

**Stress, Perseverative Negative Thinking, and Sleep in University Students**

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**Introduction:** The perception of stress does not automatically lead to prolonged activation. The cognitive representations of stressors need to be prolonged in order to extend their physiological concomitants (Brosschot, Gerin, & Trayer, 2006). It is shown that elevated levels of repetitive negative thinking appear to be causally involved in the maintenance of emotional problems (Ehring & Watkins, 2008).

**Aims:** To analyze the associations between Perceived Stress (PS), Perseverative Negative Thinking (PNT) and Sleep difficulties.

**Methods:** 549 students from two Portuguese Universities filled in the Portuguese version of Perceived Stress Scale (Cohen et al., 1983; Amaral et al., 2014), Perseverative Thinking Questionnaire (Ehring et al., 2011; Chaves et al., 2013), and three questions were used to assess sleep difficulties (initiating sleep, sleep maintenance, and early morning awakening).

**Results:** In the present sample the prevalence on difficulty initiating sleep was 29,8%, of maintaining sleep was 27,9% and of early morning awakening was 30,9%. The strongest correlations were observed between PS and PNT (from  $r=.338$  to  $r=.520$ ;  $p<.01$ ), being slightly higher to Cognitive Interference and Unproductiveness dimension. The correlations between PS and difficulties in initiating and maintaining sleep were from  $r=.314$  to  $r=.366$  ( $p<.01$ ). Considering PNT and Sleep associations, strongest correlations were observed in relation to difficulties of initiating sleep (from  $r=.206$  to  $r=.222$ ;  $p<.01$ ) and weaker in relation to difficulties in maintaining sleep (from  $r=.125$  to  $r=.198$ ;  $p<.01$ ).

**Conclusions:** The PS was strongly associated with PNT and both of these variables were associated with sleep difficulties (particularly initiating and maintaining sleep).