

# A Hidden Epidemic of Parasomnias Among Post-Secondary Students: Prevalence and Psychological Correlates

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## INTRODUCTION

- Parasomnias: sleep disorders that involve abnormal behavioral and mental activities at night (e.g., nightmares)
- Research on parasomnias among post-secondary students and young adults is scant
- University students frequently have sleep issues (e.g., insomnia), which are risk factors for development of parasomnias
- Goals:
  - Investigate one-year prevalence of parasomnias in post-secondary students
  - Explore relationships between parasomnias, nightmares, psychological distress, and neuroticism

## METHODS

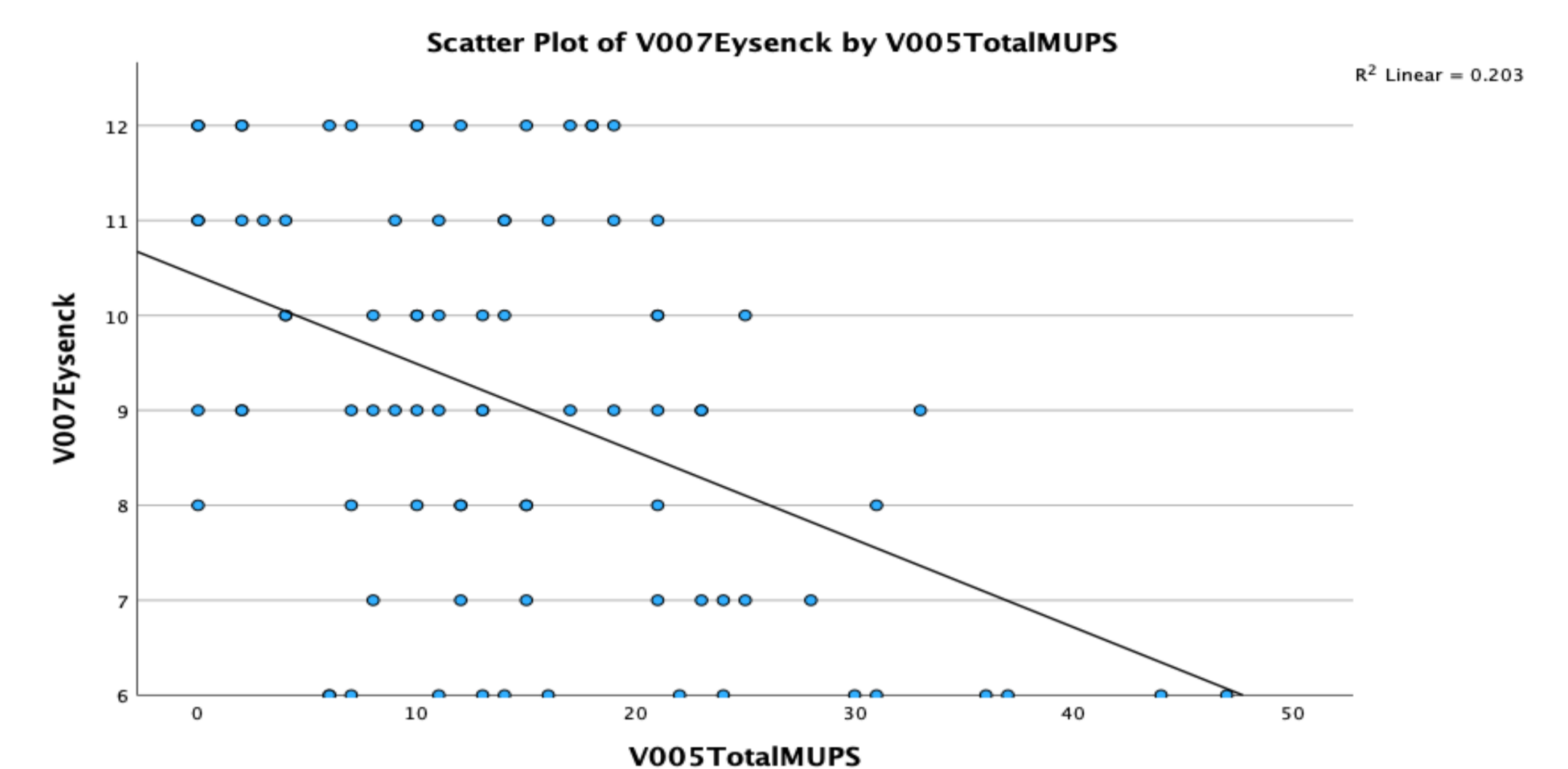
- Online survey
- 85 participants (49 f, 31 m) from post-secondary institutions
- Munich Parasomnias Screening Questionnaire (MUPS): presence/absence & frequency of 21 parasomnias
- Eysenck Personality Questionnaire-Revised (EPQR): neuroticism. Higher score = lower neuroticism
- Sleep Symptom Checklist (SSC): psychological distress

## CONCLUSION

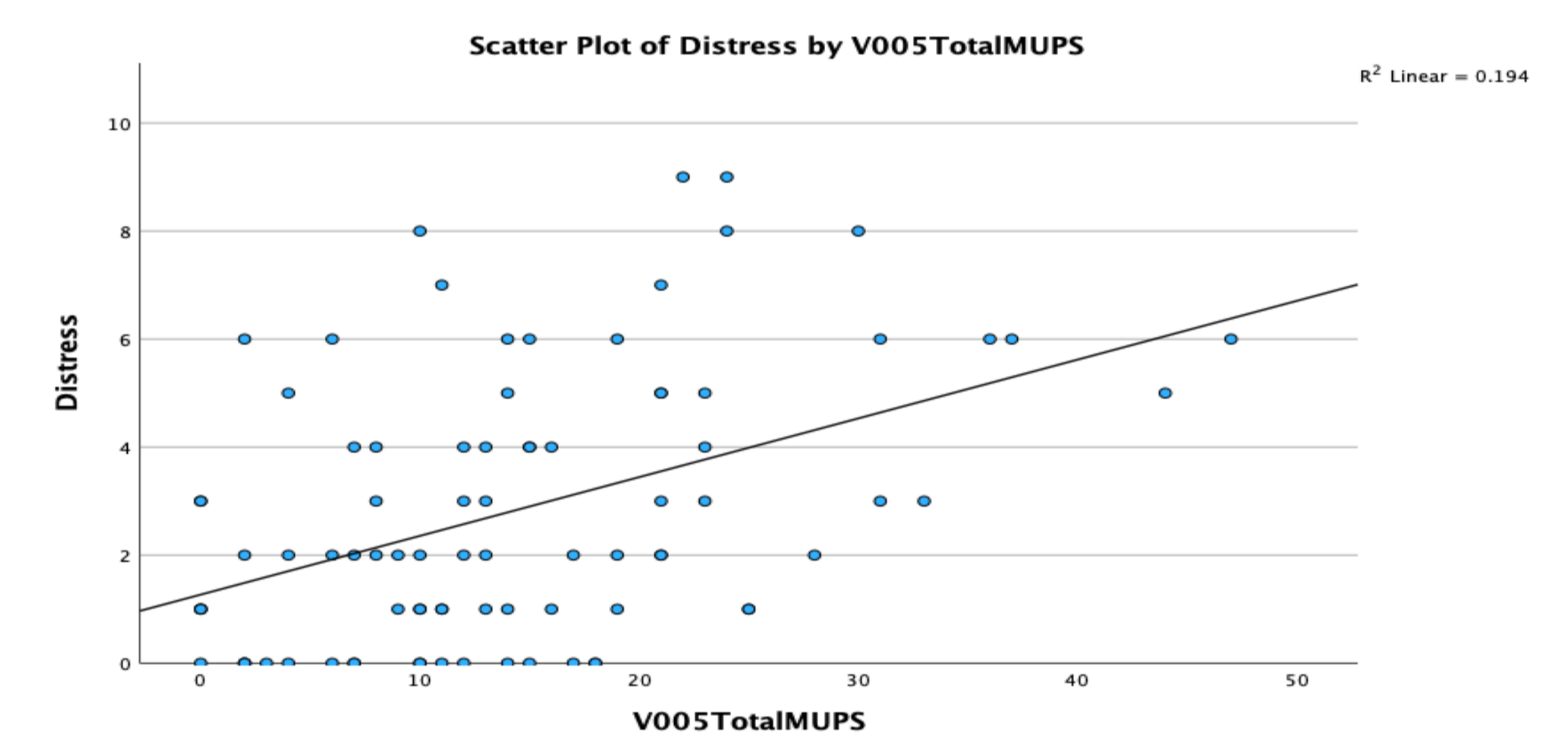
- 93% experienced at least one parasomnia during the past year
- Nightmares were most common
- The more “neurotic” & distressed, the more frequent are parasomnias & nightmares
- 1<sup>st</sup> investigation in Canada

## RESULTS

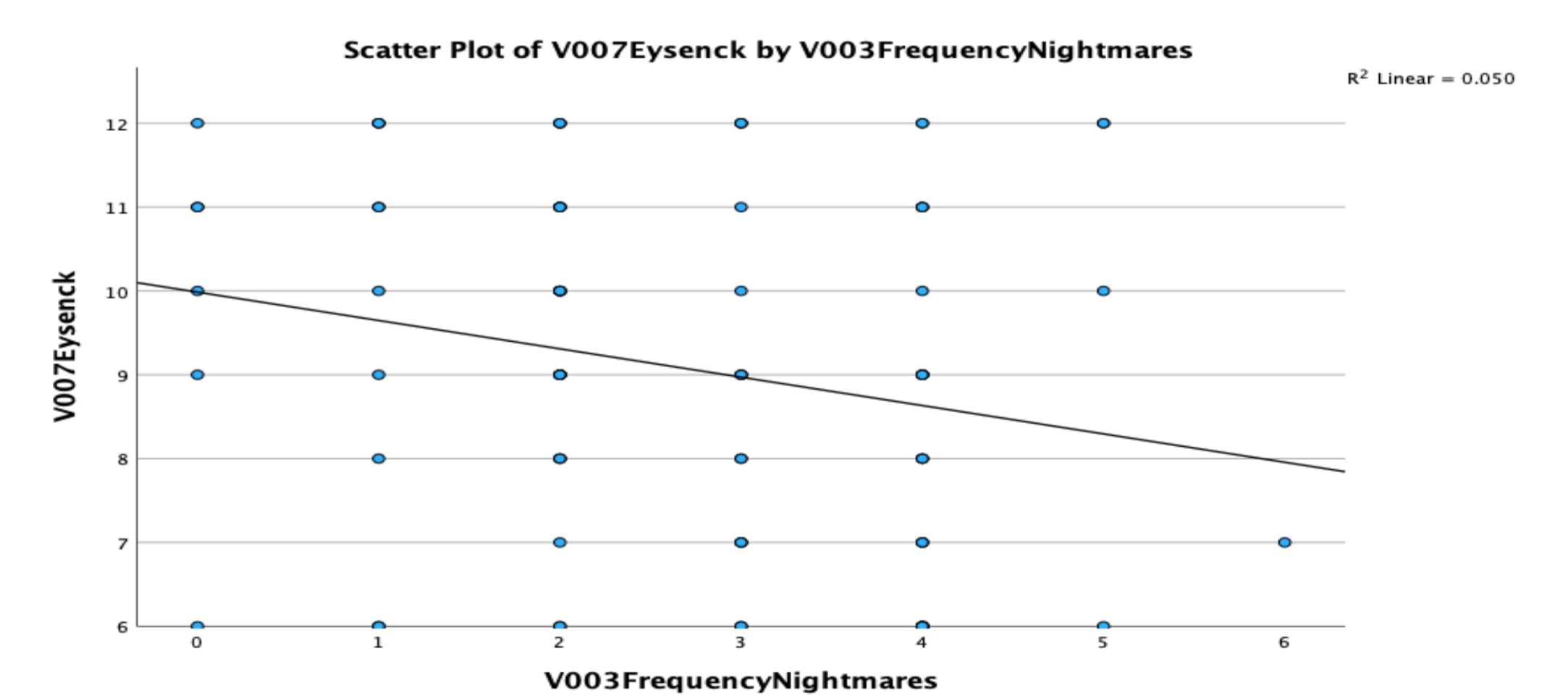
| Parasomnia                                | % with the parasomnia |
|---|-----------------------|
| Nightmares                                | 81%                   |
| Hypnic jerks                              | 55%                   |
| Sleep talking                             | 39%                   |
| Sleep-related bruxism                     | 35%                   |
| Nocturnal leg cramps                      | 34%                   |
| Rhythmic foot movements                   | 26%                   |
| Periodic leg movements                    | 25%                   |
| Sleep-related groaning                    | 20%                   |
| Confusional arousals                      | 20%                   |
| Hypnagogic and Hypnopompic hallucinations | 19%                   |
| Sleep terrors                             | 18%                   |
| Nocturnal eating                          | 18%                   |
| Exploding head syndrome                   | 15%                   |
| REM sleep behaviour disorder              | 15%                   |
| Rhythmic movement disorder                | 14%                   |
| Sleep paralysis                           | 14%                   |
| Violent behaviour                         | 7%                    |
| Sleep-related abnormal swallowing         | 5%                    |
| Sleep enuresis                            | 5%                    |
| Sleepwalking                              | 5%                    |
| Sleep-related eating disorder             | 0%                    |



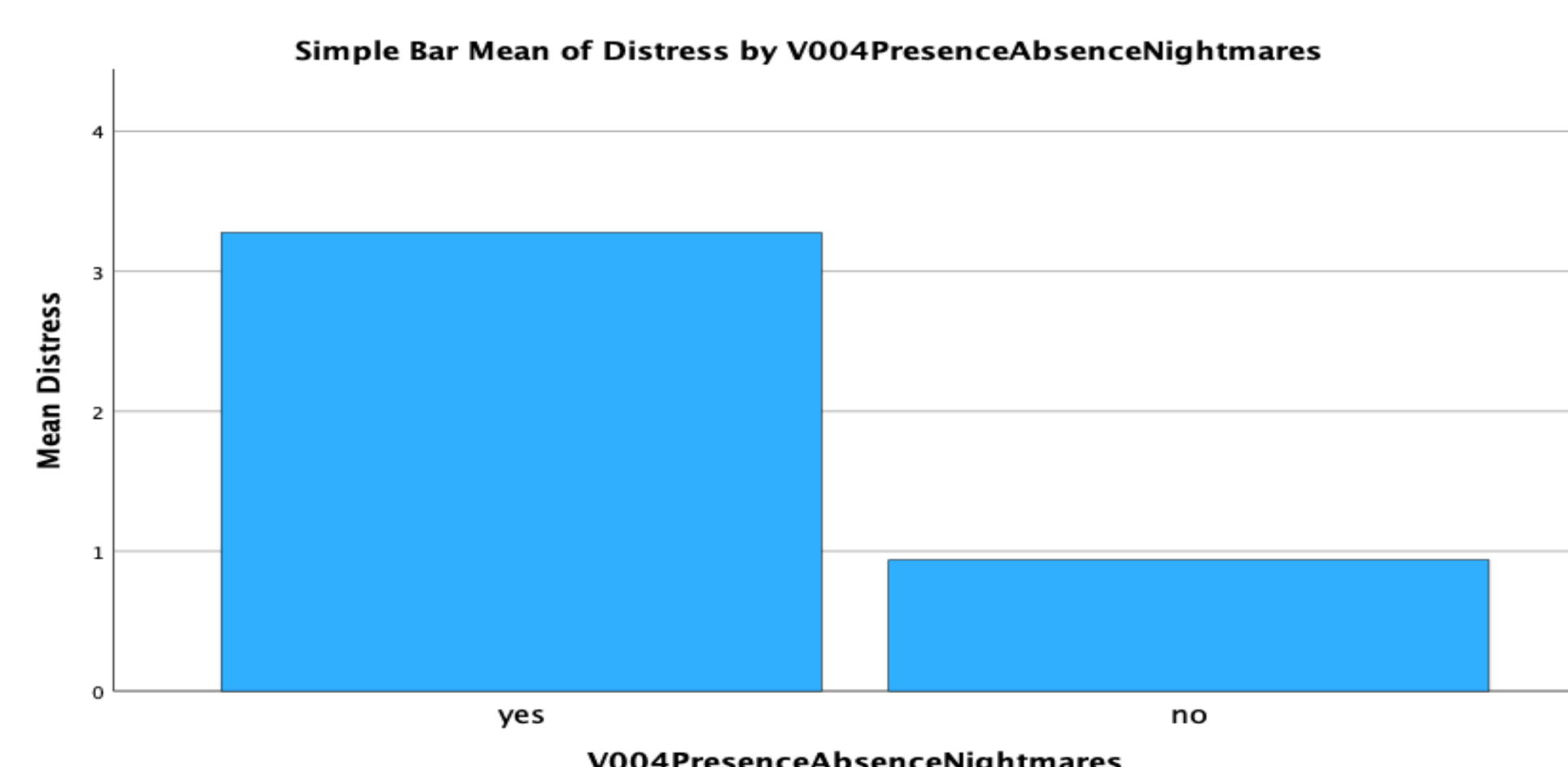
Moderate significant negative correlation ( $r = -.451$ ) between Neuroticism score and parasomnia frequency



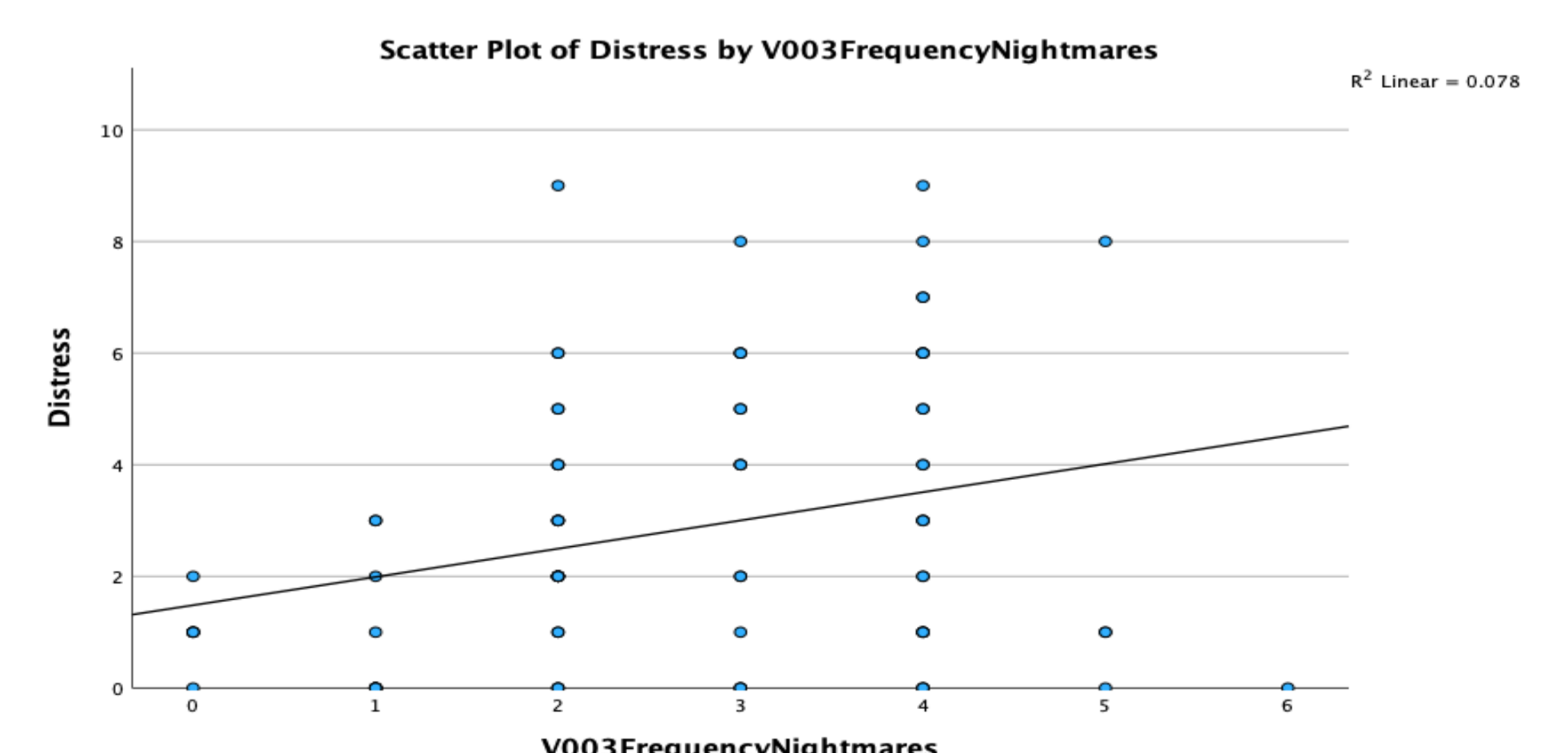
Moderate significant positive correlation ( $r = .441$ ) between Distress score and parasomnia frequency



Weak significant negative correlation ( $r = -.224$ ) between Neuroticism score and nightmare frequency



Those ( $n = 69$ ) who reported nightmares had significantly higher levels of psychological distress than those ( $n = 16$ ) who reported no nightmare



Weak significant positive correlation ( $r = .279$ ) between Distress score and nightmare frequency