysis

Subject S4 - Physiological Response Profile

Stress Response Analysis

Subject S4 - Baseline vs Stress Response

Heart Rate Response

Reactivity: +19.3 bpm

Heart Rate (bpm)

Baseline   Stress

EDA Response

Reactivity: +2.81 µS

EDA (µS)

Baseline   Stress

Multimodal Sensor Analysis

Subject S4 - Multimodal Sensor Analysis

Heart Rate Response

Temperature: Core vs Skin

Physical Activity Comparison

Population Comparative Analysis

Subject S4 - Population Percentile Rankings

Resting Heart Rate (61.0)

Baseline EDA Level (1.3)

Stress Heart Rate (80.3)

Stress EDA Response (4.1)
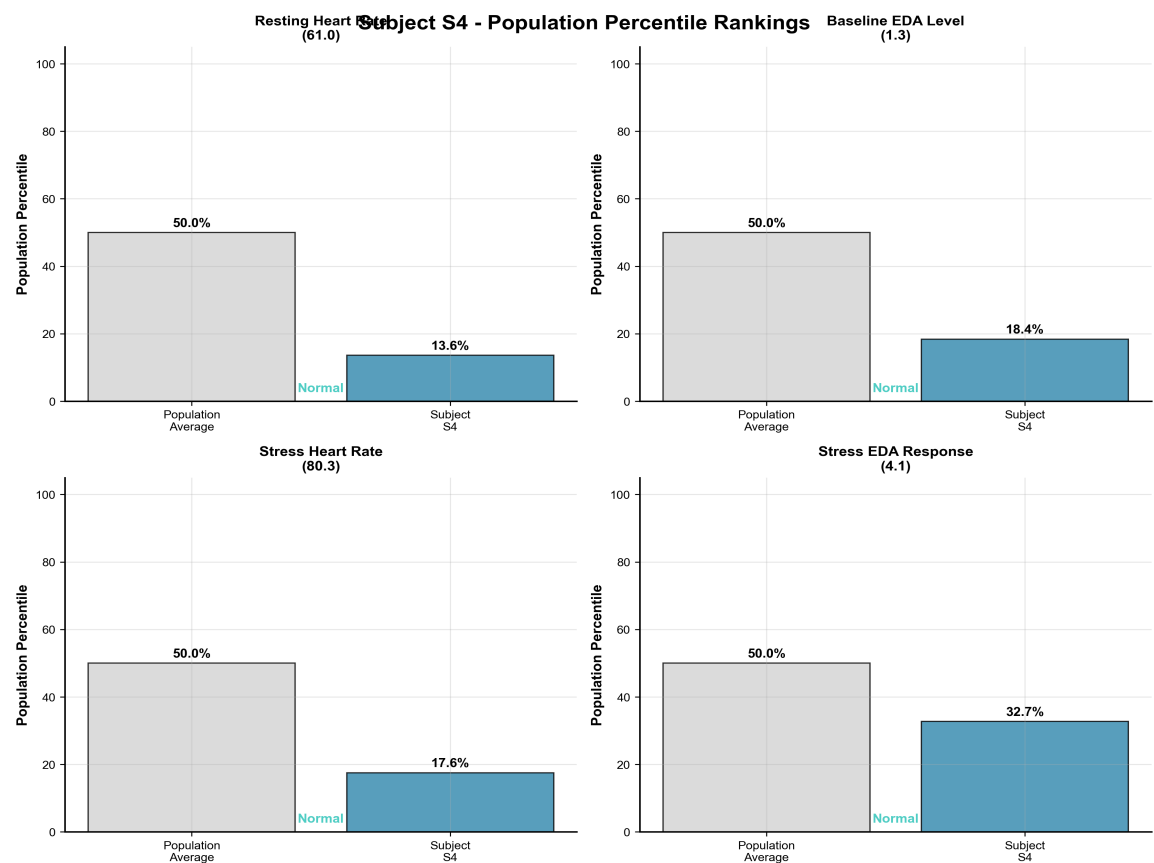
Clinical Interpretation & Recommendations

Overall Stress Response Assessment

Stress Response Classification: MILD ELEVATION

Mildly elevated stress response with some parameters showing above-average reactivity: atypical resting heart rate (below normal). While not immediately concerning, these patterns may warrant monitoring and lifestyle interventions to optimize stress management.

Key Findings

• Heart Rate Stress Response: +19.3 bpm (+31.7% increase from baseline)

• Electrodermal Activity Response: +2.81 µS (+219.9% increase)

• Resting Heart Rate: 61.0 bpm (below normal)

• Population Ranking: 13.6th percentile for resting heart rate

Recommendations

• Implement stress reduction techniques such as mindfulness meditation or deep breathing exercises

• Evaluate work-life balance and identify potential chronic stressors

• Consider regular cardiovascular exercise to improve stress resilience

• Follow-up assessment in 6 months to monitor progress

Report Analysis and Generation:

Report Analysed and created by the following students of IIIT Allahabad,

Part of Big Data Analytics Course:

• Aditya Singh Mertia (IIT2022125) - [iit2022125@iiita.ac.in]

• Rishabh Kumar (IIT2022131) - [iit2022131@iiita.ac.in]

• Karan Singh (IIT2022132) - [iit2022132@iiita.ac.in]

• Tejas Sharma (IIT2022161) - [iit2022161@iiita.ac.in]

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